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Walden University

College of Health Sciences

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Mozhgan Peiravi

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> > Walden University 2019

Abstract

Staff Education Intervention to Enhance Care Planning for Older Adults

by

Mozhgan Peiravi

MS, University of Toronto, 2007

BS, Shiraz University, 1995

Project Submitted in Partial Fulfillment

of the Requirements for the Degree of

Doctor of Nursing Practice

Walden University

May 2019

Abstract

The increased prevalence of cognitive deterioration has increased the challenges of caring for older adults. This study's project site offers a psychiatric program for older adults with customized care for complex geriatric mental health patients. Clinical assessment and care management are often overlooked in geriatric mental health patients diagnosed with behavioral and psychological symptoms of dementia (BPSD). The purpose of this project was to deliver an education program developed from the Staff Training in Assisted Living Residences-Veterans Administration, P.I.E.C.E.S TM model and the Castle framework to 42 nursing and allied health staff of the project site. The project question explored whether an education program on care of patients with BPSD increased staff members' perceived knowledge and competence in providing care to these patients. This education program focused on comprehensive assessment, individualized care planning, and individualized nonpharmacological interventions to manage older adults with dementia. Descriptive statistics were used to analyze performance outcomes data before and after staff education. In addition, care plans of patients were reviewed. Results included a 100% increase in recognition of core concepts of the education program; a 48% to 86% increase in staff willingness to use interdisciplinary care plans; and a 6.6% to 95% increase in documentation of key interventions in care plans for 6 behaviors of dementia. The results of this project might bring about social change by improving the skills and competence of nursing staff in managing the patients with dementia, thus positively impacting the quality of life of patients with BPSD by benefiting from nonpharmacological interventions.

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Section 1: Nature of the Project

Introduction

Older Americans are the fastest growing population in the United States. According to the U.S. Census Bureau (2010), in the year 2000, 35 million Americans, or 13% of the U.S. population, were aged 65 years or older. By the year 2030, this number is expected to double to 70.1 million, or 20% of the population (Menninger, 2002). Older adults have been identified as a top priority population in need of health promotion and disease prevention support (Healthy People 2020, 2010).

Older adult care is complicated in itself, but the manifestation of cognitive deterioration in the form of challenging behaviors makes this population difficult to care for. According to the World Alzheimer's Report (Alzheimer's Disease International [ADI], 2018), 44% of the older adult population experiences dementia, representing 5.6 million people worldwide. Older adults with dementia are projected to be 65.7 million by 2030. At present, it is challenging for care team staff to manage the disruptive behaviors of geriatric patients older than 65 years (McCann, Baird, & Muir-Cochrane, 2014).

The behavioral syndrome of dementia patients, behavioral and psychological symptom of dementia (BPSD), is one of the most common challenging features in the health care management among older adults. Behavioral and psychological symptoms of dementia (BPSD) have varied manifestations, but are generally exhibited as disruptive behaviors or manifested along with a combination of cognitive and language deficits experienced among patients with Alzheimer's disease (Wang, 2015).

The challenging behaviors are clustered into six behavior types: (a) resistance to care, (b) agitation, (c) violence/aggression, (d) vocalization, (e) wandering, and (f) other behaviors including self-isolation, eating inappropriate objects, and sexually inappropriate behaviors (Karlin et al., 2014).

Older adult patients admitted to inpatient mental health care due to complex patterns of behavior presentation and unpredictable behaviors offer challenges to their health care providers (Ritchi, Duff-Woskosky, & Kipping, 2017). With the increasing population of this age group, researchers have focused on managing the clinical behavioral problems with regard to the use of both pharmacological and nonpharmacological interventions. The literature has shown the advantages of a nonpharmacological program for the geriatric mental health population (Huryk, 2016) and has also provided evidence regarding the cost-benefits associated with minimizing the use of seclusion and sitters (Schnaider et al., 2002).

The purpose of this DNP project was to provide staff education on evidence-based interventions to manage behavioral and psychological symptoms of dementia (BPSD). Spector et al. (2013) found that staff-training programs with a strong theoretical base, additional supervision, and support from the management team are the most beneficial in reducing symptoms of BPSD.

Behavioral symptoms in the aging population with dementia increase the burden of care for family and formal caregivers, often leading to institutionalization of older adults, which accounts for one-third of all dementia-related costs. Managing BPSD enhances the quality of life of the patient, decreases the length of in-hospital stays, and decreases caregiver burnout, inappropriate use of antipsychotics, and the use of physical restraints (Health Quality Ontario [HQO], 2015; Molony, 2015).

Problem Statement

The facility under study offers a psychiatric program customized for geriatric mental health patients who have been transferred from other healthcare facilities in order to receive intensive acute care. Unfortunately, clinical assessment and care management often overlook the complex needs of geriatric mental health patients, including those with BPSD. Therefore, the Health Quality Ontario (HQO), government-supported organization, developed quality statement which is launched for the dementia population. I helped develop a plan, for treating this population, in line with quality statements of the Health Quality Ontario (HQO), including a comprehensive assessment, individualized care plan, individualized nonpharmacological interventions, and education and training for healthcare providers.

Purpose

I developed this project to provide an education program for psychiatric clinicians using the Staff Training in Assisted Living Residences–Veterans Administration (STAR-VA) program initiated by Karlin et al. (1998). The program focuses on behavioral management for older adults who are suffering from dementia. One of the well-studied nonpharmacological evidenced-based programs, its efficiency and strength have been acknowledged in a variety of sources (Karlin et al., 2014; Karlin et al., 2017; Teri et al., 2005; Teri et al., 2009; Teri et al., 2010). The STAR-VA intervention consists of three primary components: (a) identifying and changing activators and consequences of challenging behaviors; (b) personalizing activities for residents, and (c) promoting effective communication (Trei et al., 2005). I presented the education program to the nursing and allied health care staff of the geriatric mental health department at a large Canadian mental health hospital. The hospital provides care to more than 30,000 patients annually.

The project question was: Will an education program on care of patients with BPSD increase staff members' perceived knowledge and competence in providing care to these patients?

Nature of the Doctoral Project

This program integrated several effective patient-centered educational program strategies and content areas from the STAR-VA program. In addition, I developed strategies and content from the PIECES learning and development model and the Castle framework for communication strategy (Jackman, Fielden, & Pearson, 2015).

Significance

Sidek and Martins (2017) emphasized that involving the key stakeholders is critical in modern project management. The stakeholders who were involved in this project were the managers of the inpatient and outpatient unit, the director of quality improvement, nurse practitioners, and registered nurses. During my practicum, weekly meetings were held with various stakeholders regarding the need for an education program for the BPSD staff. Stakeholder input solicited to review the education program prior to implementation. In summary, my learning throughout this program was in line with Schön's (1995) theory, which involves "developing knowledge in action through reflection" (p. 29). Schön's theory defines how a practitioner can transfer knowledge from theory to practice. The Schön theory emphasizes that knowledge will develop through the actions. So "reflection in action" or "reflection on action" in interactions with the focus group, clinicians, and stakeholders has given me a critical knowledge and has taught me how to analyze that knowledge. I now have a tool to acquire further knowledge in practice. Finally, reflection is not only limited to concepts, but rather is more useful in context (Ekebergh, 2007).

Summary

In Section 1, I introduced the problem of BPSD and the need for a nursing staff education program at a large inpatient mental health facility in Canada. The project question was: Will an education program on care of patients with BPSD increase staff members' perceived knowledge and competence in providing care to these patients? Section 2 introduces Malcolm Knowles's theory of adult learning and describes its application to my project. In it, I cite the evidence-based literature relevant my project. Furthermore, my role as the DNP student is explained.

Section 2: Background and Context

In this section, I introduce Malcolm Knowles's theory of adult learning and describe how I applied it for this educational project. I also analyze and synthesize findings from the literature review and discuss my role as DNP student.

Concepts, Models, and Theories

Malcolm Knowles's (1984) theory of Adult Learning framed this project. Knowles's theory, initially introduced in 1980, includes five assumptions about teaching adults. This theory has attracted considerable attention because of a distinctive conceptual basis for adult education and learning via the notion of andragogy (Smith, 2002). Knowles defined the five categories as (a) participants' self-concept to the training, (b) participants' experience in learning, (c) participants' readiness to change in behavior as a result of the training, (d) participants orientation to learning, and (e) participants' motivation to learn (Smith, 2002). For the project, the target population for education is the experienced clinician in the geriatric unit who is mandated to develop and implement a care plan for the dementia patient with BPSD.

Knowles' theory highlights the difference between andragogy and pedagogy to show the distinct learning needs of adults. The first aspect of adult learning is selfconcept. In the context of my project site, staff members moved from being dependent to being self-directed. Managers and unit advanced practice nurses invited staff members to attend the education sessions via email, with the option to choose their desired date and time. The second aspect of learning is experience: all participants in the project were experts in the field and regularly interacted with dementia patients with BPSD. To access their valuable experience, I invited them to focus groups to give them the opportunity to be involved in the program design and incorporated their feedback when designing training. The third consideration is a readiness to learn. All participants provided direct care for dementia patients with BPSD and struggled to manage challenging behaviors. Because they had experienced the negative consequences of disruptive behaviors, they welcomed training. The fourth aspect is an orientation to learning. As a person matures, their perspective changes from postponing the application of knowledge to applying knowledge as soon as possible: this marks a shift from subject-centeredness to problem centeredness. Education sessions included various demonstrations, activities, visual aids, study stations, and case study discussion, and fostered learning by encouraging participants to reflect on the presentations and how to incorporate new tools into daily practice.

The final concept is motivation to learn. As a person matures, the motivation to learn become internal (Knowles, 1984). As a result, I used elements of the COM-B theory to optimize the staff motivation to change. The COM-B model has three foci: capability, opportunity, and motivation. The clinician at the geriatric mental health unit required Capability (C), Opportunity (O) and Motivation (M) to change their behavior in practice. The model proposes that for someone "to engage in a particular behavior (B) at a given moment they must be physically and psychologically able (C) and have the social and physical opportunity (O) to do the behavior" (Barker, Atkins, & Lusignan, 2016, p. 91). Indeed, the willingness to change the behavior must overlap any other competing activities at that moment. This inclusive definition of "motivation" will cover "automatic processes such as habit and impulses as well as reflective processes such as intention and choice" (Barker et al., 2016, p. 91). So, this change in clinician behavior will determine if the program sufficiently shifts the current practice to the desired practice. The clinician would be motivated in practice by taking part in educational sessions and discussing real cases by attending educational sessions, coaching, and weekly behavior meeting. The staff motivation was getting stronger when the facility offered staff certificate of completion.

Relevance to Nursing Practice

In the literature review, I sought to understand the gap in provision of care, specifically for those over the age of 60 who require geriatric care. Initially I searched MEDLINE, CINAHL and PsycINFO databases for articles related to the geriatric mental health population. Specifically, I wanted to explore articles related to care planning for dementia patients with problem behaviors. Search terms included: *care plan, geriatric, mental health, elderly, complication, psychiatric geriatric nurses, care plan intervention, dementia,* and *behavioral.* I then limited the searches to articles published between the years 2013 to 2018. This yielded relevant materials including *the American Journal of Geriatric Psychiatry*, the Medical Psychiatry Alliance website, and a book titled *Evidence-Based Geriatric Nursing Protocols for Best Practice.*

To increase the efficacy of my search and minimize the risk of missing valuable articles, I continued to search using various search terms related to care planning, nursing homes, mental health services, nursing gerontology care, and the elderly. I narrowed the search by include the following terms: *intervention, educational intervention, psychiatric*

nursing, behavioral symptom, and *nursing care planning*. To select articles for inclusion, I used a search strategy described by Kuske, Roes, and Bartholomeyczik (2016). The first criterion was that publications were included in the content cited in training or quality improvement programs. The second criterion was that the articles had to bridge the knowledge–practice gap in interventions.

After reviewing 137 studies, I narrowed the selection to 20 studies related to interventions in managing behavioral and psychological symptoms of dementia. Most of these reported at least one positive finding, but some did not report on a formal intervention. Ten of the 20 studies reported using some intervention or strategy to manage behavioral problems. I additionally included two articles that did not fully meet these criteria but contributed relevant information. One emphasized the importance of the role of nurses, and the other ones defined the needs of the older adults in care based on geriatric care model (GCM) interventions. Of the 20 articles I retrieved, 10 studies provided data that addressed the key questions in this review. Three studies focused on care planning skills, five studies focused on training various caregivers or care providers, and two studies focused on staff education and mentorship.

Geriatric Needs and the Nurses

One of the first studies I reviewed was a comprehensive study of 35 primary care practices in the Netherlands. In this study, based on the geriatric care model (GCM), nurses conducted assessments, wrote a care plan, and involved the multidisciplinary team to enhance coordination between professionals caring for the patient with complex needs (Muntinga et al., 2015). The authors focused on the frail elderly and how the implementation of a framework based on theory could improve the complicated intervention process in primary elderly care. They found that frail older people have complex and complicated needs, and stressed the need to assess, design, and implement a care model that yields optimal health outcomes.

The next article I reviewed focused on geriatric dementia patients with BPSD. Keady and Jones (2010) found that staff had difficulty managing these patients and highlighted the importance of main care providers, specifically nurses, in managing their behavior. They explored ways to address challenging behaviors using a three-step approach: investigating, formulating, and personalizing a range of interventions. They used the term *behaviors that challenge*, defined as agitation, aggression, and resistiveness. Through their three-step intervention, the authors advocated for the elderly with the goal of altering how care providers perceive a patient: from a person who is being "difficult" or "demanding" to a person who has unmet needs and is attempting to communicate. They verified the effectiveness of their three-step approach in a real-world context, and the findings illustrated the importance of the role of nurses in understanding and managing challenging behaviors.

Care Planning Skills

Care planning skills can be used in a variety of interventions. I reviewed two studies focused on care planning for dementia patients with BPSD. However, the focus of one study was on an intervention by staff and the other was on an intervention implemented without the help of the staff. Both studies showed some positive outcomes from developing the care plan for improving care planning skills. In a third study, the authors reported the negative aspects of nurses in planning care skills.

De Wail (2014) developed a tool called My Brain Book for use by dementia patients and their loved ones. The tool is digital, portable, and editable and is intended to compensate for the loss of autonomy and control, the core problem in dementia, and stresses the individuality and lived experience of people with dementia. It was introduced to fill the gap in system-level dementia services by facilitating a personalized care plan.

A recent study from one of the largest psychiatrist institutions in Canada focused on creating a comprehensive electronic dementia-specific interprofessional care plan to implement Health Quality Ontario standards (Ritchie, Duff-Woskosky, & Kipping, 2017). The authors examined the implementation of care plans based on content from National Institute for Health and Care Excellence guidelines. The goal was to ensure the Health Quality Ontario standards were implemented throughout care planning, improving communication and the transitional care of older adults. The electronic health records facilitated the transmission of information to the community health providers: the care plan is reviewed daily by a nurse and by the multidisciplinary team at a weekly team review. Hospitals also update the care plan before discharge and send it to care providers in long-term facility or the community.

Thus, care planning can involve a variety of individualized and professional interventions to improve quality of life for patients with behavioral and psychological symptoms of dementia. Effective interventions may include staff, or only patients and their families. However, some researchers focused on the negative aspects of staff planning care for dementia patients. For example, Drummond and Simpson (2017) conducted and analyzed semi-structured interviews that revealed negative perceptions of care plans among staff members. They identified five main themes: e-documentation that took staff members away from patient care, ambivalence about the value of paperwork versus electronic documents, time conflicts with patient care, and alternative sources of information versus the care plan (e.g., verbal handover). Overall, staff members felt that the care plan was not the best way to transfer information to the team. They also felt an effective care plan should be succinct and easily accessible, and that staff should have input in the design process. Stakeholders at my own clinical site have also voiced concern about the lack of staff contribution to care plans, as well as the need for further exploration of interventions including care planning.

Overall, behavior management techniques include a wide variety of behavioral interventions, but one of the most effective interventional techniques for behavioral symptoms of dementia is staff training. In the following discussion, I explore the outcomes of staff training interventions.

Educational Interventions

The educational behavior management intervention varies in different ways. The focus could be on staff, dementia patients, the managers, the physicians or a mix. The results of the review in the following section included three studies with the focus on the staff training, one on caregivers and staff, and the last one on staff and managers. Some studies documented no change in the measurement of the outcome; however, the other

studies confirmed the positive outcome in training staff. As such, with the results of this part, the focus of the search was continued to find an effective educational intervention with significant outcomes affecting the quality of the dementia patient's life.

Jeon et al. (2013) assessed the feasibility of an education toolkit for the management of behavioral and psychological symptoms of dementia and care planning practices for patients with severe symptoms. The study included 46 clients and 209 staff and managers in five residential care facilities. Staff attended an education session and provided with resources that taught them about how the brain functions, dementia, theories behind behavioral and psychological symptoms of dementia, and assessment and prevention techniques. The authors found that staff liked the tools but did not use them because they perceived them as not easily accessible. Post-intervention outcomes revealed minimal to almost no improvement in behaviors. However, the findings were still very useful because they revealed that nurses preferred to communicate orally – verbal handover – rather than consulting written documentation.

Another study offered psychoeducation to caregivers and professionals. The multifactorial program developed by Hungerford, Jones, and Cleary (2014) improved quality of life among patients with behavioral and psychological symptoms of dementia; the authors advocated for non-pharmacological approaches in managing challenging behaviors.

Another study targeted staff education and modified assessment tools to improve the management of severe behavioral and psychological symptoms of dementia (Ranasinghe, Bates, & Mynes, 2013). The study was conducted in two care facilities providing residential care for patients with severe dementia. The post-intervention results revealed the importance of educating staff and ensuring assessment forms are appropriate, and both facilities now incorporate education on risk management for staff and have modified their assessment forms and care plans for patients.

An educational intervention for staff working with dementia clients in an aged care facility led to a decrease in workplace violence (Mohle, 2016). The multifactorial intervention involved training staff to address challenging behaviors by having a nurse or doctor assess each resident for suitability preadmission and altering the timetable of recreational activities to suit each resident. The intervention led to a significant reduction in occupational violence, improvements in staff confidence, and more positive staff attitudes and perceptions. Overall, these results suggest the effectiveness of educational interventions for staff.

A dementia behavior management advisory service team was developed in Australia. This primary healthcare service was composed of registered nurses and allied health professionals; part of the program design was to promote psychoeducation with a focus on the benefits of non-pharmacological approaches to managing behavioral and psychological symptoms of dementia. The results revealed that psychoeducation improved quality of life for patients and allowed patients and staff to make more informed choices (Corbett et al., 2012).

The mixed study results, the variety of specific interventions across studies, and the various techniques spanning across individuals, managers, physicians, and staff in different settings suggested turning to successful intervention and feasibility of intervention in the project setting. Project feasibility is measured through focus group and the consecutive meetings with stakeholders. With that said, the search continued with the focus of STAR-VA articles and manuals. The was not only education, it included the ongoing support for care planning skills. The next section focuses on articles related to STAR-VA: a multicomponent psychosocial intervention for managing challenging dementia-related behaviors of veterans.

Staff Educational Intervention and Care Planning Skills

My literature review revealed that staff training interventions can lead to positive outcomes, including significant reductions in the frequency and severity of challenging behaviors and symptoms. However, staff training programs are very dependent on factors such as management style, care culture between staff groups, and other organizational factors (Spectora, Orrell, & Goyder, 2012). Organizational factors may prevent staff from consistently applying ideas from training into practice (Moniz-Cook et al., 1998; Visser et al., 2008). Therefore, it is vital to consider organizational factors, unit culture, and management perspectives when designing an effective intervention.

Effective interventions have been implemented by frontline staff (Spectra, Orrell, & Goyder, 2012). Curyto (2017) stressed the need for ongoing coaching, as did the stakeholders at the practicum site. Another consideration when developing a training project was the initial level of staff knowledge. All the staff working in geriatric mental health at CAMH receive the two-days PIECES training; PIECES is a holistic model intended to enhance capacity at the individual, team, organization, and system levels.

The US Department of Veterans Affairs (VA) first introduced Staff Training in Assisted Living Residences (STAR) – STAR-VA – as an interdisciplinary behavioral intervention. It was initially developed to increase the capacity of nursing home staff in managing challenging behaviors and improving the care they provide. It began as a pilot project and since 1998 has gradually been assessed in various long-term care facilities. The program includes four core components: ABCs (activators, and consequences that may exacerbate or reinforce challenging behavior); pleasant events for individual clients; realistic expectations for the behavior based on the abilities and disability of the client; and communication skills for staff.

My literature review revealed that STAR-VA reduced problematic behaviors among dementia residents, improved the care they received, and minimized staff problems (Teri, 2009; Teri, Huda, Gibbons, Young, and van Leynseele, 2005; Teri, McKenzie, Lafazia, et al., 2009; Teri, McKenzie, Pike, et al., 2009; Karlin et al., 2014). Curyto (2017) demonstrated the successful clinical application of the STAR-VA behavioral intervention program: this intervention involved training 38 staff for 6 months.

Huryk (2016) incorporated elements of the STAR-VA program into the ABCDE: Antecedent, Behavior, Consequence (of the behavior), Decide (on the new goal behavior and ways to establish it), and Evaluation. Evaluation is an important element: Was the plan implemented, and if not, why? The ABCDE is a comprehensive program; Karlin et al. (2014) and Teri (2005) measured changes in patient behaviors using a simpler tool called ABC. Incorporating the ABCs can also be an effective tool within my clinical site. In conclusion, the educational behavioral interventions are varied; however, one of the effective interventional techniques for geriatric mental health unit at CAMH in managing behavioral symptoms of dementia is STAR-VA.

Local Background and Context

My facility is a mental health and addiction center in Canada. Approximately 33% of clients in the unit are admitted for the management of behavioral and psychological symptoms of dementia. Best practice guidelines and Health Quality Ontario (HQO) standards state that all clients with behavioral and psychological symptoms of dementia require an individualized care plan that includes non-pharmacological strategies to manage symptoms. The project facility documentation standards, as well as expectations from regulatory colleges, require that all clients have a documented plan of care. Currently, approximately 40% of clients with dementia in the unit have a documented interprofessional plan of care in their electronic medical record (personal communication, 19 June 2018). My research question is: Will an education program on care of patients with BPSD increase staff members' perceived knowledge and competence in providing care to these patients?

Role of the Doctor of Nursing Student

One of the essential foundations of the DNP curriculum is the development of leadership at the administrative level, i.e., organizational and systems leadership for quality improvement and systems thinking (AACN, 2006). The leadership abilities of DNPs can transform health care through innovation, engagement of stakeholders, and system improvement (Pritham, 2016). At my own practicum site, individualized care plans, staff education, and comprehensive assessments for managing challenging behaviors have historically been reinforced through mandatory education and reinforcing policies preventing the use of antipsychotics and restraints.

At the request of stakeholders, I conducted a focus group to identify gaps in practice. The goal was to improve practices in managing challenging behaviors and meet Health Quality Ontario standards. By meeting with stakeholders, auditing charts, reviewing literature, and conducting focus groups, I am advocating for the elderly and supporting psychiatric nurses in the process of altering volume-driven practice to valuebased care (White, Dudley-Brown & Terhaar, 2016).

In preparation for my proposed project, I observed rounds at the geriatric mental health inpatient units, which included a multidisciplinary team and staff psychiatrists; I wanted to identify the needs of the team in managing the behaviors of patients admitted to the unit and to learn how care plans for patient are implemented. I also attended weekly meetings involving managers and physicians.

A DNP should be prepared to use their expertise in assessing and identifying issues in organizational system to facilitate organization-wide changes in practice (AACN, 2006). The proposed educational intervention guided by the results of the focus group, meetings, and my own expertise. After gathering data, I launched the process of designing an educational manual to support nurses in improving nursing practice.

This section explored the gap in practice in managing patients with behavioral and psychological symptoms of dementia and provided evidence to support the STAR-VA as an effective education program for staff in geriatric mental health units.

Summary

Section 2 I discussed the gap in practice in managing dementia patients with BPSD and demonstrate the evidence to support the STAR- VA as an effective education program for GAUs staff in the geriatric mental health unit. The project question is: Will an education program on care of patients with BPSD increase staff members' perceived knowledge and competence in providing care to these patients? Section 3 is going to introduce the participants, procedures, evolutions, and protections associated with this project. Section 3: Collection and Analysis of Evidence

Introduction

The goal of this project was to educate staff on the care of patients with BPSD. This project followed the steps in the *DNP Manual of Staff Education*. Besides improving the care for the BPSD patients, this project meets the requirement of the project facility at geriatric mental health units, the Ontario standards of practice presented by HQO, and also meets Alzheimer Society regulations. In Section 3, I discussed the participants, procedures, and protections associated with this project.

Practice-Focused Question(s)

The project question was: Will an education program on care of patients with BPSD increase staff members' perceived knowledge and competence in providing care to these patients?

Sources of Evidences

Archival and Operational Data

The focus groups that I conducted with advanced practice nurses each involved four 45-minute sessions with nursing staff in the unit, which were held three times during a 2-week period. I invited all nurses and allied healthcare staff via email because it is crucial that practitioners are involved in any quality improvement process (Gervais et al., 2015). Participants included 15 staff members, both full-time and part-time, from a wide range of ages, including recent graduates and senior staff members close to retirement. Data were collected through an innovative design that allowed busy staff in an acute care unit to respond at their convenience. Participants provided written responses to focus group questions after being educated about the objectives and goals of their focus group. The room was divided into six study stations, each focusing on one question.

The focus group questions were:

Q1: Tell us about your experience of using care plans on GAU?

Q2: Have you read any care plans when working recently and how has it helped your work?

Q3: Have you written any care plans when working recently and how has that helped your work?

Q4: When you implement a behavioral strategy to manage BPSD describe, how do you inform the team about your findings?

Q5: Tell us how you incorporate your finding in the care planning to inform team? Do you give them information on care plans? Do you write a care plan with them? How easy is it to do that?

Q6: What would help you/make it easier to develop the care plan for patients with BPSD? More than half of the focus group participants indicated the need for more education about structuring a care plan and an electronic care planning system (Interdisciplinary Plans of Care [IPOC] and safety and comfort plan). Several noted that writing care plans is time-consuming and complained about lack of time. Most indicated that they would be willing to try the electronic care plan to address challenging behaviors, but believed that it is not sufficiently individualized and is too general to apply in practice. More than half stated that they preferred that a care plan be written by an advance practice nurses or team leader, and that they would follow the written gridline plan. The results of the focus groups provided valuable information and support for the education program.

Evidence Generated for the Doctoral Project

My goal for the project was to develop an education program for staff on care of patients with BPSD. The project question was:

Participants

The unit consists of 34 registered nurses and 12 allied healthcare staff. The management team identified and invited participants to the program.

Procedures

Planning.

This project involved two phases. Phase 1 was the education program with a pre and post knowledge survey completed by the participants. In Phase 2, I measured the impact of education on practice through a retrospective chart audit. The retrospective chart audit was to compare components of care plans done prior to and post education sessions. I used the focus group responses in the planning of the program. The program content and knowledge questionnaire were reviewed by the PhD-prepared unit advanced practice nurse. I made recommended changes prior to implementation.

Implementation.

The program included two 1-hour presentations based upon the STAR-VA education manual. Teri et al. (2005) demonstrated the reliability and validity of the STAR-VA program by conducting a randomized controlled trial in which they found statistically and clinically significant changes in measures of residents' depression,

anxiety, and behavioral symptoms. They found that the STAR residents improved versus control residents (p < .05), and that the trained STAR staff also experienced less adverse impact and reaction to residents' problems (Teri et al., 2005). The project was also designed in accordance with the ABC problem-solving tool presented by Karlin et al. (2014) and Karlin et al. (2015), which I used to measure the effects based on the tools modified from STAR-VA manual. The ABCs are:

A – Activator: What happened immediately before the resident's challenging behavior?

B – Behaviour: Behaviours are observable events. We can describe them using the four W's: What was the resident doing? Who was present? Where was this happening? Who was that?

C – Consequence: What happened immediately after the resident's behavior? The program includes a discussion of the following:

1. Comprehensive assessment: People living with dementia and symptoms of agitation or aggression receive a comprehensive interprofessional assessment when symptoms are first identified and after each transition in care (Health Quality Ontario [HQO], 2016). I used the PIECES model in this project as a comprehensive tool for the assessment of individuals who endure cognitive and mental health disorders manifesting with behavioral issues. The PIECES model is an acronym for "considering the person's Physical, Intellectual, and Emotional health, Supportive strategies to maximize Capabilities, the individual's social and physical Environment, and his/her Social self" (Hamilton, Harris, Le Clair, & Collins, 2010 p. 4).

- 2. Individualized care plan: People living with dementia and symptoms of agitation or aggression have an individualized care plan that is developed, implemented, and reviewed on a regular basis with caregivers and agreed upon by substitute decision-makers (Health Quality Ontario [HQO], 2016). According to recent data from the facility under study, there is lack of an individualized care plan on the geriatric mental health unit. To identify the barrier and needs, the pre-activity phase conducted through a qualitative focus group by inviting the caregivers from two units with 48 beds. Accordingly, the project baseline data collected for a needs assessment through the focus group.
- 3. Individualized nonpharmacological interventions: People living with dementia and symptoms of agitation or aggression receive nonpharmacological interventions that are tailored to their specific needs, symptoms, and preferences, as specified in their individualized care plan (Health Quality Ontario [HQO], 2016).
- 4. Education and training for healthcare providers: BPSD is complex; thus, patients need to receive care from care providers who are trained. Therefore, the education program organized to effectively equip care providers to meet the patients' needs. The education program tailored to the caregivers' responsibility and roles (Health Quality Ontario [HQO], 2016).

Wong (2015) recommended managing common disruptive behaviors or the

underlying cause according to Maslow's hierarchy of needs. Table 1 depicts the

relationship between Maslow's hierarchy and the needs of the dementia patient.

Therefore, I used the Maslow hierarchy in education program for staff understanding of

the underlying cause in dementia patients.

Table 1

Relationship of Maslow's Hierarchy to Dementia Patient

Maslow's hierarchy of needs	Dementia patient needs
Physical and psychological	Desire for comfort
Psychological and economic	Desire for security
Belonging	Need to connect with the outside world
	Need for attention
	Need for self-control"

The needs of a patient with dementia include "a desire for comfort (physical and psychological), a desire for security (psychological and economic), a need for a sense of belonging (including a need to connect with the outside world and a need for attention) and a need for self-control," which are congruent with Maslow's hierarchy of human needs (Wong, 2015, p.769). The use of Maslow is a double-sided, not only benefiting the patients to a quality care plan but also improving the relationship between the caregiver and the care recipients. The intervention is oriented towards "person-centered care" by helping caregivers realize that this behavior is not "intentional" (Wong, 2015).

For the Phase 2 chart audit, I used forms adapted from Jeon et al. (2013) who piloted an educational intervention. The results of the chart audit organized in a table designed to measure the BPSD in patients (See the appendix # 2). The following six behaviors components is considered in chart audit (a) resistance to care, (b) agitation, (c) violence/aggressive behavior, (d) vocalization, (e) wandering, and (f) other behaviors (Karlin et al., 2014). The care plan quality is related to the portion of the care plan that addresses BPSD, and the quantity is the number of care plans and behaviours. I measured the impact of education according to six clusters of BPSD, which are rated according to the Linkert scale. The measurement used to note improvements, fully or partially, for any of the clusters after the intervention. I shared the results of the pre- and post-chart audit with organizational leadership and stakeholders.

The charts on the geriatric inpatient units reviewed for the electronic care plan, (Interdisciplinary Plans of Care [IPOC] and the safety and comfort plan). The chart for the study was drawn from electronic health record at the project facility. In this project, I tested the efficacy of the educational intervention, which is designed to improve the quality and quantity of electronic care plans. The research database held a potential pool of about 48 patients I used to find the eligible participants' chart for study. The inclusion and exclusion criteria were adapted from Assessing Care of Vulnerable Elders (ACOVE) Quality Indicators to Patients with Dementia (Wenger, 2008). I used purposeful sampling to choose the charts for those who met the following inclusion criteria: The person had been diagnosed with dementia; was 60 years of age or older; was screened for cognitive ability, memory, and function by the doctor; was screened for neurological examination; and demonstrated BPSD. The optimal goal of the program is to decrease the occurrence of behaviors in people with dementia by maintaining consistency in care.

Evaluation

Evaluation of the program is in two parts. The care plans of all dementia patients for 30 days prior to the program was reviewed. One month after the program care plans for admitted patients for that month was reviewed. The following criteria was assessed: Participants completed a pre and post questionnaire measuring knowledge related to the objectives of the program. The results of the chart audits and post-test shared with organizational leadership and program stakeholders.

Protections

Walden University approval obtained for this project. The facility signed the consent to participate form in the DNP Manual for Staff Education. Participants signed the consent form from the manual.

Analysis and Synthesis

Descriptive statistics used to evaluate the care plans criteria and knowledge questionnaire pre and post implementation,

Summary

In Section 3, I presented the plan, implementation, and evaluation process for the staff education program. The project designed according to the STAR-VA manual, which presented to staff that care for patients with BPSD.

Section 4: Findings and Recommendations

Introduction

The prevention and management of challenging behaviors is an essential component of care for geriatric mental-health patients, many of whom experience cognitive deterioration in addition to mental illness are diagnosed with dementia. BPSD is a common challenge in the management of this population. Even BPSD has varied manifestations, exhibited as disruptive behaviors and a combination of cognitive and language deficits among Alzheimer patients (Wong, 2015). The project question was: Will an education program on care of patients with BPSD increase staff members' perceived knowledge and competence in providing care to these patients?

Findings and Implications

Findings

As part of a quality improvement initiative, I provided geriatric inpatient units' staff members with education on how to apply evidence-based intervention for older people who experience BPSD. The education was based on the STAR-VA. This project involved two phases. Phase 1 was the education program with a pre- and post-knowledge survey completed by the participants. In Phase 2, I measured the impact of education on practice through a retrospective chart audit. In the retrospective chart audit, I compared components of care plans done prior to and following the education sessions.

Phase One Findings.

I used descriptive statistics to evaluate the knowledge questionnaire pre- and posteducation, and I shared the results with staff through a short presentation. The questionnaire was congruent with the following project objectives:

- Employ the ABC tools in the care planning method within the team, as well as identify goal behaviors, activators, and consequences.
- Identify the LRCR communication technique and nonverbal communication technique.
- Utilize the Interdisciplinary Plans of Care (IPOC) as a tool to maintain consistency and to provide a safe environment.
- Improve the staff competency in managing patients with challenging behaviors.
- Identify the pleasant event, or what the patient enjoys doing as long as it is not harmful to them, utilizing it in daily activities through IPOC and safety and comfort plan.

To determine the efficiency of education, I compared participants' percentage of correct responses with the percentage of correct responses prior to education. A total of 18 questions measured their level of understanding of the core concept of the STAR-VA program, which consists of the ABC tools, and competency in using the tools in practice. The questionnaire was administered to 37 staff who attended both sessions and 47 staff members who attended only first session and completed the pre- and post-questionnaires.

Table 2

			Yes				No		
	Pre		Р	ost	Pre		Pos	st	
	n	%	n	%	n	%	п	%	
Q 1	9	33.0	5	32.0	18	78.0	17	77.0	
Q 2	8	30.7	6	27.2	18	69.2	16	72.7	
Q 3	23	88.4	20	90.9	3	11.5	2	9.1	
Q 4	21	77.7	19	90.4	6	22.2	2	9.5	
Q 5	25	92.5	16	72.7	2	7.4	6	27.2	
Q 6	9	34.6	0	0.0	17	65.3	20 1	00.0	
Q 7	27	96.0	22	100.0	1	4.0	0	0	
Q 8	13	48.1	19	86.4	14	51.9	3	13.6	
	1	NT / 1'		•					

Identifying the Element of STAR-VA and Utilizing Care Plan

Note. Yes / agree = 1; No / disagree = 2.

Questions 1 through 4 addressed the confidence and the stress levels among staff. Question 1 was related to the stress levels of the staff when dealing with patients who were exhibiting behavioural problems. The pretest results were very slightly higher than the post-test. In Question 4, staff were asked about whether they felt confident in their abilities to calm down the patient. The results showed an increase for the percentage of correct responses from 78% to 91%. Questions 2 and 3 were complementary to both Questions 1 and 4 and asked the staff whether they could respond to BPSD. Both questions supported the core concept of education in increasing staff competency. Results showed that providing tools to staff to help them understand the underlying cause of dementia can significantly help staff in managing patients with behavioral issues, improving their level of confidence in patient care and reducing their levels of stress. Question 6 addressed the extreme stress levels among staff when providing direct care to a patient with BPSD. All participants stated that they were not afraid for their safety.

Findings for Question 5 were congruent with those from the focus group question, which asked staff whether they wanted more education. The percentage of positive answers changed from 92.5% in pre-yes to 73% in post-yes. The results signify that the staff still needs support in practicing the newly introduced tools. The needs are considered when designing the program by tailoring the education with one-on-one coaching. Questions 7 and 8 also assessed the level of knowledge among participants as the main concepts of the STAR-VA program. Question seven demonstrated the use of ABC tools and understanding among staff in utilizing the basic elements of the STAR-VA in practice. These findings were supported by the results, showing a slight move in the correct answer from 96% to 100%. The change in practice was clearly revealed in Question 8, the value of IPOC within the team; the answer in supporting the usage of IPOC moved from 48% of respondents to 86% of respondents.

Table 3

		Rating of Acron	ym Identification	
	Knowing the letters LRCR	Meaning of the letters LRCR	Knowing the letters ABC	Meaning of the letters ABC
Preeducation Posteducation	0% 83%	0% 83%	14% 8%	0% 100%

LRCR communication and ABC Tools

To aid staff in understanding the ABC model and the LRCR communication techniques, the acronym identification, Question 9 and Question 10 were designed. There were 100% correct responses for the ABC tool and problem behavior identification in posteducation. Although there was 14% *Yes* response rate in preeducation, this was not combined with the correct answer. In the identification of the LRCR acronym, 83% of staff recalled the meaning of the letters in association with the communication tools after the program. However, prior to education, staff indicated 100% for *No* with regard to LRCR (see Table 2).

Table 4

Communication Strategy and Care Planning Skills

	Pre	correct	Pre i	ncorrect	Post	correct	Pos	t incorrect
	n	%	п	%	п	%	n	%
Q 11	8	17.2%	39	82.0%	7	19.4%	29	80.5%
Q 12	39	84.7%	7	15.2%	35	95.6%	1	0.4%
Q 13	23	53.0%	22	45.0%	32	87.5%	5	12.5%

With Question 11, I assessed the communication strategy and the benefit of using the nonverbal and verbal communication strategies. The participants marked the *verbal* answers to acknowledge the patient, mostly comforting the patient by verbalizing "I will help you" in more than 60%, pre-education and post-education. The correct answer was rarely highlighted in both pre-training and post-training. The problem might be that the highlighted answer was very short and drew specific attention.

Question 12 targeted meaningful activity, and I used it to compare whether staff felt confident in identifying activities that help patients throughout the day in their routine practice, if they were willing to turn responsibility over to another team member such as an occupational therapist, or if they were using a negative re-enforcement technique. The 95.6% correct responses revealed the staff's intention to utilize pleasant and meaningful events in their practice.

Question 13 asked about the best approach to maintaining a safe environment, which was congruent with the focus group question. It assessed the staff's views on whether they believed in using IPOC in response to BPSD. Answers to this question reflected the staff's understanding of the importance of IPOC within the team culture and compared this solution with short-term strategies such as reminding the team, informing team leaders, or APCL. A total of 87.5% of the participants selected the correct response. Table 5

	Strongly agree	Agree	Disagree	Strongly disagree
Q 13 Pre	15	13	0	0
Q 13 Post	17	6	1	0
Q 14 Pre	15	13	0	0
Q 14 Post	19	5	0	0
Q15 Pre	4	20	4	0
Q 15 Post	12	12	0	0
Q16 Pre	9	18	1	0
Q 16 Post	15	8	1	0
Q17 Pre	5	15	6	4
Q 17 Post	15	9	0	0

Identifying the Element of STAR-VA and Utilizing Care Plan

Questions 13 and 14 were handled for the individualized meaningful activities as a core belief in the program, which was indicated by the decrease in the number and frequency of BPSD. The results supported the benefit of the meaningful activities with 60% indicating that they strongly agreed in Question 13, and 79% indicating that they strongly agreed in Question 14. Therefore, staff strongly believed that pleasant activities could decrease the challenging behaviors in patients with dementia. Question 15 reflected the positive changes in staff's competency regarding whether they could calm the patient if demonstrating aggressive behaviors. Answers to this question directly indicated the staff members' abilities to act in crisis after training; a total of 95.8% of the staff responded with strongly agree and agree. Only one participant disagreed about being able to handle the situation.

Question 16 assessed staff's willingness to utilize the elements of the program in their daily practice, including pleasant events, personalized interests, and activities, through IPOC. This was clearly and openly shared by staff, as shown by the increased percentage of respondents indicating *strongly agree*, from 33% pre-education to 62% post-education.

The last question assessed staff's understanding of the importance of goal behaviors for patients with dementia. The strong shift from *agree* in pre-education to *strongly agree* in posteducation showed improved staff skills in changing the problem behavior to goal behaviors. This question could have an extremely positive influence on staff care planning skills.

Phase Two Findings

In phase two of the project, charts were selected based on inclusion selection criteria. Data were collected between October 2018 and January 2019. Six outcomes were assessed based on three measures from "not written" to "fully addressed."

Specifically, the quality and quantity of care plans were measured by comparing data four weeks prior to and four weeks after the educational intervention. A care plan is a tool designed to reflect assessments, describe individualized needs, and provide guidance to meet the specific needs of the individual. These care plans had a standardized format, including an interdisciplinary plan of care (IPOC) and a safety and comfort plan Some care providers were using hard copies based on pre-developed templates. The goal was to maintain up-to-date, electronic, individualized care plans, and to maintain consistency in the delivery of care by all staff members.

Data were collected by reviewing the facility's current care planning through patient charts, which include information about each patient's level of care requirements, as well as any wandering or aggressive verbal or physical behaviour. Patients were included if they met the inclusion criteria, and their baseline demographic and clinical information was collected from their charts, including the type of dementia, medications, age, and any co-morbidities.

The educational intervention was intended to provide nurses with education to improve the quality and quantity of care by enhancing their understanding and competency in providing care for patients with dementia and BPSD. I assessed the outcomes pre- and post-intervention through retrospective chart audits. I collected raw data related to six cluster of BPSD. The results revealed that the number of care plans and the quality of care planning improved after the educational intervention.

The convenience sample was drawn from two units of 48 patients with or without dementia-specific care located in downtown Toronto. Patients were eligible if they were

over 60 years of age with a confirmed diagnosis of dementia. From the total sample size of 48, data were collected for 13 eligible participants pre-intervention and 19 patients post-intervention. To reach all full-time and part-time nurses and allied health care staff at the units, the education intervention takes about five weeks. Care plans were assessed after the intervention and analyzed using an adapted model of Jeon's framework for chart audit. I used the raw data to calculate the number of behaviours in each patient (wandering, verbal and physical aggression, resistance to care, and refusal of medication) and the number of patients who were identified as displaying such behavior. Tables 5 and 6 list the numbers of patients with care plans before and after the educational intervention, as well as the numbers of BPSD behaviours: resistance to care, agitation, verbal aggression, wandering, and refusal of medication. Care plans were considered "fully addressed" if they considered all of these behaviors.

Table 6

		Missing/not	Partially	Fully
	N	written	addressed	addressed
Written care plans	13	7	5	1
C1. Resistance to care	5	4	0	1
C2. Agitation	8	7	1	0
C3. Vocalization	8	5	2	1
C4. Wandering	1	0	1	0
C5. Refusal of medication	2	2	0	0

Preeducation: Identifying Care Planning Skills, Utilizing IPOC and Safety and Comfort Plans

Table 7

	Number	Missing/not written	Partially addressed	Fully addressed
Written care plans	19	0	1	18
C1. Resistance to care	8	0	0	8
C2. Agitation	13	0	1	12
C3. Vocalization	12	0	0	12
C4. Wandering	2	0	0	2
C5. Refusal of	5	0	0	5
medication				

Posteducation: Identifying Care Planning Skills, Utilizing IPOC and Safety and Comfort Plans

As shown in the tables, the majority of the patients displayed aggressive behavior. The second most dominant behaviour was vocalization (yelling, screaming, and shouting). Wandering was the least common behaviour. Patients who were identified with resistance to care exhibited behaviours such as refusal to shower or change clothes. Some client charts recorded behaviours such as problems with taking medication. Close review revealed that most of the recorded behaviours were multifaceted, and that verbal and physical aggression domains were common. One patient was recorded as engaging in self-isolation. One patient was recorded as engaging in sexually inappropriate behaviour; after further investigation, this behaviour was classified as resistance to care.

As shown in Table 6, the post-intervention care plans improved significantly in terms of overall quality and quantity: many more were classified as "fully addressed" (pre-intervention = 1/13, 6.6%; post-intervention = 18/19, 95%). These findings clearly indicate that the educational intervention improved care planning skills. Pre-intervention,

only one patient had a complete care plan and five patients had a partial care plan. Postintervention, 18 of the 19 patients had a comprehensive care plan.

To ensure the sustainability of the project in the units, the Newcastle model was implemented in the form of a weekly behavioral meeting, adapted from the Shared Formulation Session (Jackman et al., 2013; Jackman, 2013) or Information Sharing Session (ISS) (James, 2011) models. These facilitated meetings help caregivers develop an understanding of a patient's behavior by sharing information about the patient's life and experiences, their mental and physical health, and environmental factors. This contextual information helps prompt discussion about the reasons behind the patient's behavior. The facilitator helps caregivers move away from regarding behaviours as problem and toward regarding behaviour as ways to express unmet needs. Patient behaviours are discussed based on the ABC (activator, behavior, consequence) model with a focus on the 4Ws (what, where, when, who). The staff members work together to generate ideas to solve a problem. I initially designed the group structure, and after four sessions, I showed the advanced practice nurses how to facilitate the sessions. This process fosters the formation of a problem-solving team to facilitate and implement a care plan. Overall, these meetings establish a standardized protocol to improve the quality and quantity of care plans in units.

The data collection summary – summary of findings

Finally, I asked staff members to complete a questionnaire to assess their level of knowledge and competency. The results revealed a vast improvement in knowledge and application of communication strategies, ABC tools, and ensuring patient comfort. Post-

intervention, staff members scored almost 100% in awareness of the LRCR (Listen with Respect; Comfort and Redirect) communication. Together with the results of the chart audit, these results reveal significant improvements in the quality and quantity of care plan writing skills.

Implications

This project provided nurses with an education program to improve the quality and quantity of care by enhancing their understanding and competency in providing care for patients with dementia and BPSD. According to Kitson (2008), the evidence from critical social science is under consideration and is reflecting a different reality versus the traditional notion of the organization. As such, one of the potential effects on the findings, internal evolving issue, could alter the implementation and sustainability of my proposed change, which is a lack of staff commitment in writing and implementing the care plan. The other unanticipated limitation was staffing shortage. The unit always has complex patients who required one-on-one attention because of BPSD. The unit also moves staff from their routine care to assist with the close observation, which makes the staffing situation worse. Considering these factors, the stakeholders also reported that the staff is going to attend a variety of mandatory education programs because of upcoming accreditation needs. As a result, the unit budget would not technically cover the cost of my education plan if it requires overtime for staff.

Another unanticipated limitation was the lack of staff knowledge to write an electronic care plan. Some nurses in the unit were not able to identify the process to complete personalized IPOC and comfort and safety plan. Even though the organization

provides support through educators to facilitate the use of electronic care plan, the staff still struggled and also believed that the verbal communication was much more beneficial for the team. The literature supports this notion. Jeungok and Zucker (2013) in their study examined competencies in informatics. Their assessment indicated that knowledge and skills in informatics competencies need to be improved, especially in computer skills for data access and use of decision support systems. Therefore, the staff must be mandated to acquire more competency in entering the information into the informatic system.

Another issue was the significant professional differences in meeting the goal of my project. It was challenging to recognize who would be the most reliable person to receive benefit in performing professional collaboration. Therefore, I included the nurse and allied health care staff for the focus group and education session. As Braithwaite et al. (2013) indicated, nurses are more interested in education programs and allied health staff is the most neutral group with regard to the same education programs.

The potential implications of my project in promoting positive social change is creating a broad framework such as examining the condition of world health. It is important to consider that the environment is global, and analyzing humankind is a global health state matter (Fawcett & Russell, 2001). The outcome of this program with regard to social change is a core value of ultimate social responsibility of any profession, which changing professional practice to improve the quality of care provided. I have the advantage of using the terminology of social justice to present my work to stakeholders and psychiatric clinicians. In this project, I focused on the perspectives of the stakeholders because it is beneficial globally to improve the quality of life of patients with dementia. More specifically, at the local level, positive social change may occur by decreasing anxiety among care providers, and individually equipping the caregivers with effective tools to manage their daily practice.

Recommendations

An important recommendation is to hold further education sessions to provide an opportunity for staff to attain the necessary skills in implementing the STAR-VA model. The other recommendation is to utilize resources in the unit to educate new staff as part of the new employee orientation package. The education manual and PowerPoint presentation along with the STAR-VA link would be beneficial to the unit. STAR-VA asserted that the more sessions held for staff, the more able the staff can perform the skills needed to improve performance (Karlin et al., 2015). The other recommendation relates to the method of teaching. It is better to replace the PowerPoint with role-playing and simulation, because this method is more interactive and allows face-to-face experiences that reflect reality.

After finishing the education and implementation of the weekly behavioral meeting, it is recommended to have a nurse champion spearhead the initiative. The nurse champion would be required to be trained to discuss, to observe behaviors of patients and staff, and to solve problems among BPSD patients. In addition, the education for this project included nurses and allied health care. I strongly suggested to include the multidisciplinary team in an educational project to maintain a culture of ABC tools in the unit. This can significantly change the team approach to managing challenging behaviors.

The staff brought forth experiences of sexual misbehaviors from patients as a very sensitive subject to discuss openly and honestly. My suggestion was to design one specific education session for staff to teach the method of dealing with such sexual misbehaviors of dementia patients toward staff.

The other recommendation is related to the design of the questionnaire. The questionnaire would be clearer by including a case study component within the content; however, it might take more time to be filled out and, thus, produce fewer findings. The results also would be much more accurate when coding preeducation and posteducation considerations by providing the opportunity to compare the levels of knowledge and competency in the same person.

Strengths and Limitations of the Project

One of the strengths of the project was the readiness of staff in receiving the subjects. The program designed is formed exactly according to staff requests gathered through the focus group. During the educational sessions, it was a requirement to bring their own case study in starting the second session. After finishing the first session, staff were more interested in attending the second session to learn the "Get Active" steps. They all were able to utilize ABC in cases in the beginning of the second session. Bringing interesting cases and actively participating in discussion were evident. Staff had the opportunity to discuss how real cases were contoured and highlighted when starting the weekly behavioral meeting. Furthermore, they were able to discuss such complex cases according to the STAR-VA program. In the education session, it was much more

interesting when any example retained some meaning and reflection for staff when attending as a group and working closely together.

One of the limitations was creating two major sessions for the program. The plan was designed for two sessions from the nine recommended sessions by STAR-VA. The concept covers the ABC problem-solving approach: get active, pleasant event, environmental factors, realistic expectation, and communication strategy. The staff has been trained for PIECES; therefore, the assessment and activators were briefly explained. The signs and symptoms of depression and anxiety were skipped in the course content because staff has been well educated about the variety and symptoms of mental health disorders. However, I strongly believed that more than two sessions were needed to give staff enough skills in maintaining the ABC tools.

One of the major project limitations was staffing. The unit is often short staffed with frequent experiences of code white, or an emergency that creates danger for the staff. The education program was canceled several times because of staff shortage and unexpected crises. Therefore, having staff attend education was a foreseeable problem. My project required nurses to be educated because it focused on the action plan, and intervention, for improvement. The Institute of Medicine (Institute of Medicine [IOM], 2011) stated that "Quality of care depends to a large degree on nurses" (p. 26). As such, the quality of care in the health care system depends on nurses who formulate action plans for improvement. Thus, my project is focused on nurses, which makes it difficult to reform health care and move toward a value-based health care (Coleman, 2016).

Both a limitation and an advantage are the use of IPOC and comfort and safety plan for care planning. The advantage is developing consistency in providing care, which in turn improves the quality of life for geriatric mental health patients. At the site facility, the stakeholders were so determined to launch the Electronic care plan; therefore, one of the considerations in my project was to help implement the IPOC and comfort and safety plan among nurses. The project was designed to move practice from the hybrid written and electronic documentation, directly to the electronic version. Staff were educated to write the care plan, and implement the acquired care planning skills in the units. However, in the process of educating staff, it was revealed that IPOC has limited space for writing care plans, which minimized the incorporation of all required information according to the ABC tools in IPOC. The other limitation of IPOC was the existence of an automated IPOC that caused confusion in staff when writing the care plan.

Conversely, cost effectiveness was one of the advantages of the program. The evidence from the study by Schnaider Beeri et al. (2002) visually demonstrated the advantage of trained staff. It calculated the direct and indirect costs related to the care of BPSD patients. The study drew a conclusion by counting the number of hours that the caregiver spent, including indirect costs, providing care for patients with dementia, and how costs could be prevented. My project would be cost-effective because the patient requires more hours from staff when demonstrating BPSD symptoms such as aggression and pacing, exit seeking, or psychosis. When staff come across this kind of situation, the unit managers need to schedule extra staff to maintain safety. This was used, in my project, as evidence to compare the time that staff might be away from care, for

education, to the inevitable cost of paying for extra staff. Another important indirect cost mentioned by Lopez-Bastida et al. (2012) was caregiver burden and depression, which are major risk factors for staff who work with patients with BPSD. Consequently, BPSD is one of the most important factors in causing caregiver burden (Lopez-Bastida et al., 2012). One subject in education is to understand the underlying cause of challenging behaviours through teaching the Maslow hierarchy of needs. It gives staff a realistic expectation of dementia behaviours easing their emotion when dealing with patients with BPSD.

In addition, the advantage of my project is evidenced when comparing the money spent currently in comparison with the results of positive health outcomes in implementing the project for the aging population with BPSD. According to the literature, the indirect costs of BPSD is higher than the direct costs of the patient with dementia. Schnaider Beeri et al. (2002) reported that the annual indirect cost of managing BPSD was approximately \$2,665, a quarter of the total annual indirect cost of caring for a patient with dementia (\$10,520). In addition, the authors reported that the annual direct cost of BPSD was approximately \$1,450, which is more 35% of the total annual direct cost of the population with dementia (\$3,900). The strength of the program may significantly reduce these costs, thereby allowing funds to be allocated toward other health care needs and priorities in Canada.

The brilliant and last strength is designing the weekly behavior meeting. Ploeg et al. (2010), as many other authors, examined the implementation of the Best Practice Guidelines (BPGs) in the clinical placement. The results of 4 years of study are to disseminate the information of practice guidelines through training and coaching, conducting multidisciplinary committees, and continuing the implementation of guideline through organizational policy. Therefore, in creating positive social change in the complex mental health system, the approach must be multidimensional. As a result, I applied the strategy in implementing the change at geriatric unit in terms of maintaining the management of the challenging behaviors. I tailored the training by coaching staff, initiating a weekly behavior management meeting with staff to present the complex cases, and finally at the policy level, recommending to stakeholders adding the ABC tools to informatics system.

Summary

Section 4 presented the findings, recommendation, and also strengths and limitations of the project for the staff education program. The project was designed according to the STAR-VA manual, which is presented to staff who care for patients with BPSD. The results of the prequestionnaire and postquestionnaire along with a chart audit are evidence of the success of the program. Section 5 is going to introduce the dissemination of my findings, and it will also provide an analysis-of-self as my role as a practitioner, scholar, and project manager.

Section 5: Dissemination Plan

Introduction

In Section 5 I present the dissemination plan involving a poster presentation, power point presentation, and paper. I also provide a summary of my scholarly journey through the DNP program, discussing the journey from the beginning to present and the pathway to long-term professional goals.

Dissemination Plan

I will disseminate my findings via the three Ps: posters, presentations, and papers; this multilevel format will foster dissemination at multiple levels. I had developed an educational program for the caregivers of patients with dementia called *Managing Challenging Behaviors According to ABC Tools*, which I had revised over time to ensure its efficacy. I also plan to target scholars and other stakeholders, including the general public, via posters, a conference, and an academic paper. My findings will be translated into actionable results as they are adopted by other geriatric mental health units.

The other avenue of presenting my findings is the poster presentation. Hand (2010) discussed preparing the poster and highlighted the necessity of considering the basic universal questions: who, what, when, where, how, and, most importantly, so what? These questions offered an important means of defining and addressing my targeted audience (see Hand, 2010). I designed the poster according to these five Ws to garner clinician attention. I presented the poster at the Alzheimer Society of Canada annual poster presentation and at project facility annual poster presentation. I considered the clear criteria when preparing the presentation for a different audience for different

purposes to identify how the essential information should be shared, how to share it effectively, and how to evaluate the end product (see Forsyth et al., 2010).

My future career plan is to continue educating staff in the form of presentations at a variety of facilities in the near future (see Oermann & Hays, 2016). I will present the final manuscript of my project to the public in the form of articles.

Analysis of Self

This scholarly journey affected my skills and knowledge, and moved me from being a practitioner toward a project manager. I made this transition with a vehicle of scholarly experiences, which have prepared me for my future career as a leader

The Doctor of Nursing Practice (DNP) degree invites nurses with opportunities to initiate EBP projects in conjunction and collaboration between academic members along with clinical teams. Findings from such innovative efforts are far different from traditional research-based presentations. As such, as a nurse leader, I strived to expand my ability to be representative in nursing practice and to improve outcomes in the health care system.

In this scholarly journey, my intention was to initially achieve the skills to be a clinical leader and to demonstrate clinical expertise. However, while gradually preparing the manual for education and package for ethics, my intention moved towards clinical scholarship, an approach that enables evidence-based nursing to develop the best practice in meeting the needs of clients efficiently and effectively (AACN, 2006).

Clinical scholarship is the future of nursing, flourishing as a result of both clinical practice and academics. As the AACN (2006) has noted, clinical scholars are viewed as

those nurses who are reflective, curious, critical thinkers, who contribute to the clinical environment by translating their knowledge into practice.

This scholarly journey prepared me and taught me to implement the educational intervention, and to evaluate the clinical outcomes of the behavior management project. The DNP program equipped me (a) to be a change agent in improving health care delivery, (b) to be a practitioner, (c) to have a positive influence on the care of vulnerable populations, and (d) to be a scholar to subsequently revolutionize the health care delivery system.

The insight that I gained is the extent of the existing gap in the current health care system. This gap is between theory and praxis in training nurses for a leadership position. Nurses exist in the political vacuum when health policies are formulated, yet the nurse is at the grassroots for implementation. However, many authors such as Antrobus and Kitson (1998) have indicated that the nurse is the only leader who can interpret and translate between the macro issues of policy and the micro issues of practice. Fortunately, the DNP program has assisted me in the process of becoming an effective leader using a vehicle of both nursing practice and health policy reform.

As I reflect on my scholarly journey, in the mentorship program I was supported, guided, and mentored. According to IOM (2010), nursing associations should provide the opportunity for all nurses, through mentoring programs, to develop their leadership skills. Technically, through the scholarly journey in the process of completing my project, I moved back and forth between reluctance and acceptance, negative and positive experiences, and both rejection and welcoming.

The backbone of nursing leaders is to be able to introduce clinical practice issues either directly or indirectly to stakeholders. Congruent with such needs in the health care system, the DNP program taught and equipped me to improve the health care system by identifying the potential gaps that exist within this system.

By gradually earning a high level of clinical judgment in the DNP program, I moved towards designing an educational intervention and planned to deliver the training to improve the knowledge and competency of staff in managing challenging behaviors. Following writing and modifying the educational manual, I planned to support nurses through training and coaching to achieve the maximum potential as a practitioner. Proactive steps included two consecutive education sessions designed for the complex and fast-paced environment of health care. The final step was to evaluate the results of intervention and assess the multifactorial links among practice change, organizational support, and the population needs (AACN, 2006). This learning is a result of the blending of experiences of the practitioner and an academic scholar, which is above and beyond that of my preceding nursing skills.

The last piece that enriched my scholarly journey was sustained therapeutic relationships with patients, in addition to internal factors. I also had to foster positive relationships with professionals and contend with external factors in facilitating optimal care, thereby enhancing patient outcomes. This dual perspective is integral when understanding and learning nursing leadership. As a matter of fact, I have moved back and forth between internal foci and external ones. Externally, this is the relationship that leaders create between nursing and the sociopolitical context, operating between nursing practice and the policy context (IOM, 2010).

In summary, nurse leaders subsequently will translate nursing into the language of politics and policy management. Considering my experience, I can compare the effects of powerless responsibility of practice at the bedside with management authority. My learning was to empower the nurse in practice, to facilitate the translation of nursing from the invisible to the visible. I have planned to use the skills of the DNP as a vehicle to move from nursing to an administrative position. Furthermore, I strongly believe that nursing is a special position within the mainstream health care system, which is empowered and given momentum by DNP programs (Antrobus & Kitson, 1998).

Summary

In Section 5, I discussed how I grew in my role as a practitioner, scholar, and project manager throughout my scholarly journey by being challenged and proposing solutions.

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Appendix A: Pre- and Posteducation Survey

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Surv	ey regarding caring for the patient with dementia and behavior problems		
	(If you agree on checkbox yes; if you disagree checkbox no)	Yes	No
1.	I find it difficult to remain calm when a client is experiencing behavior problems		
2.	I only let the team know when my patient has a behavior problem if it is something I cannot handle.		
3.	I think that it is my job to provide pleasant happy activities for our patients during the day.		
4.	I feel confident that I can calm down a patient who is experiencing behavior difficulty		
5.	I would like more training on how to prevent behavior problems in dementia patients.		
6.	I am afraid, worried, and anxious for my safety when I provide personal care for a patient with dementia.		
7.	When a patient's behavior is verbally aggressive (yelling or cursing), I assessed what had happened before and what had happened after?		
8.	I let the team know through (IPOC) when my patient has a behavior problem every time.		

9. Do you know the letters LRCR in relation to communication with the persons with dementia?

YES or NO

If yes, go to the second part of the question (9b):

9b. What do the letter LRCR stand for? (Fill in below)

R	
Е_	
A	
L	

10. Do you know the letters ABC in relation to behaviours of persons with dementia?

YES or NO

If yes, go to the second part of the question (10b):

10b. What do the letters ABC stand for? (Fill in below)

Α.	
Β.	
С	

11. If a person with dementia is getting upset, which of the following is the best approach to help this patient to be safe and calm down? Please circle your best response.

- 1. Find the patient's assigned nurse who might know him/her the best
- 2. Remind him who you are, as you walk in front of the patient
- 3. Tell the patient to calm down
- 4. Tell the patient that you will help him

12. In order to prevent a person with dementia from developing cursing or yelling or hitting, which of the following is the best response of you to help this patient? Please circle your best response.

- 1. Ask the occupational therapist (OT) to engage more the patient in the activities
- 2. Engage the patient in a group activity, like bingo or a word game.
- 3. Find out the activities and interests that the patient enjoys and then help the patient perform them throughout the day.
- 4. Tell them in a polite manner that their behavior is upsetting other clients.

12. If a person with dementia is very disruptive and unmanageable, what is your best approach to help him/her to be safe? Please circle your best response.

- 1. Incorporate my finding to IPOC
- 2. Remind the team leader to announce the issue in the huddle
- 3. Inform the team about the patient's issue in shift change
- 4. Tell the APCL to write a care plan

13. It is my job to find ways to help the patient to have a pleasant day.

- 1. Strongly Agree
- 2. Agree
- 3. Disagree
- 4. Strongly disagree
- 14. If I help a patient enjoy activities that he/she is interested in, the patient will have less challenging behavior (yelling, cursing, hitting).
- 1. Strongly agree
- 2. Agree
- 3. Disagree
- 4. Strongly disagree
- 15. I am able to help a patient calm down when they are yelling, cursing or hitting me or others.
- 1. Strongly Agree
- 2. Agree
- 3. Disagree
- 4. Strongly disagree

16. I will use personalized interests and activities with my patient and incorporate that in IPOC and in my day-to-day work.

- Strongly agree
 Agree
- 3. Disagree
- 4. Strongly disagree

17. I can identify goal behavior for the client with dementia?

- 1. Strongly agree
- 2. Agree
- 3. Disagree
- 4. Strongly disagree

Give Example

If you like:_____

Appendix B: Chart Audit Table

If inclusion criteria are met, please complete chart audit table below Adapted from Jeon

et al. (2013) and according to BPSD sis cluster categories from Karlin et al. (2014)

Inclusion Criteria:	Aged > 60 years with have dementia	Yes	No						
Yes No	Screened for cognitive ability, memory	Yes	No						
	Screened for function	Yes	No						
	Screened for neurological examination								
Exclusion Criteria	Change in behaviours not related to dementia	Yes	No						
Yes No	Change of antipsychotic medications recently	Yes	No						

	Resistance to care		Agitation		Vocalization		Wandering		Medication resistance	
Education	Pre	Post	Pre	Post	Pre	Post	Pre	Post	Pre	Post
Behaviour present										
Missing/ not written										
Partially addressed										
Fully addressed										