

AN EXPLORATION OF WORK RELATED MENTAL HEALTH ISSUES EXPERIENCED
BY RURAL EMERGENCY NURSES

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Abstract

Nurses working in rural emergency departments (ED) are exposed to trauma, pain, and suffering on a daily basis. They care for members of their community, including friends and neighbours in an unpredictable environment with limited resources. These contextual factors not only have a negative impact on provision of quality patient care, but also create very stressful work environment putting these ED nurses at high risk for experiencing emotional trauma affecting their mental health. This exploratory, qualitative descriptive study used semi-structured interviews to investigate the experiences of rural emergency nurses recruited through purposive sampling. Participants were registered nurses with at least two years of experience working in a rural emergency department. A qualitative content analysis was used to analyze the interviews. Findings describe the impact their work experiences had on the nurses' mental health and illuminate factors that could contribute to the development of compassion fatigue, burnout and PTSD. The findings will be used to inform future research into early recognition and resiliency programs to mitigate the effects of occupational mental health issues for rural emergency nurses.

Keywords: rural nursing, emergency nurses, mental health, compassion fatigue, burnout, PTSD

Dedication

“I am of certain convinced that the greatest heroes are those who do their duty in the daily grind of domestic affairs whilst the world whirls as a maddening dreidel.”-Florence Nightingale

I would like to dedicate this thesis to the nurses who keep the rural emergency departments running 24 hours a day and provide excellent care to their community despite the challenges they face on a daily basis.

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Chapter 1

Statement of the Problem

The topic of concern for this study arises from the experiences of rural emergency nurses. The nurses who work in rural emergency departments (ED) care for members of their community during long shifts in a fast paced environment with limited resources. Nursing in a rural emergency department is a physically and emotionally demanding job. The challenges of working under these conditions can be very stressful for nurses (Healy & Tyrell, 2011). Work place stress can result in nurses developing mental health issues and physical consequences (Potter et al., 2006). These mental health issues, when experienced by nurses, can compromise patient care and safety. The consequences of work related mental health challenges are not isolated to the workplace but also have the potential to disrupt and destroy nurses' careers and family life (Showalter, 2010). We need to take steps to comprehensively understand work place/occupational factors that affect rural ED nurses' mental health and reduce and manage conditions that contribute to these work related mental health issues. This knowledge is vital because of the implications for the nurse's well being, patient care, and health care delivery.

My Lens as the Researcher in this Qualitative Study

As a registered nurse with many years of experience, a longtime rural resident, and having worked in a small rural emergency department, I have a personal interest in the experiences of rural emergency nurses. I grew up on a farm in Southwestern Ontario and if you needed emergency care, it meant you had to drive 30 to 45 minutes to get to the hospital. When you arrived at the emergency department, most likely it would be your family doctor who was covering the emergency and he/she had to be called in from home to see you. The residents of the community were well acquainted with each other and were familiar with the nurses who

worked at the hospital. If you were very ill and admitted to hospital, the hospital would even publish your name in the community newspaper so well meaning visitors could drop in and visit. Privacy was practically impossible and rarely expected.

Over the course of my career I have worked in a variety of places including a regional trauma centre, a community hospital emergency department, and a small rural emergency department. My interest in workplace mental health comes from my own experiences working in these very different emergency departments. I am proud to be an emergency nurse and embrace this as part of my identity. However, along with the physical demands of this work, there are psychological challenges that cannot be dismissed. The problem comes when you find yourself becoming numb to the patients that you are entrusted to care for. I was highly trained, very skilled, and good at my job but felt disconnected between my bedside skills and my capacity to convey a caring attitude towards the patients. I provided excellent “care” for my patients but was becoming cynical and avoiding emotionally charged situations. I tried not to get too involved with patients. I saw this phenomenon manifested in many of my colleagues as well and evident in the way we interacted with the patients and each other. These experiences left me feeling unfulfilled and dissatisfied with nursing and I considered leaving the profession.

It was during a move from Canada to the USA that I had time to reflect and consider my career options. I decided that nursing still had a lot to offer and leaving was not the answer. I left the unpredictable, fast pace of the emergency department and worked in clinical research and pharmaceuticals for a few years. When I returned to Canada I was drawn back to the emergency department. This time I was working in a small rural emergency department that was staffed with two nurses per shift, 24 hours a day. We saw trauma patients from car accidents, farm accidents, and recreational activities. The patients were just as challenging as the ones from the trauma

centre where I had worked but with a rural twist. For example, not every acutely ill patient arrived in an ambulance. On occasion, we had to go to the parking lot to assist a trauma patient out of the back of a truck or administer medication to a patient having a seizure in the front seat of a car. Patients would walk in and ask which nurses were working that day because they knew these nurses personally. The emergency department nurses were often present for the patient's initial diagnosis of cancer, cared for the same patient in the emergency when they had complications from treatment, and eventually nursed them when they died. My nursing colleagues in this small emergency were skilled technicians, incredible problem solvers, caretakers, and members of the community. I was curious if these nurses were particularly vulnerable to work related mental health problems because they knew the patients and had to care for them during extremely stressful situations with limited resources. I wondered if their connection to the community made their job more difficult or was it beneficial to the patients. I also wondered how these rural emergency nurses coped with workplace related stress and what support was available to them. It was the combination of my past experiences, my rural roots and working in this small emergency department that inspired me to explore workplace mental health issues in a sample of rural emergency nurses.

Rural Ontario

The vast geographical makeup of Canada makes it challenging to provide access to emergency care to all citizens in the area. Consequently, this necessitates the maintenance of rural and small hospitals to provide emergency services to the residents who live in these rural communities. The definition of 'rural' is rarely agreed upon and depends on the purpose of the definition. In a review of 107 rural nursing articles Williams and colleagues (2012) found that 42% of the articles did not actually define rural. The Rural Ontario Institute (2013), states it is

not simply population statistics that define what makes a place rural. According to the Rural and Northern Health Care Report Executive Summary (Government of Ontario, 2011) “Rural communities in Ontario are those with a population less than 30,000 that are greater than 30 minutes away in travel time from a community with a population of more than 30,000”(p. 4). In the 2011 census, Statistics Canada reported 14% of Ontario residents lived in rural areas. Being a rural resident means there can be added challenges to access health care. For example, transportation, limited healthcare supply, perceived lack of quality of health care, social isolation and financial restraints (Goins, Williams, Carter, Spencer & Solovieva, 2005). It is important to understand the experiences of emergency nurses within the rural health care environment in order to provide direction to improve patient care for the residents of rural communities and nurses’ work life.

Rural Nurses

In Canada, 10.7% of regulated nurses (Registered Nurses, Nurse Practitioners, Licensed Practical Nurses) work in rural and remote communities ranging from as high as 47.9% in the Northwest Territories/Nunavut to as low as 6.2% in Ontario (Canadian Institute for Health Information [CIHI], 2015). These rural nurses work in an environment that shares many similar characteristics with their urban peers but is also very different. For example, rural emergency nurses often see patients before a physician can arrive and care for others using phone advice from a local physician (Baker & Dawson, 2013). In addition, the limited staffing of a small emergency department at times requires nurses to care for acutely ill patients for many hours before a physician arrives to review the patient (Baker & Dawson, 2013). These nurses usually live in the community where they work and by virtue of this, not only care for their friends but other people they may be familiar or acquainted with from the community such as family

members, a child's teacher, or a neighbor (Bushy, 2005). This integration into the community can have both positive and negative impacts on the nurse's ability to care for patients (Bushy, 2005; McCoy, 2009). For example, knowing the community members may make the nurse more aware of the patient's resources and abilities thus creating a greater connection for care (McCoy, 2009). Conversely, personal knowledge of a patient can also lead to issues with confidentiality, lack of privacy for the nurse and role strain (McCoy, 2009).

Work Place Mental Health

Stress

The workplace is one of the key environments that can impact a person's mental health and can have a significant effect on an individual's well being (World Health Organization [WHO], 2000). Going to work is generally beneficial to workers because along with the financial rewards, it adds structure, social contact, a sense of purpose, informs identity and gives status to the individual (Jahoda, 1981). For some workers, the workplace can also be a source of significant stress (WHO, 2000). Workplace stress can be defined as the harmful physical and emotional effects that can arise when job demands are greater than the control the worker has to meet these demands (Canadian Centre for Occupational Health and Safety [CCOHS], 2016). Job stress is one of the most common work related health problems (WHO, 2000). In the emergency department, there are many factors that can make it a very stressful place to work. For example, poor or inadequate staffing, increased workload, overcrowding, traumatic events, shift work, lack of teamwork and poor management have been shown to contribute to stress in emergency nurses (Healy & Tyrrell, 2011; Adriaenssens et al., 2015). Although stress has long been accepted as "part of the job" for nurses, it can have severe consequences. Stress can affect nurses in various ways including poor decision-making, lack of concentration, apathy and decreased motivation,

all of which can impair nurses' performance and lead to increased errors (Jones, Tanigawa, & Weisse, 2003). In addition, symptoms of stress can lead to absenteeism, poor work performance, and burnout (Hughes, 2008). Nurses who work with ongoing stress are more likely to eat more, smoke, and abuse alcohol and drugs thus negatively impacting their physical health (Burke, 2000; Harvard Medical School, 2012).

Mental health issues such as anxiety, depression, compassion fatigue, burnout, and posttraumatic stress disorder (PTSD) have all been identified as a consequence of workplace stress (Anxiety and Depression Association of American [ADAA], 2016; Aycock & Boyle, 2009). Studies have shown that emergency nurses have a high prevalence of compassion fatigue (Hooper et al., 2010) and symptoms of burnout (Harkin & Melby, 2014). In addition, one study found that 1 in 3 emergency nurses' experienced sub-clinical levels of anxiety/depression and 8.5% met clinical levels of PTSD (Adriaenssens, de Gucht, & Maes, 2012) as a result of the work they do. The Diagnostic and Statistical Manual of Mental Disorders, Fifth Edition (DSM-5) is the first edition to include a chapter on trauma and stressor related disorders acknowledging that work experiences can give rise to mental health problems such as PTSD and compassion fatigue (American Psychiatric Association [APA], 2013). Understanding how the challenge of rural emergency nurses' work can contribute to PTSD, compassion fatigue and burnout is imperative in order to manage the deleterious effects of these mental health issues for these nurses.

PTSD

PTSD is a mental health issue that can occur following experiencing or witnessing a traumatic event (National Institute of Mental Health [NIMH], 2016). Nurses with PTSD can exhibit symptoms such as re-experiencing or reliving the traumatic event, avoiding reminders of

the event and arousal symptoms such as difficulty sleeping, problems concentrating, and irritability (PTSD Association of Canada, 2016).

Emergency department nurses are at high risk for developing PTSD with 1 in 3 nurses reporting symptoms that can indicate PTSD (Helps, 1997; Adriaenssens, 2012). Laposa, Alden and Fullerton (2003) reported 12 % of the emergency nurses in their study met the diagnostic criterion (according to the DSM-IV) for PTSD. The consequences of PTSD in nurses can lead to increased absenteeism, loss of productivity, and a decrease in quality of patient care (Donnelly & Siebert, 2009; Gates, Gillespie, & Succop, 2011). Interestingly, PTSD remains under-recognized as an occupational health hazard for emergency nurses by the American Psychiatric Association (APA, 2013). However, the APA has formally recognized that police, firefighters and first responders are at risk for PTSD as they routinely provide services during traumatic events (APA, 2013). Yet emergency nurses deal with trauma on a daily basis and can, as discussed above, also develop PTSD.

Compassion Fatigue

Carla Joinson, in the journal *Nursing* (1992) is credited with being the first to use the term compassion fatigue (CF). In this article she identifies compassion fatigue as a phenomenon that is specific to those in caring professions, such as nurses and defines it as losing the ability to nurture (Joinson, 1992). The concept of compassion fatigue has evolved since then and more recently the accepted definition is that CF is the result of caring for patients in pain, including physical, emotional and social distress (Sabo, 2005). Symptoms of compassion fatigue include anger, short attention span, headaches, stomachaches, fatigue, and depression (Joinson, 1992). Emergency nurses frequently work with physically and psychologically traumatized patients. The emergency nurses' prolonged exposure to multiple patients' and families' suffering related

to numerous types of trauma leaves them at risk for becoming compassionately bankrupt and vulnerable to CF. Furthermore, nurses who internalize the experience of being involved in these traumatic events are often left with intrusive thoughts and anxiety just like their traumatized patients (Showalter, 2010). The ramifications of CF are multiple and not only affect nurses in their professional lives but carries over to their personal life as well.

Charles R. Figley is considered a leading expert in the area of stress disorders and compassion fatigue, also referred to as *secondary traumatic stress* (STS) (Figley, 1995). His work focuses on people such as firefighters, paramedics and emergency room personnel (doctors, nurses, support personnel) who treat traumatized people. In his book, *Compassion Fatigue Coping with Secondary Traumatic Stress Disorders in Those Who Treat the Traumatized* he identifies the personal and professional impact of compassion fatigue on an individual. Personal impacts include cognitive, emotional, behavioral, spiritual, interpersonal, and physical complaints (Figley, 1995). Professional impacts include decreased performance of job tasks, low morale, difficult interpersonal relationships, and behavioral problems (Figley, 1995). Long-term consequences of compassion fatigue may include self-destructive activities such as chronic overeating, drug or alcohol use (Portnoy, 2011).

Burnout

For health care workers such as nurses, burnout is a term used to describe a psychological state resulting from continued exposure to psychosocial risk factors. Emergency nurses are particularly vulnerable to burnout related to the demands of their job, lack of job control and social support, and exposure to traumatic events (Adriaenssens, De Gucht & Maes, 2015). Burnout is characterized by emotional exhaustion (extreme energy loss, physically and emotionally drained), depersonalization (negative attitudes, cynicism), and decreased personal

accomplishment (failure to meet goals, lacking personal and professional competence) (Adriaenssens et al., 2015). Adriaenssens et al. (2014), in their systematic review of burnout in emergency nurses, found 26% of nurses suffered from burnout.

Addressing burnout in emergency care providers has implications for patient safety. Lu et al., (2015) conducted a cross-sectional study of 77 emergency physicians and found 57% experienced burnout. Burnout was associated with increased self reports of providing sub-optimal care such as not treating a patient's pain quickly, admitting or discharging patients too quickly and not communicating effectively with patients and colleagues (Lu et al., 2015). For nurses, burnout negatively affects patient care and increases cost to the hospital because of absenteeism, conflicts with staff members, turnover and nurses leaving their job and the profession (Hunsaker, Chen, Maughan & Heaston, 2015).

Compassion fatigue and burnout share some long-term consequences such as low morale, absenteeism, and apathy (Jones & Gates, 2007). Despite their similarities, burnout and compassion fatigue are distinct phenomena and are described in Table 1.

Table 1. Differences between burnout and compassion fatigue

Burnout (Maslach & Jackson, 1982)	Compassion Fatigue (Figley, 1995)
Linked to workplace stressors (feeling powerless, overwhelmed and frustrated by work environment)	Results from caring for patients (hearing, seeing, caring for trauma patients)
Emerges gradually	Can emerge suddenly
Easy to identify	May not be obvious
Can affect any profession	Only affects those who work with traumatized people

Recognition of Occupation Related Mental Health in Emergency Nurses

Emergency nurses are at high risk for experiencing mental/emotional distress/injury at work (Laposa, et al., 2003; Adriaenssens et al., 2015) that meets the criteria defined under the

DSM-5's "mental-mental" injury category (APA, 2015) i.e. mental stress that causes mental injury. Recognition that the work of emergency room nurses can cause mental health problems such as PTSD is very important to the profession and the sustainability of an effective health care system. Formal recognition of the occupational risks to ED nurses' mental health is required in order for nurses to be included in the Workplace Safety and Insurance Act (WSIA) in Ontario (WSIA, 1997). In the past, the Workplace Safety and Insurance Board (WSIB) have denied claims for mental stress if it is an expectation in your line of work. (Human Resources Professionals Association [HRPA] Today, 2015). In 2014, this position was challenged by a nurse who was originally denied benefits and subsequently, the decision was overturned on an appeal to the Ontario Workplace Safety and Insurance Appeals Tribunal (WSIAT). In *Decision No. 2157/09*, the tribunal concluded the original denial of her claim to be unconstitutional and a violation of the Canadian Charter of Rights and Freedoms (WSIAT, 2014). In the tribunal's decision, it is noted that mental stress is similar to a physical disability and can occur gradually and not just from a sudden and unexpected event (WSIAT, 2014). This decision is of great interest to Ontario employers because it expands the definition of mental stress under the WSIA. Employers are encouraged by the WSIB to identify and limit stress for Ontario workers in order to reduce claims to WSIB as a result of workplace stress. Additionally, employers with ongoing mental stress cases are advised by lawyers to carefully document events, and review policy and procedures to protect themselves from additional mental health claims (Hicks Morley Hamilton Stewart Storie LLP, 2014).

More recently in Ontario, on April 7, 2016, the WSIB updated their policies to include *Posttraumatic Stress Disorder in First Responders and Other Designated Workers* (Document 15-03-13) (WSIB, 2016). In order to file a claim, the worker must be a first responder as defined

by the WSIB and be diagnosed by psychiatrist or psychologist as having PTSD as a result of their work. Emergency nurses are not included on the list of first responders eligible to make claims for work related mental health issues such as PTSD. Legislative bodies such as the WSIB need to recognize that the work experiences of emergency nurses can contribute to workplace mental health issues in order to allow access to financial support and programs to address the deleterious effects of these conditions.

Research Question and Study Aims

This Master of Science in Nursing thesis will address the following research question: What are the experiences of rural emergency nurses that can contribute to, or leave rural emergency nurses vulnerable to the development of work related mental health issues? The study design is an exploratory, qualitative descriptive study that aims to (a) explore the experiences of rural emergency nurses that can affect their mental health; (b) give voice to rural emergency nurses regarding the everyday challenges of caring for their patients; (c) contribute to knowledge, that when disseminated amongst nursing and health professionals can inform policy and program development to address rural emergency room nurses' occupational mental health issues. Findings from this research will illuminate conditions that leave rural emergency department nurses vulnerable to the development of mental health issues such as compassion fatigue, burnout, and PTSD and will help inform programs to improve the mental well being of these nurses.

Within the next section, I will review the literature on emergency nurses' work related mental health issues and rural nursing and provide a summary of what is currently known and what is lacking. This will further support the need for a qualitative examination of the

experiences of rural emergency nurses and how these experiences can contribute to occupation induced mental health issues.

Chapter 2

Literature Review

As I reviewed the literature on nurses' workplace mental health issues it became clear that there was very little research on the experiences of nurses working in a rural emergency department. Furthermore, I was unable to find any studies specifically exploring burnout or compassion fatigue in rural emergency nurses within the nursing literature. Most of the studies on stress and emergency nursing were at least 10-15 years old. During the search of the literature recent studies on workplace occupational stress for emergency nurses included search terms such as compassion fatigue, burnout and PTSD rather than stress. Most of the research I found on work related mental health issues for nurses originated in the USA, some were conducted in Europe and Australia, but few Canadian studies were found. Search terms used to guide the search of the literature included both mental health and emergency nurses combined with several other terms such as secondary traumatic stress, workplace mental health, occupational health, experience, stress, depression, compassion fatigue, burnout, PTSD, community, first responders, emergency, nursing, rural nursing, and nurses. Searches were conducted in CINAHL, Proquest, Medline, Joanna Briggs Institute Evidence Based Practice Database, and PsycINFO databases. The reference lists from relevant articles were reviewed to identify other sources that were not identified in the data base searches. Internet searches using Google and Google Scholar were also conducted to search for updated government statistics, workplace mental health initiatives, and key nursing organizations roles and positions on workplace mental health.

I reviewed research focusing on workplace/occupational mental health issues related to physicians, nurses, and first responders. Searches on stress, burnout, and PTSD were conducted 1970 forward and compassion fatigue from 1990 to 2015. Much of the literature on compassion

fatigue and burnout began in the early 1990s with Charles Figley's work on secondary traumatic stress (also known as compassion fatigue) (Figley, 1995). More recently, workplace mental health has become a research interest for other emergency responders such as fire, police and paramedics.

Nurses and Stress

In the United States, the American Psychological Association (APA) conducts an annual nationwide survey to examine stress in samples of the general population. In the most recent survey completed in 2015, 3361 adults were selected from a volunteer pool of people by an external polling agency and asked about their experiences with stress. In this sample, 67% identified work as a very or somewhat significant source of stress (APA, 2015). This stress has negative impacts on the physical and mental health of the worker. For example, 39% of participants' reported overeating or eating unhealthy foods, 46% lay awake at night due to stress, and almost one half of the participants admitted to yelling or losing patience with their spouse or partner when feeling stressed. The survey results indicate that work stress is a significant public health issue impacting a large proportion of the general population with negative physical and emotional consequences.

The Center for Disease Control (CDC) has recognized that hospital workers' exposure to stress is an occupational hazard (Center for Disease Control, 2008). Stressors commonly experienced by hospital nurses include inadequate staffing levels, long work hours, shift work, role ambiguity, and exposure to hazardous infections and substances (CDC, 2008). Other factors linked to stress in nurses include work overload, time pressures, lack of support from administration, work related violence, sleep deprivation, and dealing with seriously ill patients (CDC, 2008). According to the APA (2007) work stress can be very damaging to both nurses'

personal and professional lives. These stressors can have an adverse effect on the health of the nurse and may manifest as irritability, depression, job dissatisfaction, absenteeism, and physical complaints such as high blood pressure, headaches and upset stomach (CDC, 2008). In addition, high stress levels for nurses can lead to depression, anxiety and substance abuse (Trinkoff, Zhou, Storr, and Soeken, 2000; Epstein, Burns, and Conlon, 2010).

Wolfgang (1988) reported that nurses experience more job stress than other groups of health care professionals. Wolfgang mailed a questionnaire to 3,105 randomly selected healthcare professionals in the USA including an equal number of nurses, physicians and pharmacists. He reported a 42.1 % response rate. The participants completed a Health Professionals Stress Inventory consisting of 30 job situations (such as being interrupted during work or conflict with coworkers) and answered using a Likert-type scale of 0 to 4 for the responses. The validity of this instrument was developed from studies of stress in health professionals. He found that nurses had significantly higher scores on 17 of the 30 items compared to the other health care professionals (Wolfgang, 1988). Work overload, conflicts with coworkers and supervisors, and items concerning the emotional needs of patients and allowing their own feelings to interfere with caring for their patients scored higher (more stressful) for nurses than for the physicians and pharmacists. This study is important because it identifies that sources of stress can be different for nurses when compared to other healthcare professionals. In addition, the findings of this study support the need to understand sources of stress for nurses in order to eliminate stress related consequences for nurses.

When nurses experience high levels of stress they may be less likely to provide high quality safe care. Several studies have reported that if a nurse in the emergency department experiences increased stress, it is often correlated with decreased patient safety (Carayon &

Gurses, 2005; Elfering, Semmer, and Grebner, 2006). Stress in emergency nurses can impact patients in other ways as well including medication errors, poor clinical decision making leading to patient harm, and unprofessional conduct (Adriaenssens, De Gucht, & Maes, 2012, Kawano, 2008). A stressful workplace for nurses can also contribute to negative patient satisfaction (Adams, 2015).

How a nurse reacts to this stress can be impacted by many factors including coping strategies and personal and environmental characteristics. Hinderer et al. (2014) conducted a cross-sectional quantitative study to examine the relationship between compassion fatigue, burnout and secondary traumatic stress in 128 trauma nurses in a large urban trauma centre in the USA. The researchers administered a Likert-style demographic/behaviour instrument, a quality of life scale (ProQOL), and the Penn Inventory to measure secondary traumatic stress. The researchers found 35.9% of the nurses experienced burnout or were at high-risk for burnout and 27.3% reported compassion fatigue. Burnout and compassion fatigue were strongly correlated with each other. Furthermore the researchers found that nurses' quality of relationships with co-workers had a significant correlation to burnout. The support of a colleague and/or a supportive work environment had a positive correlation to the nurse's wellbeing and was associated with less burnout (Hinderer, 2014). Compassion fatigue was associated with increased hours per shift, weak work relationships and lack of effective coping mechanisms. The researchers theorized that the additional stress of working with trauma patients plus the long hours may explain why the nurses had a higher incidence of compassion fatigue with increased hours per shift (Hinderer, 2014). This study highlighted the need for additional research studies on the effect of the stress in the workplace and how the experience of working with trauma patients can lead to burnout,

and compassion fatigue in nurses as well as the benefits of social support. More research is indicated in order to understand these phenomena.

Stress in nursing in general has been the focus of many research studies on workplace mental health. However, I did not find any studies exploring workplace stress for Canadian emergency nurses. I did find a few studies from other countries specifically examining stress in emergency nurses. An Australian qualitative exploratory study by Happell et al. (2013) examined the effects of stress on 38 registered nurses working in an acute care hospital. Six focus groups were conducted with R.N.s. Emergency nurses were included in the study sample as well as other specialties. Sources of stress identified included high workloads, unavailability of doctors, missing breaks, and staffing issues. This study highlighted the importance of stressors for nurses that can contribute to occupational mental health issues (i.e. burnout and compassion fatigue) and the importance of involving nurses in identifying sources of stress in their workplace. Limitations of this study included lack of transferability of findings due to the sample being from only one hospital. The authors acknowledged the need for further studies taking geographical settings into account to understand environmental factors in the evaluation of stress (Happell et al., 2013). The results from this study support the need for Canadian research to explore sources of workplace stress that can contribute to mental health issues for these nurses in various contexts, including a rural environment.

In Iran, Golshiri, Pourabdian, Najimi, Zadeh, and Hasheminia (2012) conducted a study of stress of (42) nurses working in emergency departments compared to (42) clerks who worked in the hospital. Stress was measured using a generic questionnaire developed by the National Institute for Occupational Safety and Health (NIOSH) and the measurement of stress markers in saliva from the participants. Results of the study indicated the emergency nurses had

significantly higher stress levels compared to clerks. This study also shows that emergency nursing is significantly more stressful compared to other occupations and highlights the need to identify sources of stress for emergency nurses in order to manage these stressors and provide a healthier work environment for them.

Adriaenssens, De Gucht, and Maes (2015) examined causes and consequences of occupational stress in 15 emergency departments in Belgium. This longitudinal study included 308 nurses at the first time point and 204 nurses at the second time point, 18 months later. The participants completed a Leiden Quality of Work Questionnaire for Nurses to measure job characteristics and outcomes. The researchers found the turnover of emergency nurses to be high with almost 20% of the nurses leaving their job within the 18 months between time point one and two. The researchers found significant changes over time in predictors and outcomes of occupational stress in emergency nurses. Changes in job demand, control and social support were significant predictors of job satisfaction, work engagement and emotional exhaustion. This study highlights the need for identification of workplace stressors for emergency nurses and the importance of early intervention to reduce turnover. There is a gap in the research with Canadian emergency nurses to identify sources of workplace stress and to reduce the effects of this stress over time.

Work Experiences and Rural Emergency Nurses

Very few studies have been conducted on rural emergency nurses to explore how stressful work experiences can affect their mental health; however, one study was found that examined the work experiences of rural first responders. Pyper and Paterson (2016) conducted one of the first studies to examine fatigue and mental health in rural first responders. A sample of 132 rural and regional ambulance personnel in Australia completed a mixed methods survey to

assess fatigue, stress and emotional trauma. The findings of this study highlighted the unique aspects of working in a rural environment such as treating people they knew, working alone, and longer response times for the ambulance to reach people in need. Seventy-nine percent of the participants reported that treating people they knew was stressful. However, their findings also suggested that the rural first responders found treating people they knew who were not seriously ill, rewarding (Pyper & Paterson, 2016). The researchers concluded that working with known patients in a community may offer a degree of “protection” from stress for the emergency workers. The researchers also found that the first responders reported high levels of fatigue and emotional trauma. Limitations of this study included a predominantly male sample and low response rate (22.3%). The findings from this study support the need to study rural emergency workers within the Canadian context.

One Australian study examined stress producing factors in rural emergency nurses. Using Delphi technique, Dwyer (1996) sampled a group of six registered nurses from a rural emergency department to determine the six most significant stress factors they face as a result of their work. The participants were asked to identify their workplace stressors. Once they had identified all their workplace stressor, they came to an agreement on a list of the six most important stressors after a series of discussions and votes. The most significant stressors identified were caring for children, lack of resources, concerns for their own competency, caring for family or friends, overcrowding, and concern for their own unit (if they pull from their own unit to assist in the emergency department). Nurses with more experience reported less stress when caring for known patients than younger or less experienced nurses. The researchers attributed this to the older nurses being more established in the community and having a stronger social support network. Limitations of this study include a small sample size (6) and the use of

one site to conduct the research. Dwyer's (1996) findings support the need for Canadian studies to identify and examine the major stressors Canadian rural emergency nurses' experience.

Very few studies, and no recent Canadian studies were found examining stress and the relationship of work environment to stress for rural emergency nurses. One Canadian study was found from 2002 exploring stress and coping in rural nurses who cared for trauma patients requiring transfer to another facility (Moszczynski & Hanley, 2002). This qualitative study used four focus groups including 19 rural nurses to explore stressful situations encountered when transferring a trauma patient. Findings of the study identified stressors such as lack of resources, communication issues, visual impact of the patient, and professional discord. This study does highlight the differences between rural and urban nursing environments including close community ties, a broader scope of practice for the nurses, professional isolation and lack of backup, social unity between work and community, and the high visibility of the nurses in the community. This study supports the need for current research into the stressors rural nurses in Canada experience as a result of their work.

Compassion Fatigue (Secondary Traumatic Stress) in Emergency Nurses

There were few studies on compassion fatigue and emergency nurses. No literature examining the prevalence of compassion fatigue in Canadian emergency nurses was found. Two studies conducted in the USA found a high prevalence of compassion fatigue in emergency department nurses. Dominguez-Gomez and Rutledge (2009) conducted the first quantitative study of secondary traumatic stress (STS) among emergency nurses. This study used the Secondary Traumatic Stress Scale (STSS) to measure STS in 67 emergency nurses from three general community hospitals located in Southern California. The researchers found that 85% of the nurses reported at least one STS symptom in the past week and 33% had a score high enough

to meet the criteria for STS as described in the Diagnostic and Statistical Manual of Medical Disorders, Fourth Edition (DSM-IV) (Dominguez-Gomez & Rutledge, 2009). The diagnostic criteria were met if the participants had 1 intrusion symptom (reminders about work that upset them), 3 symptoms of avoiding clients, and 2 arousal symptoms (easily annoyed or difficulty sleeping).

Hooper, Craig, Janvrin, Wetsel, & Reimels (2010) conducted a quantitative study to compare the compassion fatigue levels of emergency nurses with nurses in other acute care hospital units. This study was an exploratory cross sectional survey of 109 nurses from a large urban hospital in the USA using the Professional Quality of Life: Compassion Satisfaction and Fatigue Subscales, Revision IV (Stamm, 2010) which have an alpha coefficient of .80 and is considered a valid tool to measure compassion fatigue and burnout. This study found 86% of the emergency nurses' surveyed demonstrated moderate to high levels of compassion fatigue and 82% of the emergency nurses had moderate to high levels of burnout (Hooper et al., 2010). The prevalence of compassion fatigue and burnout was very high for the emergency nurses but not significantly higher compared to other nursing units. This study failed to support the hypothesis that emergency nurses are at a greater risk for compassion fatigue compared to nurses in other inpatient areas. Limitations of this study include the use of one hospital site and small sample size. The researchers acknowledge the sample size could only identify trends and a larger sample would be helpful in determining with statistical significance if differences between specialties exist. Another limitation of this study was the measurement of compassion fatigue and burnout at a single point in time and did not take into consideration changes over time or changes in the workplace. The investigators suggest more studies exploring the work environment of emergency nurses are indicated (Hooper et al., 2010).

These studies both reveal a high prevalence of compassion fatigue in emergency nurses working in urban and community hospital settings. The prevalence of compassion fatigue has been demonstrated to be significant for nurses in these large hospital emergency departments, however, there is a gap in the literature examining the prevalence of compassion fatigue and how it affects nurses working in smaller rural ER departments.

Burnout in Emergency Nurses

There are few studies of burnout in Canadian emergency nurses. Researchers from other countries have found that nurses who work in high-risk areas such as critical care are vulnerable to burnout (Rushton, Batcheller, Schroeder & Donohue, 2015; Klopper, Coetzee, Pretorius & Bester, 2012, Hooper et al., 2009) but emergency nurses are even more so due to the unpredictability of the environment, patient overcrowding, and exposure to injuries and trauma while at work (Adriaenssens et al., 2014). In a systematic review and meta-analysis of seventeen quantitative studies from 1989 to 2014, Adriaenssens et al., (2014) surmised that more than 25% of the emergency nurses suffered from burnout. In addition to a high prevalence of burnout, this review also identified many determinants of burnout in the studies reviewed such as job demands, lack of job control, poor social support, and exposure to traumatic events. In general, a younger age was found to be related to a higher risk of burnout (Adriaenssens et al., 2014) but some researchers such as Hooper et al.,(2010) found no relationship between age and seniority to burnout.

Despite the large body of research into burnout, it is not recognized as a distinct disorder in the DSM-V but is recognized in the International Statistical Classification of Diseases and Related Health Problems (ICD) (WHO, 2016) as *Problems Related to Life Management Difficulty* (Sec. Z73). Historically, experiences that lead to burnout in nurses have been regarded

by the healthcare community as the personal responsibility of nurses and not as a result of their work environment (Gillespie & Melby, 2003). Research has shown that burnout is the result of many factors including the work environment such as staffing and workload (Klopper, Coetzee, Pretorius, and Bester, 2012; Coffey, 1999).

Researchers have found a wide variety of individual or job related factors that can contribute to burnout in nurses. Burnout in critical care nurses can be attributed to the high acuity of the patients' illnesses, uncertain patient outcomes, and the witnessing of patient suffering and death (Rushton et al., 2015). Nurses' experience of moral distress has also been found to be a predictor of nurses' development of burnout (Mobley, Rady, Verheijde, Patel, and Larson, 2007; Rushton et al., 2015) and leaving their jobs (Corley, Minick, Elswick, and Jacobs, 2005). Moral distress arises when a nurse makes a decision about the right course of action but cannot carry it out due to an obstacle, such as institutional policies (Canadian Nurses Association [CNA], 2003).

A quantitative study by Klopper, Coetzee, Pretorius, and Bester (2012) surveyed 935 critical care nurses from 62 hospitals and identified a link between work environment, job satisfaction and burnout. They found that inadequate staffing and resources contributed to high levels of burnout in critical care nurses in South Africa (Klopper et al., 2012). This study also highlighted the importance of the nurse manager's leadership in providing staff support, adequate staffing and opportunities for staff advancement to improve nurses' job satisfaction.

Nurses working in an environment where there is a likelihood of physical or verbal aggression (such as the emergency department) are more vulnerable to the effects of burnout (Coffey, 1999). Rates of violence against nurses are extremely high. For example, in a task force report by the Calgary Health Regional Authority, 54 per cent of nurses surveyed had experienced verbal abuse in the past 12 months, and 22 per cent have experienced physical abuse in the past

12 months (Staff Abuse, 2000). Violence against emergency nurses is highly prevalent (Gacki-Smith, Juarez, Boyett, Homeyer, Robinson, and MacLean, 2009). Gacki-Smith et al. (2009) conducted a quantitative cross sectional study that surveyed members of the Emergency Nurses Association of the United States. A total of 3,465 nurses responded. Finding of this study revealed that 50% of participants had experienced physical violence, 70% had experienced verbal abuse and one-third had considered leaving their job because of violence in the emergency department.

A hospital environment, where there is a top down management style (meaning decisions are made by a manager about how changes are to be made), can increase burnout in nurses (Stordeur, Vandenberghe, & D'hoore, 1999). The effects of burnout can be underestimated by managers who do not have insight into the local/front line issues and concerns of the nurses (Koivula, Paunonen, & Laippala, 2000). Burnout not only affects the nurse but can also have implications for the patients as well. Vahey, Aiken, Sloan, Clark, and Vargas (2004) conducted a cross-sectional survey of 820 nurses and 621 patients from 40 units in 20 urban hospitals in the USA to look specifically at nurse burnout and patient satisfaction. The nurses completed surveys including the Maslach Burnout Inventory, a revised Nursing Work Index, and intent to leave survey, while the patients completed a patient satisfaction scale. Findings from this study showed that patients cared for on units where the nurses said they had adequate staff, good administrative support and good nurse/doctor relations were twice as likely to report satisfaction with their care compared to units who did not share these qualities. The units with better staffing and relationships among staff also had significantly less burnout reported by the nurses. This study highlights the fact that nurse burnout has a direct effect on patient care and patient

satisfaction. In addition, this study indicates that improving the working conditions (such as reducing workload) for nurses has a significant impact on reducing burnout.

In one Canadian study the relationship between burnout and nurse turnover was examined in a sample of 667 nurses from various work environments. Leiter & Maslach (2009) conducted a quantitative study using the Maslach Burnout Inventory, a Worklife Scale, and Turnover intentions (with a Likert type scale) to examine the relationship between aspects of work life, and burnout to intent to leave their job. The researchers concluded that aspects of work life such as workload and relationships with coworkers can predict burnout, which in turn predicts intent to leave. Critical aspects of burnout found in this sample included cynicism, value conflicts and inadequate rewards. This study supports the need for ongoing research into the work environment of Canadian nurses and the relationship between work and burnout.

PTSD

In the newest version of the Diagnostic and Statistical Manual of Mental Disorders (DSM-V) PTSD was moved from being an anxiety disorder to the new category of Trauma and Stress Related Disorders (American Psychiatric Association [APA], 2013).

Emergency workers are at high risk for developing PTSD. Berger et al. (2012) conducted a systematic review of studies examining emergency workers and PTSD. From a total of 28 studies, reporting on 40 samples with 20,424 participants, the researchers concluded that worldwide, one in 10 emergency workers have PTSD.

Emergency nurses are vulnerable to post traumatic stress reactions because the nature of their work requires them to be repeatedly exposed to traumatic events. Even so, studies examining emergency nurses and PTSD are few. PTSD is characterized by 3 main symptoms including re-experiencing the traumatic event (nightmares, recollections), avoidance of trauma

related events and feeling numb to emotions, and arousal symptoms such as not being able to sleep (APA, 2013). In order to make the diagnosis of PTSD, these symptoms must last longer than a month and cause the individual to have difficulty functioning socially, occupationally or in another significant manner (APA, 2013). According to the DSM-V, PTSD can develop from direct involvement with a traumatic event or by secondary sources such as witnessing the trauma of others (APA, 2013).

Rates of PTSD have been found to be higher in emergency nurses compared to other nursing specialties (Figley, 1995; Boudreau & McCabe, 2000). Laposka & Alden (2003) conducted the first study to examine the association between workplace stress and PTSD symptoms in emergency department personnel. In their study of 51 Canadian emergency room personnel found 12% met full criteria for a diagnosis of PTSD and 20% had PTSD symptoms. The researchers administered a questionnaire to 51 emergency department employees from a large urban hospital to measure job stress and PTSD. The majority of the participants (73%) were direct care providers such as nurses and physicians, 21% administrative, and six percent were support personnel such as techs or housekeeping. In this sample, 67% of the participants felt they had not received proper support from administration following a traumatic event, 20% considered leaving their job and only 18% attended debriefings offered by the hospital. Consequences of PTSD for nurses can be significant including changing the way they view themselves in the world, feeling hopeless, blaming themselves, and being preoccupied with danger and fear (Daniels et al., 2011). A nurse with PTSD may exhibit hypervigilance and/or inaction when caring for patients, quit her/his job, have difficulty sleeping, and can have problems with relationships (Mealer & Jones, 2013).

In Belgium, Adriaenssens, De Gucht, and Maes (2012) administered a questionnaire to 248 emergency nurses from 15 hospitals to determine the rate and impact of PTSD. This was a cross-sectional quantitative study utilizing measures to examine frequency of exposure to traumatic events, coping strategies, social support, post-traumatic stress reactions, psychological distress and somatic complaints, fatigue, and sleep problems. The researchers found one out of every seven emergency nurses had symptoms that would support a diagnosis of PTSD. This study showed that emergency nurses are at risk for PTSD, which has negative effects on physical and mental wellbeing. The prevalence and severe impact of PTSD for nurses (and ultimately on patient care) support the need for more studies examining how the work environment contributes to the development of PTSD in emergency nurses.

Gender

Men and women report different physical and mental reactions to stress (APA, 2016). According to the APA (2016), in the USA, women are more likely than men to report having a great deal of stress and 65% of women report work as a source of stress. Additionally, stress for women is on the rise with almost one-half of women reporting that overall stress has increased over the past 5 years. Additionally women are more likely to report physical and emotional responses to stress such as headaches, crying, and upset stomach. More women (68%) than men (62%) report work and work/family conflict as a significant source of stress (APA, 2016). Even so, gender is rarely accounted for in studies of nurses examining stress related mental health issues such as PTSD, compassion fatigue, and burnout. Studies examining other caregivers suggest it may be a factor.

Almberg, Grafstrom & Winblad (1997) conducted a study of 46 caregivers' experience of burden and burnout when caring for an elderly relative with dementia and suggested that females

become more emotionally involved and therefore experience burnout more frequently than their male counterparts. Another study examined a sample of neonatologists and pediatricians. Burnout was found more frequently in the female (79%) vs. the male (62%) physicians (Marshall, Zahorodny & Passannante, 1998). In a study of Finnish nurses, Kandolin (1992) found no gender differences in burnout or in stress symptoms in male and female shift workers. However they found that female nurses who experienced workplace violence were more strongly connected with burnout. This may have implications because 93.4% of nurses in Canada are female (CIHI, 2012). If the overwhelming numbers of nurses in Canada are women, research exploring the workplace and how it impacts their mental health would be helpful in understanding gender differences in regards to responses to stress and stress management.

Rural Nursing

There are approximately 93 rural hospitals in Ontario (Ontario Joint Policy & Planning Committee, 2006). Access to quality health care in rural Ontario is a long-standing issue. The Ministry of Health and Long-Term Care of Ontario in its report *Rural and Northern Health Care Framework/Plan* (2012) stated that providing appropriate access to health care in these communities could be challenging due to geographic location, long distances, low population densities, less availability of qualified professionals, and inclement weather conditions. Approximately 6.2 % of Ontario's nurses work in these rural communities (Canadian Institute for Health Information [CIHI], 2015).

Rural nursing theory developed by Long and Weinert (1989) identified three aspects unique to nursing in a rural environment. These are: 1. Rural dwellers define health as the ability to work and be productive; 2. People who live in rural areas are self-reliant and resistant to help from perceived outsiders; and 3. Health care providers in rural areas must deal with a lack of

anonymity and greater role diffusion than those who work in urban areas (Long & Weinert, 1989). A qualitative study examining rural patients and their community by Lee and Winters (2004) validated these statements. In their study, 38 adults from 11 rural communities in the USA were interviewed about their health and how they respond to health issues. A content analysis was used to identify themes. In addition to validating the statements of Long and Weinert, Lee and Winters (2004) added the additional themes of choice of residence, distance to health care, and access to resources as challenges for patients living in a rural area. The study findings support that nurses working in rural areas experience many challenges when providing health care to their patients that are different than their urban peers. Despite these differences, few studies specifically examine nursing from a rural perspective.

Researchers such as Beckstrand, Giles, Luthy, and Heaston's (2005) have identified other challenges of rural care. For example, providing end-of-life care to patients in a rural emergency department can be difficult. Beckstrand et al. (2005) administered a 57-item questionnaire to 52 rural emergency department nurses in the USA to compare results from non-rural studies to see if rural nurses faced different obstacles to providing care. Participants were asked to rank obstacles from 0 (no obstacle) to 5 (Extremely large obstacle) to providing care for their patients. The findings revealed some significant differences between the rural and non-rural emergency departments. For instance, the rural nurses often knew the patient or family outside of the emergency department and were sometimes called (formally or informally) to provide care after discharge because they lived in the same community (Beckstrand et al., 2005). Rural emergency nurses sometimes described their patients as friends or family members (Beckstrand et al., 2005). Other challenges to providing end of life care in a rural emergency department included poor design or lack of space to provide privacy for family members to grieve (Beckstrand et al, 2012).

In addition, Beckstrand et al. (2012) identified lack of ancillary or support staff in a rural emergency, which resulted in fragmented patient care. Rural nurses often have to take on other roles including that of social worker, room cleaner, and receptionist which takes them away from providing patient care. This study is one of the few to highlight the differences between the work environment of rural and urban emergency nurses.

It can be very distressing caring for a dying family member or friend (Niemira & Townsend, 2012). In the Handbook for Rural Health Care Ethics: A Practical Guide for Professionals, it is noted that in a rural community, the same physician may care for multiple family members and will need to consider the needs of these individuals along with the care of the dying family member (Niemira & Townsend, 2012). This would also be the case for the rural emergency nurse who is caring for a critically ill patient in the emergency department as well as the family members that may be known to them.

Summary of Literature Review

Findings from many of the studies reviewed indicate that emergency nurses experience significant stress and are at high risk for developing mental health issues such as compassion fatigue, PTSD and/or burnout due to the nature of their work (Gates & Gillespie, 2008; Hooper et al., 2010; Dominguez-Gomez & Rutledge, 2009). During the past 25 years, there have been increased efforts by researchers to study stress in professionals who are exposed to traumatic events as a result of their work (Sabo, 2011). Even so, little research has been done using a qualitative approach to understand occupation related mental health issues experienced by rural emergency nurses, or their perceptions and understanding of these issues. Only one study was found that specifically examined occupation related mental health issues experienced by rural emergency department nurses within the Canadian context. In addition we know that nurses in

rural communities face additional challenges in providing patient care related to their geographic location and limited resources. In order to provide rural communities with high quality emergency department care and to maximize the wellbeing and retention of registered nurses in rural emergency departments, research is needed to understand occupational factors that affect their mental health. This research is vital to the development of mental health and well-being programs tailored to meet the unique needs of rural ED nurses. In the next chapter I will discuss the methods used to conduct the study.

Chapter 3

Methods

The purpose of this study is to gain an understanding of the experiences of nurses working in a rural emergency department with a specific focus on factors that can impact their mental health. In this chapter, I will present the methods used in this study. This will include the research design, setting and recruitment of participants, data collection process and management, the data analysis process, and ethical considerations. I will conclude with strategies implemented to ensure trustworthiness of the findings.

This qualitative descriptive study is in keeping with my personal philosophy and research goals that relate to appreciating the challenges, strengths and experiences of rural emergency nurses. I wanted to provide an opportunity for these nurses to share their stories so that we, as health professionals, can gain insight into their working conditions and how they experience them. In order to address issues that impact the mental health of the rural emergency nurse, a greater understanding of the day-to-day experiences and challenges of working in a rural emergency department is needed. An exploratory qualitative descriptive study design was chosen, in which rural emergency department nurses were invited to share their stories through face-to-face in-depth interviews. This approach provided rich data to help illuminate the challenges and multiple influences on the participants' experiences. From this new knowledge, nurses will be able to identify issues that are important to them and thus inform policies to help these nurses optimize their workplace wellbeing and provide excellent care for their patients.

The exploratory qualitative descriptive approach is a viable and acceptable research design for qualitative research that seeks to explore a phenomenon where little is known about

the topic (Sandelowski, 2000). As there is very little research done on the emotional impact of the challenges rural emergency nurses face, an exploratory descriptive approach was chosen.

This study will initially examine nurses' experiences working in a rural emergency department and will endeavor to illuminate factors that potentially correlate their mental health. The use of a qualitative descriptive approach is suitable for this study as it allows the researcher to employ a relatively low level of interpretation and thus stay as close to the data as possible in the analysis (Vaismoradi, Turunen, & Bondas, 2013; Sandelowski, 2000). This level of interpretation allows the researcher to stay true to the words and descriptions of the participants. In keeping with Thorne's (2008) writings on research methods for clinicians, interpretive descriptive researchers assume that no one theory can capture multiple realities. This study is not theory driven, nor is it my intent to develop a theory but rather to explore and describe the experiences of rural nurses.

Research Design

This study draws from the philosophical underpinnings of interpretive descriptive inquiry as described by Thorne (2008). I studied the experiences of rural emergency nurses with a focus on the hardships of the work in its natural setting. I will present the findings as close to the voices and experiences of the nurses as I can while respecting the value of subjective and experiential knowledge and without compromising the participants' anonymity.

To achieve the purpose of this study, I chose a qualitative exploratory descriptive design using face-to-face in-depth interviews to gather the data and qualitative content analysis of these interviews to analyze the data. It was through a verbal exchange during face-to-face interviews that I sought to understand the nurse's experiences. This interactive exchange allowed me to explore the experiences through an interview that was unique to each individual and allowed

both the researcher and the interviewee to guide the interview through a mutual exchange of ideas.

Ontology and Epistemology

The epistemological position of this study is in keeping with transactional epistemological beliefs (Guba & Lincoln, 1994). This position assumes that we cannot separate ourselves from what we know. The participants share human commonalities such as caring and compassion but may interpret a different understanding (their reality) of these qualities. This interpretation is influenced by the person's own experience. For example, the concept of compassion could differ from one person to the next due to previous experience, or societal influences such as religion or education. This is in keeping with a relativist ontological position (Guba & Lincoln, 1994). In relativist ontology, realities are apprehendable in the form of multiple, intangible mental constructions, socially and experientially based (Guba & Lincoln, 1994).

These ontological and epistemological beliefs are in keeping with the constructivist paradigm as outlined by Guba & Lincoln (1994). That is, that reality is constructed intersubjectively and understood by experiences and social interactions; there is no one truth but rather truth is constructed by the individual (Guba & Lincoln, 1994). The constructivist paradigm maintains "that there are multiple interpretations of reality and that the goal of research is to understand how individuals' construct reality within their context" (Polit & Beck, 2012, p 723). Thus my research seeks to understand rural emergency nurses' reality and how it is formed by interactions with patients and colleagues, as well as by societal influences including those specific to being situated in a rural area.

Participant Selection and Setting

Setting. Participants were emergency department registered nursing staff from one hospital located in a rural community north of Toronto. The community has a population of 19,000 people and the hospital serves a large rural community as well as tourists enjoying seasonal recreational activities. This emergency department (ED) operates 24 hours per day, seven days per week and is staffed by emergency physicians and general practitioners on a rotating basis. Registered Nurses and Registered Practical Nurses provide the nursing care.

Sampling method. In order to address the purpose of the study, I needed information rich participants. In order to do this I employed a purposive sampling method focused on a maximum variation strategy. According to Sandelowski (1995) maximum variation sampling is the most common form of purposive sampling. Maximum variation in the sample can be demographic, phenomenal and/or theoretical (Sandelowski, 1995). For this research study, I chose *demographic* variations to have the variables that were important to my understanding of the experiences of rural emergency nurses represented in the data (Sandelowski, 1995). Therefore, I selected to interview participants with various levels of nursing education, a range in years of overall nursing experience and a range in years of experience working in the emergency department. In addition I sought to interview nurses who presently worked either full-time or part-time in the emergency department.

Sample size in qualitative research is a matter of judgment and experience (Sandelowski, 1995). The goal of the study was not to recruit a statistically representative sample but rather a sample that was “informationally” representative of the phenomenon being studied (Sandelowski, 1995). I acknowledge that participants in the study, in theory, can have infinite variation in relation to their experiences (Thorne, 2008). Smaller interpretive descriptive studies,

such as this one, can be justified in setting arbitrary sample size limits because there will always be more to study (Thorne, 2008). Therefore, I planned to recruit approximately 10 registered nurses who met the following inclusion and exclusion criteria:

Inclusion Criteria:

- Minimum of 2 years cumulative work experience in small/rural emergency departments.
- Participants must be Registered Nurses.
- Current full or part-time or casual employment in the ED

Exclusion Criteria:

- Registered Practical Nurses and other health care professionals.
- Registered Nurses with less than 2 years experience working in the rural emergency department.

Recruitment

The manager of the hospital's emergency department was contacted to determine interest in participating in the study. I explained the study and the expectations of the study participants in an email and through personal conversations with the hospital's emergency department manager. I also provided her with a hard copy of my research proposal. After ethical approval was received from the York University Research Ethics Board (Appendix A) and from the Hospital Research Ethics Board, the nurse manager of the hospital emergency department provided her nursing staff with verbal information about the study through staff meetings and casual discussions. Consequently, the nurse manager arranged a day for me to come and speak with the nurses about the study and to do interviews on site with nurses who wanted to participate in the study.

When I was on site, the emergency department manager gave me a tour of the department, showed me the interview space, and introduced me to the nurses working that day. I presented the study to the ED nurses in a group to let them know what I would be doing, thanked them for letting me visit their department and answered their questions about the study. The nurses who wished to participate identified themselves to me verbally during this discussion. I began the interviews shortly after with the first participant who indicated that she wanted to participate. I was able to complete six interviews on the first day and returned to complete four more interviews a few days later. On the initial day of my nurse interviews the nurse manager arranged extra staffing for the department so my interviews would not negatively impact the department in any way.

Data Collection

The in-depth interviews were conducted at the hospital site on two separate days. Two days were needed to be able to have different nurses working and to allow enough time to conduct the interviews without time restraints. The first day, in-depth interviews were conducted in an empty emergency department exam room where we would not be interrupted. On the second day, I had the use of an empty office. I asked the nurses who wanted to go first and escorted them to my interview room. At the start of each interview I disclosed my background as a rural emergency nurse to make participants feel comfortable sharing their experiences with me. All the in-depth interviews were digitally audio-recorded and lasted between 30 to 45 minutes each.

Prior to starting the in-depth interviews with each participant I reviewed the study and informed consent form with them, and asked for verbal permission to record the interview. Participants were advised that they could withdraw consent at any time during the interview and

request their data be destroyed. They were also informed they could refuse to answer any question and could quit the interview at any time. Participants then signed the informed consent form (Appendix B). A copy of the signed consent was provided to each participant. The participants were given a \$25.00 gift card to a book store to thank them for their time and participation.

The participants, prior to the start of the in-depth interview, completed a paper self-administered demographic questionnaire. The demographic questionnaire was created by the researcher following the literature review and consisted of seven items (Appendix C). Information collected included age, gender, work experience in the emergency department, overall nursing experience in years, employment status, marital status, level of nursing education, and if the participant resided in the community the emergency department serves.

A semi-structured interview guide was used to guide all the individual in-depth interviews (Appendix D). The guide consisted of thirteen open-ended questions and additional probing questions to facilitate elaboration and depth of exploration of the nurses' experiences. Crabtree and Miller (1999) suggest an interview guide should consist of *relatively* closed questions to begin with followed by open-ended questions with prompts and probes and follow-up questions to expand on rich context. With these suggestions in mind, I began the interview with an introductory script:

Thank you for agreeing to participate in this research study. Before we begin, I just want to remind you that you do not have to answer all the questions. If any question makes you feel uncomfortable, we can stop or pause the interview at any time. You are also aware that I am recording this interview and any written notes I make are only to help me understand the content of this interview when I read the transcripts. This

interview and my notes will also be kept in strict confidence as indicated on the informed consent form you signed. Do you have any questions?

This brief introduction reaffirmed the consent to participate and let the participant know why I might be taking notes during the interview. This script was followed by open ended general questions such as, “Can you tell me why you wanted to be a nurse?” and “What is it like working in a rural ER?” Starting with simple direct questions was intended to create a climate of trust, communication, and self-disclosure with the participants (Crabtree and Miller, 1999) and to allow for the building of a rapport with the participant. I placed more sensitive questions such as “Can you tell me how a bad day at work affects your home life?” near the end of the interview. During the in-depth interviews I wrote field notes in a journal with regards to non-verbal communication and physical/emotional cues that might be helpful to understanding the audio recordings later.

The conversation during the interviews allowed me to elicit depth, allowed for elaboration of events, and offered me the opportunity to clarify and correct my initial understanding of the events told to me (Thorne, 2008). The goal of this method was to come to a consensus construction of the experiences (of the participants) that was more informed than any previous construction (Guba & Lincoln, 1994). That is, the information from the interviews was new to me and understood in the manner the participants intended it to be. Therefore, the knowledge from this study was co-created by the researcher and participant as we exchanged ideas during the interviews (Guba & Lincoln, 1994).

Data Management

A transcriptionist transcribed the digital audio-recordings verbatim after completion of the tenth and last interview. In order to insure the data remained secure the audio-recordings were first encrypted using AES crypt and then transferred via drop box to the transcriptionist. The transcriptionist encrypted the interview transcripts before emailing them back to me. To organize and manage the data, all the transcribed interviews were uploaded into NVivo 10 (Nvivo 10, 2012). The field notes were not transferred from the journal into NVIVO.

Data Analysis

Qualitative content analysis as described by Hsieh & Shannon (2005) was used as the method for analyzing the data as well as the constant comparison method (Glaser & Strauss, 1967; Polit & Beck, 2008; Thorne, 2000; Miles, Huberman & Saldana, 2014). Content analysis is the “subjective interpretation of the content of text data through the systematic classification process of coding and identifying themes or patterns” (Hsieh & Shannon, 2015 p.1278). Constant comparison involves comparing the data on an ongoing basis to refine or merge themes (Glaser & Strauss, 1967).

I chose these methods for two main reasons. Firstly, the method of data analysis was influenced by the study design (qualitative descriptive) and the purpose of the study. According to Sandelowski (2000) qualitative content analysis is the best strategy to use in qualitative descriptive studies. The data in this study were collected by face-to-face interviews in an attempt to understand the nurse’s true experiences. Using an inductive process is indicated because the study is not theory driven but exploratory in nature. This type of data analysis is considered appropriate when the study does not rely on existing theory and previous research is limited (Hsieh & Shannon, 2015). I had no preconceived codes or theories and wanted the

themes to emerge from the interviews over the course of the research. I wished to stay close to the data to remain true to the voices of the nurses I interviewed. This is in keeping with Sandelowski (2000); “Qualitative content analysis is similarly reflective and interactive as researchers continually modify their treatment of the data to accommodate new data and insights about those data” (p.338).

Secondly, content analysis was chosen because of the nature of the phenomena I was studying. “Content analysis is extremely well-suited to analyzing the multifaceted, sensitive phenomenon characteristic of nursing” (Elo & Kyngas, 2007, p. 114). My interviews elicited information about sensitive, multifaceted phenomenon, the nurses’ experiences in the emergency department, and in particular about their experiences with traumatic events that could impact their mental health.

Qualitative researchers become familiar with their data by scrutinizing them and reading them over and over to achieve meaning and understanding (Polit and Beck, 2012). To achieve this understanding, I first listened to the audio recordings while reading the transcripts to ensure accuracy. Then, once I had confirmed the accuracy of the transcripts, I read and re-read them several times prior to starting the content analysis to gain an overall understanding of the interviews. Additionally, I revisited the field notes to highlight particular observations that would help me in understanding the transcripts. Then, I uploaded the transcribed interviews into the NVivo software program on my personal computer. In addition, a descriptive analysis of the demographic data was also entered into the program.

I began the analysis by reading the transcripts word-by-word, highlighting exact words that represented key thoughts or concepts (Hsieh & Shannon, 2015). This process of first cycle coding is described by Miles et al. (2014) as *in Vivo* coding meaning I used the participant’s own

words or phrases as the initial codes. In addition, I also used emotion coding; highlighting specific emotions as described by the interviewees. Emotion coding is particularly appropriate for studies that examine interpersonal and intrapersonal experiences such as those examined in this study (Miles et al., 2014). For example, using the NVivo software on my computer, I would highlight words or phrases such as “I would cry” or “I would go to the break room and cry” and emotions such as “frustrated” and “concerned”.

I then moved onto second cycle coding. This is described by Miles et al. (2104) as pattern coding meaning the segments of data identified in the first cycle are grouped into smaller categories, themes or constructs. For example, “anxiety”, “left nursing for a period of time”, and “crying” were merged together under *responses to the emotional strain of working in the emergency department*. These emerging themes were organized and entered as nodes (a meaningful cluster) in NVivo computer software. These processes continued (using constant comparison) until themes emerged from the data that were representative of more than one key thought (Hsieh & Shannon, 2105). During this process of analysis, two overarching themes emerged from the data. These included the *context of working in a rural emergency department* and the *emotional impact of working in a rural emergency department*. The process of immersion in the data, coding and identification of themes was discussed with my thesis supervisor and other committee member along the way to help ensure my analysis was rigorous and appropriate to my method.

Investigator Triangulation

In qualitative research, it is important to insure rigor in your data analysis. One way to do this is through investigator triangulation. That is, having a second researcher analyze, code, and interpret an interview (Polit & Beck, 2008). A visiting professor at West Virginia University in

the Sociology Department experienced in qualitative research was my second investigator. She independently coded two of the interviews by hand using hard copies of the transcripts. I had already coded these interviews myself so I was able to compare the coding and enter any additions or changes into the Nvivo program. We had similar coding on such items as workload and privacy issues but a few codes were adjusted as a result of our discussions. For example one participant said, “I block a lot out because you have to keep going, because I am an emotional person, so I actually make jokes out of a lot of stuff so I can keep going.” was initially coded by me as the *emotional toil of working in the emergency department*. The second investigator coded these as *responses to stress*. After reviewing the coding with her, we decided that the blocking out and jokes the participant is talking about fit better as *coping mechanisms* to deal with the emotional stress of the department. These coping techniques were further merged into the *compassion fatigue experience and perception* theme describing how the participants who self identified as having experience with compassion fatigue would use coping techniques such as distancing to cope and avoid getting too emotional.

Ethical Considerations

The research proposal, informed consent form, and the interview guide were submitted to the Human Participants Review Committee (HPRC) at York University for review and approval prior to the initiation of the study. I also received approval from the study site’s hospital research ethics board prior to any study activities taking place on site. The conduct of the study adhered to the guidelines of the Canadian Institutes of Health Research Tri-Council policy for conducting ethical research on human participants (Canadian Institutes of Health Research, Natural Sciences and Engineering Research Council of Canada, 2014).

I knew the questions in my interview could encourage the participants to disclose information that they would not want to share with the nurse manager or other colleagues. I assured them that everything they shared would remain confidential. I also knew that the questions in my interview could encourage the participants to disclose information that might cause the participants some emotional distress. Therefore, I had copies of a list of resources (Appendix E) including employee assistance programs such as counseling that I could give to those nurses who requested additional information on workplace mental health or who felt distressed as a result of the interview with me. I had a few participants request to see the list of resources but no one took a copy with them.

Copies of the signed informed consents, digital interview recordings, hard copy transcriptions of the interviews, and other source documents are stored in a locked cabinet in my personal office that only I have access to. The digital recordings were downloaded on my personal computer and stored in a password-protected file. The data was encrypted for transfer to the transcriptionist and analyzed using a personal computer that is password protected. Data is backed up on an encrypted USB device. The data will be kept for 5 years and then destroyed. I chose not to identify the hospital in the writing of this thesis due to the sensitive nature of the interviews. Information that could lead to identification of the participants or the hospital was removed to ensure the anonymity of the nurses and the hospital.

Trustworthiness of Qualitative Data

Demonstrating validity (meaning how plausible and credible and reliable the findings are) in qualitative research can be challenging because it requires incorporating rigor and subjectivity as well as creativity into the research process (Whittemore, Chase, & Mandle, 2001). The aim of this study was to produce research that is sound and accurately captures and

represents the experiences of the study sample. To develop trustworthiness of my findings I was guided by Lincoln and Guba's (1985, 1994) trustworthiness framework. This framework consists of five criteria, i.e. credibility, dependability, confirmability, transferability, and authenticity (Lincoln & Guba, 1985, Guba & Lincoln, 1994).

Credibility. Credibility refers to the confidence the reader will have in the truth and interpretations of the data (Lincoln & Guba, 1985). The strategies I used to strengthen credibility were the use of an audit trail throughout the study. A comprehensive audit trail for a qualitative study consists of four types of documentation (Rodgers & Cowles, 1993). These include contextual documentation, methodological documentation, analytic documentation, and personal response documentation. Contextual documentation was achieved by the use of a journal to record field notes consisting of any impressions or observations during the interviews with the participants. Methodological documentation was achieved by documentation of decisions regarding the methodology of the study in the notes from meetings with my supervisor and keeping records of all drafts of the research process. This is in keeping with Lincoln and Guba (1985) in that qualitative research is typically an emergent design. This means decisions on the conduct of the study are made on an ongoing basis throughout the research process. Analytic documentation was achieved through the management of the data using Nvivo (Version 10, QSR International Pty Ltd) software to organize and track the analysis process. In addition, to strengthen the analytic documentation, the audio recordings were confirmed with the verbatim transcription of the interviews to ensure accuracy. Personal response documentation is demonstrated by the description of my background and experiences in the introduction of this thesis. This is intended to demonstrate self-awareness. This is important because in qualitative research, the investigator is considered a data collection instrument (Rodgers & Cowles, 1993).

Personal response documentation is also reflected in personal notes kept during the research process. In particular, any self-reflections that I had while reading the traumatic recollections of the participants over and over during the analysis phase.

In this study, the use of investigator triangulation, which is using a second investigator to interpret the data, will contribute to the validity of the interpretations of the findings. Lincoln & Guba (1985) refer to this as one team member keeping the other more or less honest adding to the probability of credible findings.

Dependability. Dependability refers to the reliability and stability of the data over time (Lincoln & Guba, 1985). This means the process of the study as demonstrated by the data, findings, interpretations and recommendations are internally coherent so that the findings can be trusted (Lincoln & Guba, 1985). This criterion was strengthened by the careful documentation of the plan of the study in the research proposal. Also, the keeping of an audit trail throughout the study, i.e. the use of written notes during the course of the study to document changes and revisions to any methodological and analytical decisions will strengthen the dependability of the findings. These notes include email correspondence and minutes from thesis committee meetings.

Confirmability. Confirmability refers to objectivity and authenticity of the data (Lincoln & Guba, 1985). It is important that the findings be true to the voices of the participants. This was enhanced by the presentation of the findings using direct quotes from the interviews and the use of an audio recording of the interviews. These recordings also contribute to the audit trail. Confirmability was also reinforced by the use of investigator triangulation. That is, I used a second, more experienced investigator to code two of the interviews. The coding from the second investigator was compared to my coding to assess congruency between our interpretations of the

data. I was not able to use member checking to confirm the accuracy or meaning of the interviews with the participants due to distance and difficulty with scheduling another interview day that would not impact the department.

Transferability. Transferability refers to the extent to which findings can be transferred to or has applicability in other settings or groups (Lincoln & Guba, 1985). This criterion was enhanced by the use of the comprehensive field notes, data saturation, and the thick, rich descriptions of the accounts of the participants. These descriptions will assist the reader to consider the transferability of the findings. In keeping with Lincoln & Guba (1985) it is not my task to imply transferability but rather to provide the data to allow readers to consider the transferability of the findings by the use of “thick descriptions”. I also endeavored to have demographic variation in the sample to include multiple variables such as age, experience, and education to enhance transferability of the findings.

Authenticity. Authenticity refers to the degree to which I faithfully and fairly described the participant’s experiences (Guba & Lincoln, 1994). A text has authenticity if it helps the reader feel the experience of participants and heightens sensitivity to the issues described (Polit & Beck, 2012). I endeavored to strengthen the authenticity of the study by representing the voices of the participants through the thick, rich descriptions of their experiences in the findings section of this thesis.

Summary

This qualitative descriptive research design combined with measures to enhance trustworthiness within this study, has contributed towards very rich data that provide an understanding into the unique experiences of the rural emergency nurse. Next, the findings chapter will describe common themes and insights gained from the interviews about the

experiences of working in a rural emergency department and how this work can impact the mental health of the nurses who work there.

Chapter 4

Findings

In this chapter I present the findings that emerged from my interviews with rural emergency department nurses. The findings presented in this chapter focus on the emergency department *nurses' descriptions of their work environment* and their experiences with factors that can contribute to their mental health. Semi-structured face-to-face interviews were conducted with ten emergency registered nurses from a rural Ontario hospital. I conducted all of the interviews and each nurse was interviewed once. The interviews took place over two days in February 2015. The first day, I conducted six interviews in an empty exam room in a private part of the emergency department. The second day, I completed four interviews in an office that was available to me. The interviews were uninterrupted and lasted between thirty to forty-five minutes. All the participants were assigned a pseudonym to insure participant anonymity and confidentiality. These pseudonyms are used in the quotes below.

Demographics

The participants' demographic characteristics are presented in Table 1. All ten participants in the study were female. Six of the participants were married, three were divorced, and one was single. They ranged in age from 25 to 59 years. Seven completed a diploma in nursing; two held a degree in nursing and one had a graduate degree. All but one of the participants lived in the community where they were employed. Six worked full-time and four worked part-time. The participants had a wide range of years working as a nurse. For example, two participants had worked fewer than five years in nursing, one had worked between 5-9 years; two worked between 10-14 years and 15-19 years respectively, while three had been nursing for over 20 years. The nurses were also asked how many years they had been working specifically in

an emergency department. One reported fewer than 5 years; three worked between 5-9 years, three worked 15-19 years and three had been emergency nurses for over 20 years.

Table 2
Demographic Characteristics of Participants

Gender	N	%
Female	10	100
Marital Status		
Married	6	60
Divorced	3	30
Single	1	10
Age		
25-29	1	10
30-34	1	10
35-39	1	10
45-49	2	20
50-54	4	40
55-59	1	10
Nursing Education		
Diploma	7	70
University Degree	2	20
Graduate degree	1	10
Years Working as an R.N.		
< 5	2	20
5-9	1	10
10-14	2	20
15-19	2	20
20+	3	30
Years Worked in the E.R.		
< 5	1	10
5-9	3	30
10-14	0	0
15-19	3	30
20+	3	30
Lives in Community		
Yes	9	90
No	1	10
Employment Status		
Full-time	6	60
Part-time	4	40

Themes

The nurses were very open about their emergency department experiences caring for patients in their community. They shared stories about the challenges and personal impact of nursing in a small rural emergency department. Two overarching themes emerged from the data describing their experiences working in the emergency department. These themes are thickly intertwined but for presentation purposes will be discussed individually. The first overarching theme illustrates the '*context of working in a rural emergency department*' and included the subthemes

- lack of resources leading to increased workload and decreased quality of patient care/safety;
- nurses' licenses and scope of practice;
- lack of privacy in the community;
- I know many of my patients and/or their families;
- machismo; and
- trapped in the emergency department.

The second overarching theme is the '*emotional impact of working in a rural emergency department*' and included the subthemes

- emotional impact of caring for young trauma patients;
- responses to the emotional strain of working in the emergency department;
- impact of work life on home life;
- compassion fatigue experience and perception; and
- nurses' experience with emotional support programs.

In addition, a third theme emerged from the data i.e. the participants' '*reasons for becoming a nurse*'.

The Context of Working in a Rural Emergency Department

The first overarching theme is *the context of working in a rural emergency department*. Context refers to the work environment, conditions, and physical space in which the participants worked. Political and social factors including staffing, hospital and unit policies, unit culture, patient volume and acuity, and the physical size of the emergency department would be considered context, conditions external (out of control) to the staff nurses. For example, rural emergency departments are in small hospitals and may have access to a limited number of

trained emergency nurses. In addition to limited access to registered nurses, the workspace may be small meaning finding a place to put patients and equipment are also restricted by size of the department. Equipment such as bedside ultrasound and access to services such as diagnostic imaging may be unavailable, especially at night, which can mean patients wait longer in the emergency department for assessment in the morning or need to be transferred to another facility. Unstable patients will need to be accompanied by a nurse when transferred to a larger community hospital with the needed level of care, leaving the rural emergency department with one less nurse to care for the remaining patients. Deb summed it up: *“Here we have barebones everything so I think it’s just trying to figure out what you have to do and doing it.”* All the participants believed that working in a rural emergency department presented challenges that were different than working in a larger centre. For example, all participants mentioned a lack of resources as a unique difference. The subthemes that explicate the complexity of this overarching theme are: *lack of resources leading to increased workload and decreased quality of patient care/safety, nurses’ licenses and scope of practice, lack of privacy in the community, I know many of my patients and/or their families, machismo, and trapped in the emergency department.*

Lack of resources leading to increased workload and decreased quality of patient care/safety. Many participants talked about working with a *lack of resources* in the rural emergency department that directly affected their workload and quality of patient care. This included managing without the technical and clerical support that the participants believed was available in larger community emergency departments. Working without the additional support available in larger emergencies meant the nurses often were responsible for non-nursing duties. Dar provided some examples of the technical and clerical duties expected of them. *“...as a nurse you are really challenged...you are doing everything, ECGs, IV’s, any sort of procedure that in a*

teaching hospital the medical students or the interns would be doing”. Kim shared that registration of patients and even department security could also be an expectation of the nurses. “*...you are very restricted in the resources you have...I have to run and phone for x-ray, I have to run and phone for blood work...no security, no registration.*”

All the participants shared that they often experienced an overly heavy workload. The participants explained that this heavy workload was due to a combination of high patient acuity (increased severity of illness) and seasonal shifts in patient volumes related to the large influx of summer vacationers, coupled with not enough emergency room nursing staff to care for the patients. Zoe talked about the large increase in emergency room patient volume in the summer months. “*[Patient visits] in key summer months, are similar to the volumes that I saw in downtown Toronto emergency with about a third of the staff.*” Dar pointed out that patient volumes were particularly high on weekends related to vacationers: “*It’s on the weekends when you are overwhelmed with numbers, because of this [vacation] area and the population...you know doubles, triples, whatever.*”

The participants spoke about how quality of patient care changed and could impact patient safety when the workload became too heavy because they lacked nursing staff. Kim explained that when the emergency department was very busy, the triage nurse (the first nurse patients see when entering the emergency department, who assesses the severity of the patients’ illness/injury) would be forced, at times, to triage patients to a lower acuity than they actually were in an effort to manage the high demand for emergency care as safely as possible. Triage nurses assess (triage) the severity of illness of patients and assign them a triage code on the Canadian Triage and Acuity Scale (CTAS). The CTAS ranges from 1 (needing resuscitation) to 5 (not urgent).

It's very, very frustrating. Especially when you are the triage nurse....most fractures we used to make them (CTAS) threes because of their pain levels, now people downgrade them to four so they can send them to 'see and treat' [less acute patient care area in the emergency department with less staff]. I don't think you should down triage just so you can get a person into a bed. (Kim)

Kim further explained that in this situation, the acute care emergency department beds were full; Rather than have the patients, for example with fractures, wait for an appropriate emergency department bed, they triaged these patients as 'not urgent' and sent them to an area (of the hospital or emergency department) with fewer nurses so that the patients are out of the waiting room more quickly. Placing these patients in an area that is not adequately staffed to care for them may result in complications from the fractures because the nurse cannot do a complete assessment.

Zoe further described the unpredictable nature of emergency department patient volumes, and how an influx of patients or an increase in patient acuity resulted in insufficient physical space and staffing to safely meet patient's emergency care needs. She shared:

Maybe a bit understaffed and sometimes our patient volumes are insane. So we have patients in the hallways, really sick patients in sub-acute [a part of the emergency department used for stable patients that do not require intensive nursing care]...so as a single nurse sometimes you have six or seven patients...you are running around....I don't have enough hands, I'm doing what I can.

Sue also described not being able to keep up at times related to patient acuity and volume.

Not even fifteen minutes later there was another arrest...and it was just all this stuff going on and you still hadn't cleaned up from the first one and you are thinking while you are still doing his chest tube, you are thinking; I just hope I don't get somebody else in there, I got no more beds, so it's a lot of, yeah it's busy.

Dar shared her frustration with the heavy workload as well, *"If I see one more fracture or we have to move another 50 people out of trauma to do sedation or something like that, you just think I can't do it, I can't do it."*

Participants described how patient acuity, specifically how very sick patients who require one-to-one nursing care, when the emergency department was under-staffed, impacted overall patient care in the emergency department. One nurse explained *"we don't have enough people...sometimes when you are in trauma and you are with a single patient, you don't see your other two trauma patients for two hours and you are thinking; someone check on them."* (Zoe) Liz talked about a situation that included the death of a seventeen year old patient and related it to the heavy workload in the emergency department that day *"...a seventeen year old...really sick came in and we were so completely busy busy busy busy busy busy, not like he was ignored or anything but it was an unusual presentation, unusual... ends up going down to [transferred to tertiary care] and dies."* Liz was able to recall the events that day very clearly and with no hesitation. She said she felt some guilt in the care of this patient and wonders if she had advocated more actively for this patient he would not have died. *"I wasn't directly involved with him but kept on knowing he was sick, did I say the right thing? I constantly went back and said ...well maybe he needs blood. So I think felt the guilt for not expressing myself loud enough"*

The heavy workload also interfered with the nurses' ability to take their much needed work breaks. Nurses at times were not even able to go the bathroom because they needed to

provide care for the patients. *“The grandmas were wanting their feet rubbed and I am looking at them, thinking; are you kidding me? I haven’t gone pee for nine hours and you want me to rub your feet?”*

The workload issues in the emergency department made the nurses feel frustrated and overwhelmed because they were not always able to provide the type and quality of nursing care they felt was needed. Dar explains:

You get caught up in other places, if we are that busy I am helping somewhere else and then may not realize this is going on, or you do and you think; okay, I’ll get to that next and then something else happens ...I can’t do this, there’s not ten of me and you just go home and drive past your house.

Sue described an extremely disturbing situation in which she was unable to support a mother whose baby had died because she had to get back to her other patients.

Yeah, see, I just put my hand on her arm and she’s sobbing. She’s holding the baby and walking all over the hospital with this deceased little child. I’m thinking, it’s a coroner’s patient, you need to stay here and someone’s got to be following you and so it’s all this stuff, you know what I mean? ...so meanwhile I am saying to the police officer, you are staying with her and the body because I can’t stay there and make sure she doesn’t take any more of the tubes out...you are doing all these things and there’s not the support.

You really don’t have the support. (Sue)

Ann also identified that the heavy workload made it very hard to provide patients with needed emotional support. She describes:

It is hard to emotionally support the patient because you are working on tasks; you are working, just doing what you need to do. So afterwards when you go home, this stuff runs through your head, but really, there's no time.

Nurses' licenses and scope of practice. A few nurses said that they sometimes had to work outside their scope of practice to save patients' lives. Kim shared:

Sometimes we cross the line, out of the scope of a nurse. But if I don't cross that line with my physician backing me up in the next room, this person dies. So we do cross the line and it's not right, but it is what has to be done because it is for the patient.

This led some of the nurses to be concerned that they might be endangering their nursing registration. Zoe explained: *"I worry for my license a lot here. I've never done that before."* Liz also identified a problem following a patient's death that was troubling to her. She wondered if the patient might have had a better outcome if the treatment had been initiated more quickly. She was concerned this patient's case would be reviewed by hospital administration or the College of Nurses of Ontario and the nursing staff would be held legally responsible for the poor outcome. *"...and all along, I felt like, and it was, a legal thing. It was all that.... We're going down [losing our license], we are all going down."*

Jan felt a lack of support from management when the nurses had to prioritize care and patients complained. She said because it was such a small community, the patients expected they could demand special services or dictate the care they wanted. When the patients complained to administrators, she felt management did not offer suggestions to diffuse situations. Instead, management would place the blame on the nurse involved.

Because it is a small community, the community thinks, the attitude is pretty pushy so trying to diffuse situations is really difficult and especially if they are angry or didn't get

the care they think they should have gotten or they didn't get what they wanted and you don't get, we used to not get any back up with that. Our human resource or the manager at that time would tell me what I did wrong and not say, you know, give me suggestions how I should have handled it better.

Lack of privacy in the community. The nurses identified that working and living in a small community meant they were recognized outside of work by members of the community and sometimes asked about their work and patients they had cared for. This could include inquiries by former patients as well as questions from patients' friends or family members who heard about an incident at the hospital. These requests for information put the nurses in *awkward positions* as they had information they could not share. All participants were aware of privacy legislation and had strategies to deal with situations when they were asked by family or friends to disclose personal information about patients. Deb explains her strategy.

Privacy is huge, I would say it is a huge issue because people know everybody, people are related to everybody, people are married to everybody it seems. I just don't say anything about anyone; because ...Everybody knows somebody to some degree and you are going to say something that will bite you in the ass.

Sam agreed that privacy is an issue. *"It's very difficult because often I am asked were you working. Did you see?"*

The participants described how they coped with maintaining privacy when approached for information. Jan told me, *"I see people I know every day...I just tell them, I can't discuss that right now, it's confidential and it's your private information...or you get people that know someone in bed A and say I can't discuss that with you."*

I know many of my patients and/or their families. For the participants, working in a small community meant they sometimes treated family and friends in the emergency department. Sue described doing CPR on friends and how it disturbed her that she did not recognize the patients.

I've done CPR on a couple of friends of mine that have died and I'm (years old). It's hard in that sense and then my neighbor, who was totally [pulmonary embolus] and purple, couldn't even recognize her. You know, you are doing CPR on your neighbor and the husband comes in and you're kind of going, shoot (shakes her head)

Dar also found it challenging when she knew the wife of a patient. *"Yeah, so that part is really hard. I did CPR on a woman's husband once. I knew the woman more than I knew the husband but just, you are getting involved in the, you know, the whole code."* Jes said treating family members could be *"upsetting and embarrassing"*.

Sam described feeling self-conscious about treating people she knew in the department and how situations at the hospital have the potential to be retold in the community.

I'm a little bit more self-conscious because, I know when I am out socially, the things you hear about this department and other staff members from family or from patients that have been here. So I'm a little more conscious about that. Whatever happens in that interaction is going to be repeated a hundred times and likely hit my social circles.

Machismo. The nurses were very proud of the work they do. They viewed themselves as **survivors** for continuing to nurse patients in the stressful environment of the emergency room. In addition, they recognized that emergency nursing was unique and saw E.D. nurses as tough for sticking with it. This was their badge of honour. Jan spoke with a sense of machismo that she was still working in the emergency department, *"Yeah, it was not a nice place to work, but all us*

*old gals are still here, stuck it through.” Dar spoke with **pride** about being a resilient emergency nurse, “It’s a certain type of nurse that works in emerg. We tend to soldier on, gird up the loins and wait for the next case.”*

Deb proudly said that working in a small department meant nurses needed to rely on each other more than at a larger centre, and do more with less help. “ *It’s just totally different nursing, and it’s harder nursing because we have to rely on each other and we do really amazing things here that we should be really proud of...in the city you would have teams of people doing.*” Sam also spoke with pride about her colleagues.

When it comes down to the crunch, a nurse is a nurse. Like when you are really sick and really need an emergency nurse, there’s not anybody I work with who appears jaded that won’t step up and do what needs to be done.

This machismo atmosphere made it more difficult for the nurses to admit to any emotional strain because they could be looked upon as **weak** and not able to function as an effective team member. Ann referred to a recent pediatric trauma and told me the paramedic involved had taken some paid time off to deal with the impact of the trauma while nothing like this was offered to the nurses who were involved with the same patient. Ann went on to tell me how if a nurse was to take time off following a traumatic event, she would be perceived to be weak and looked down upon by the other staff members.

We don’t even take care of ourselves, and nobody seems to care either....I know the medics get time off. I’ve heard the paramedic that was first on scene is having a ton of issues and he is getting a ton of support. He is not working right now and that’s the thing, if you take time off you are looked down upon.

In an effort to appear strong to her peers, Dar mentioned trying not to succumb to emotions at work, *“You try and be strong and you don’t want to break down, but you do.”* Sam agreed, *“It’s not always the coolest to show vulnerability.”*

Trapped in the emergency department. Sam mentioned the nurses could feel trapped in the emergency department. This sense of feeling trapped was attributed to living in a small community and therefore, they would be unable to make the same income and maintain the same lifestyle due to a lack of other types of nursing positions. In addition, nurses who had worked for many years in the hospital remained in their jobs because they had built up seniority, vacation time and pensions. This security made it a difficult decision to switch jobs, even if they wanted a different job.

And that’s one of the challenges in a smaller community too, is that most, a lot of nurses feel trapped in what they do because you cannot make the same income and maintain the same lifestyle, there’s not too many other opportunities.

When asked where they saw themselves in ten years, most of the nurses said that they would not be working in this emergency department. Kim shared: *“My husband says I’ll work until I’m seventy-two but I told him I’m not doing that. So if I am still here in ten years, somebody’s going to be paying for it.”* Deb stated: *“I really like working in the hospital but I don’t think I could do such intense work for so long so I’ll probably go back to school and do some kind of nursing admin.”*

One nurse mentioned her pension was an incentive to stay working for now. *“I don’t see myself working in ten years ...HR asked me if I wanted to stay in the pension plan...in two years, I can go to casual and my pension plan will be almost one hundred percent.”* (Dar)

The Emotional Impact of Working in a Rural Emergency Department

The second overarching theme that emerged from the data was the *Emotional Impact of Working in a Rural Emergency Department*. This overarching theme pertains to how working in a rural emergency department affected the emergency department nurses' mental health, feelings, awareness and motivation. The subthemes that explicate the complexity of this overarching theme are: *emotional impact of caring for young trauma patients, responses to the emotional strain of working in the emergency department, impact of work life on home life, compassion fatigue experience and perception, and nurses' experience with emotional support programs*.

Emotional impact of caring for young trauma patients. The nurses spoke about the unpredictable environment they work in and about the multiple trauma patients they see on a regular basis. One of the most challenging situations discussed by most of the participants was caring for pediatric and young adult trauma patients. During a pediatric crisis, many of the nurses shared that they identified with the distressed families and also often thought about their own children. In addition, when the ambulance dispatch called ahead to notify of an incoming child trauma the nurses were sometimes concerned that it could be their own child. Liz described feeling **guilty** for hoping the incoming trauma was not her child. Although she felt relieved that the trauma patient was not her child, she described the 'relief' to be short lived because she was overwhelmed by the reality that the trauma was somebody else's child. She shared:

It brings a whole gambit of emotions and feelings, and a lot of it can be guilt...I have two boys, nineteen and twenty two, you know driving, all that sort of thing, and the radio would go; the ambulance radio would go off. They'd say, you know, nineteen-year-old male, single vehicle car accident and you'd cross your fingers that it wasn't one of your

children and when they came in, you were relieved. In a couple of senses, first sense it wasn't your child or a child you knew and then you feel awful because it's somebody's child.

The nurses had vivid memories and recalled with great detail the young trauma patients they cared for. Ann shared the specific ages of particular pediatric patients she had cared for in the emergency department. *"I've had the pediatric trauma, I mean I've had other traumas but it is the age. You know? I've had a six year old, a baby, a thirteen year old, a twelve year old, sixteen, eighteen, twenty."* Ann spoke of one experience she had with a 6-year-old drowning victim that left a lasting memory. She demonstrated the hand clapping actions of the child's father when telling me the story.

I had a 6 year old drowning a few years ago and we did CPR on him for six hours, he'd fallen through the ice and his baby brother sat outside the trauma room on a stretcher, and his dad stood at the end of the bed clapping, you know; come on (name) come on (name) and for six hours we tried to help this little kid and he didn't make it.

The participants specifically discussed *how* pediatric traumas affected them emotionally and, in turn, their ability to function on the job. Sue talked candidly about reliving the experience of caring for a pediatric patient that passed away. These thoughts were so intrusive that they kept her awake at night.

Well, last night I was up till four in the morning because the last shift I worked I had an eleven month old. We were doing CPR, tubed her everything. She ended up passing away...it was a local family, you kind of know the family and so I was reliving that...and I was reliving till four fifteen in the morning and what you could have done differently, how could we have made that faster, what could we have. Do you know what I mean?

So it has a big impact, it really does, all this stuff and knowing people.... I'm having three hours sleep...I've been redoing (reliving over and over) it. You take a lot of it.

Ann shared that after caring for a child experiencing severe pediatric trauma she had difficulty focusing on her work and would have benefited from a day off to recover.

That's the hardest thing I find. I've been doing pediatric traumas and having them die and expect to come back to work the next day, and be able to focus and provide good patient care, and I always think, why can't they just give you a day off?

Dar and Sam both recounted events that left them feeling emotionally drained and feeling unable to engage or support the families of their deceased patients. Dar had images of a young trauma patient imprinted in her memory. She spoke somberly about this event.

It was Thanksgiving and it was a local family...and this young beautiful girl was in an accident...she looked absolutely perfect except she has all these, probably cervical injuries, anyway, I kept coming out of the room and I saw her dad and her brother in the window looking in and I just thought I can't, I can't go to them now, I can't I don't have it. We're still working on this girl and I just knew if I made any sort of eye contact, they would know and, I never did speak to them [shrugs her shoulders].

Sam too, recounted a vivid memory involving a 14-year-old girl that left her drained, and feeling unable to support and comfort family members of the deceased girl.

My final kind of moment was when we lost a 14-year-old girl. And I walked out of here and saw her dad in the hallway, just sitting down with his head in his hands and, everything in me wanted to go over and say something to comfort that father, but I just couldn't go. I just had to leave because it had been such an awful shift. Just seeing him

sitting in the hallway and that is probably my most vivid memory. I can't provide any more support, I'm done.

Responses to the emotional strain of working in the emergency department. Many nurses talked about how they reacted to the emotional strain of working in an emergency department caused by such things as over work, dealing with trauma and a lack of resources. They also discussed the impact this stress had on their mental health.

The participants responded to the stress they experienced at work in various ways. Half of the nurses described **crying** about traumatic work events either at home or while still at work. For example, Liz would leave the department and sit outside. *“(I) would go out to the picnic table and cry and everything and say; I understand. When I ended up having my own child that is when it felt emotional at work”*

Ann described leaving work and driving to the lake to cry when she recalled the events of the day.

Sometimes you leave this place and as soon as you walk out the door, get in your car and drive off the parking lot, that's when it hits you...I'll sit in the car for a minute or I'll drive to the water and that's kind of where, you know, I might cry. That's when you actually start thinking about all this stuff.

Jan described being angry and frustrated at work because she felt **overwhelmed** by her work and unable to cope. *“Every day, some of us go to the staff room and cry. Because we are angry and frustrated, some of us go outside. You just go out, you cry, you come back and you go back to work.”*

In this emergency department, the nurses work 12-hour shifts. Sue mentioned how missing breaks during these long shifts contributed to feeling **burnout** in the nursing staff: *“it's*

all about the hours and not getting burnt out...I can see why the nurses get grouch[y] here, because it is stressful...almost twelve o'clock and they haven't been to breakfast yet [the morning break] and I've been up since five thirty and didn't sleep until four fifteen and I'm thinking it is hard to be here for so many hours and not even go pee or have something to eat"

Liz connected the death of a 17 year old patient she cared for to an **episode of depression** she had "*...I started having some anxiety issues and I did get medicated...so I came to work and literally, it was like I wasn't working...and it turned out I had depression and was off for two months.*

In order to cope with the emotional strain, two participants left nursing for a period of time; one for a year and one for three and a half years. Sam attributed the death of a 14-year-old female patient to her **leaving nursing** for a year. "*So the reason I left nursing for a year was, not the reason, but my final kind of moment was when we lost a 14 year old girl"*

Sue shared, "*I took a break for about three, three and a half years...then I came back in.*" Both Sue and Sam (who took a year off for anxiety/depression) indicated that their stressful work environment contributed to this choice. All the nurses indicated that they took time off when they felt they needed it for emotional rest whether through vacation or working part-time. A few nurses mentioned that job sharing, when 2 nurses share one full-time job, was very important in managing their work hours when they needed a break from the stress. Zoe explained: "*If I need a break, I've been lucky enough as a part-time. If you give away one or two shifts you get that break you need...when I really need it, I give away shifts and sort of take a time out.*" Kim shared this sentiment about working flexible shifts: "*I only job share...and some days I think; my God, I need to get out of here...*"

Sam talked about being aware of her reactions to stress and **trying not to let that influence patient care.**

When I am tired or when I am cranky or when it's been a bad shift and someone is being demanding, I am very aware of my own intolerances and how they affect how I give patient care. And I see it in co-workers too, in the conversations at the desk about, you know, labeling or being intolerant of a certain kind of patient.

Despite the challenges the nurses faced in their work, they often mentioned how **close knit and supportive** they were to each other when they had emotional events in common. They would often turn to each other for emotional support. Jan suggested it was the traumatic events that brought the group closer: *“but seeing the [fellow staff members] that cried and how emotional they got, it tended to make you have a stronger bond that way, a better understanding of each other.”*

Impact of work life on home life. Most of the nurses stated their work impacted their home life in one way or another. This was particularly evident after a “bad day”, i.e. one with multiple trauma patients, difficult cases, or working without enough staff and not being able to take breaks. The participants talked about how a bad day at work would negatively impact their family. Dar explained *“Yeah, I probably go home and if the boys left something out or hadn't tidied up....I probably react a little more severely than on a normal day and they'll generally say; did you have a bad day.”* Sue also found herself behaving more negatively toward her family by being **grouchy and yelling** after a stressful day at work. She shared: *“Grouchy...I found I was grouchier, and stressier and yelling more then. And as a nurse, you just kind of come home and get supper and you just keep going, you don't deal with it.”* Sam summed it up *“It's insidious how it [work] affects your home life. I don't think you can pinpoint [the effects].”*

Ann described emotionally **withdrawing after a bad day** from her family because they could not understand what she went through at work that day.

I kind of withdraw, which is not necessarily the best thing to do but it is hard for your family to understand because you have to keep confidentiality...and when you come home, and you look like shit and you feel like shit and all you really want to do is snuggle beside your partner ...they don't get it."

Some of the nurses shared that they sought emotional support from their partners.

Jan described: *"You go home and cry and vent to your husband."*

Two participants mentioned **using alcohol** as a coping mechanism. *"It totally bleeds into your home life....so you go home, you vent, you cry, you drink a bottle of wine, you know you cope or whatever and then you get up the next day and you start over."*(Deb) And Kim *"Work is work, home is home...some nights I probably drink a couple of glasses of wine and that's how I deal with it."*

Compassion fatigue experience and perception. Most of the participants had heard of compassion fatigue and said it was a real issue they had experienced. The nurses shared how compassion fatigue in their experience led them to distancing themselves from having therapeutic relationships with patients. The nurses also felt there was a connection between compassion fatigue and the nurses' *feeling numb to emotions*. Deb acknowledged the vulnerability of this group of nurses to compassion fatigue because of the traumatic events they are involved with.

Yeah, I definitely have heard of compassion fatigue, that's something we definitely face here a lot, because we are such a small center and we're not really close to anything. We deal with a lot of traumatic stuff, infants, teenagers, adults, very traumatic deaths.

Jan indicated she understood compassion fatigue was the result of attending too many traumatic events. She shared: *“There are too many [traumatic] situations; we tend to bottle up a lot. There’s just too many.”*

Sam indicated the staff had even discussed compassion fatigue. She recalled: *“... we’ve had discussions about it (compassion fatigue)....I think it’s absolutely one hundred percent valid, real, and I see the effects of it, very aware of the effects of it.”*

Several nurses discussed their own experiences with compassion fatigue. Ann described her experience with compassion fatigue this way.

Nurses who have been a nurse for 30 years, you know, over time...we have hearts. We went into nursing because we were compassionate, because we care....trying to numb yourself and bury everything over time, it does affect your mental health and how you cope, right?

Kim was cynical about her own feelings of, or lack thereof, of compassion when nursing patients. She shared: *“you have to be pretty darn sick or pretty darn badly injured to get any empathy from me. Ann looked at it this way: “Compassion for so long and then you are like tired, you get exhausted being the caregiver, you know?” She went on to say, “Sometimes you regret it...when you get too involved. It makes it really, really hard.”*

Sam saw a relationship between nurses’ experiences of compassion fatigue and how they discussed patients with each other. She suggested that nurses who experience compassion fatigue would “negatively label” patients to justify a lack of caring about individuals. This could include labels such as “drug seeker”, “over reacting to pain” or “poor coping abilities”. The negative labels assigned to patients by some nurses could influence other nurses to adopt the negative label and thus the negative attitude in their own interactions with the patient. Sam

explained: *“Compassion fatigue and how it affects staff and watching my co-workers. You see it every day, how it affects how we relate to each other.”* She expanded: *“We put up barriers too. And then it affects how you relate to patients because you are trying to emotionally protect yourself so patients get labeled.”*

Other nurses mentioned the emotional barriers that can result from compassion fatigue. Ann explained putting up barriers was needed in order to be able to continue to work. *“I don’t know if you bury it or you form some kinds of barrier...take yourself out emotionally...you have to continue to finish your shift.”* Deb explained how she creates barriers with patients: *“I just separate myself because otherwise it builds up...If you personalize it like that could be my sister, that could be my whatever...It’s a patient, I learn very little about them and I just try to keep a wall.”*

Some nurses indicated that they would **avoid emotionally supporting patients** because it was too upsetting to get involved in their problems or they were too busy. *Zoe explained: “I try really hard to be emotionally available to them, to meet the patients and families needs...I mean sometimes you can only, you can only do what you can do”.*

The nurses also spoke about guarding their own emotions to avoid distress by becoming **hardened, cynical or blocking out situations** that would normally be troubling to them. For example, Sue coped by **using humour** in addition to blocking out events. *“I block a lot of it out because you have to keep going because I am an emotional person. I actually make jokes out of a lot of stuff so I can keep going.”* Sue coped in a similar way, *“Okay, **compartmentalize** it, it’s an accident, you didn’t cause it, you tried to help them, and you go that way.”*

Nurses’ experience with emotional support programs. The hospital did provide emotional support to the nurses if it was requested by the manager of the emergency department.

This support was not delivered by someone onsite but rather by someone brought in “from the city” that provided specific debriefing services. Services were also available through the nursing union if requested by members but none of the nurse interviewed, when asked about available resources, identified this as an option. A few of the nurses I interviewed had attended a debriefing session provided to them by the hospital following a particularly troubling event. The nurses who attended said the session was helpful. A few of the nurses who chose **not to attend** felt debriefing sessions were not useful and refused to participate. Four of the ten nurses interviewed, were **unaware of any programs** available to support them.

The nurses who were aware of support programs attributed this to their new manager (who had been there two years) and indicated that before she was hired, they did not have anything available. However the support provided was not always provided at an appropriate time for staff. One participant mentioned that while it was helpful to have debriefings, it would either be on a day off or during work hours. She also identified that debriefing meetings could be very emotional making it difficult to go back to work when it occurred during work hours. Even so, they were expected to head straight back to work despite this. Zoe shared:

“...especially when you are on shift, you leave and you are in this just terrible, sad horrible thing and then you have to come back, so not for me...” (Zoe) Similarly Ann found it hard to return to work right after debriefings, *“...we had a debriefing. And you have to go back to work after doing that, and I find that is very hard.”*

Sue was unaware that the hospital offered any programs to provide emotional support to nurses following a traumatic event in the department. *“I didn’t realize that we had somebody that actually you could talk to. I don’t think I’ve met her. I don’t think she’s ever made herself present in the department.”* Dar was also unaware of any local programs but did acknowledge

someone from the city came in recently to talk to the nurses. *“Yeah, so we don’t have any programs that address that. We did recently have a pretty bad fatality and they did bring in a counselor from the city. But for the most part, they don’t really have anything to address that.”*

Why Choose Nursing as a Career?

The nurses were asked why they wanted to become nurses. The answers to this question included flexibility of work hours, independence, job security; working with people rather than behind a desk, and that it would be interesting. Seven of the ten nurses interviewed said it was a need **to care for or help people** that drew them to a nursing career. Dar’s desire for independence plus her father’s concern for job stability made nursing a good fit for her. *“I wanted to be independent and I remember my parents, my dad specifically, wanting his girls to have a job where it was you, you know fairly stable”* Kim agreed, *“You’ll always be able to have a good job and provide for yourself”* Sam looked at nursing as a means to travel and work in Africa like her Uncle,

His stories intrigued me, and I said I want to go to Africa and work. And he said, by the time you are old enough, you’ll have to be a nurse or a teacher to get into the country, so you should be a nurse.

Sam became a nurse but has still never been to Africa.

Sue took a different approach to choosing her career, looking for a job that held a bit of excitement, *“I bandaged my cat up and I just wanted to do it. I wanted to be a nurse or a cop. I wanted to shoot em or fix em. One or the other.”* Kim had no career plans so she followed her high school friend to nursing school, *“And I finished high school and didn’t really know what to do, and my girlfriend went into nursing and she said, you should go into nursing.”*

It was Ann's desire to be a better nurse than her Grandmother had when sick, plus a family legacy of nurses that made nursing a career choice for her.

I wanted to be a nurse because my grandmother was dying, she was palliative care and the nursing staff that took care of her in a small, small rural hospital where burnt out and they were not very nice people. My grandmother was a nurse and my aunt was a nurse...I wasn't even thinking about being a nurse until, kind of my grandma.

Summary

The participants in this study were primarily older than 45, diploma-prepared nurses who lived and worked in the rural community the emergency department serviced. All of the participants described the emotional stress and strain of working in this environment. The nurses did not attribute this stress to single events but rather described multiple patient interactions over years of working. The participants demonstrated resiliency in their efforts to manage this stress through various coping methods. Some of these methods were more successful than others. There were formal supports in place to help the nurses with emotional issues such as compassion fatigue but most of the participants felt these programs were not readily available or not helpful. The insights gained from these findings, how the results relate to the literature, and implications for policy will be discussed in the next section.

Chapter 5

Discussion of Findings

This is one of the first studies to explore how the challenges of working in a rural emergency department can impact the mental health of nurses. The findings of this qualitative descriptive study provide a picture of the day-to-day challenges of registered nurses working in a rural Ontario emergency department and are situated within social and political influences. The stories of the nurses demonstrate the knowledge, skills, and abilities needed to care for patients within the context of a rural emergency department and how their emergency department working experiences can impact their mental health.

The findings suggest that a lack of resources in the rural emergency department resulted in nurses experiencing multiple challenges affecting patient care and safety, threatening their nursing licenses, their own physical and mental health, and family life. Furthermore, the findings suggest that the nurses who experience high levels of workplace stress may consider leaving the nursing profession or use maladaptive coping techniques such as use of alcohol. The nurses shared experiences that impacted their professional and personal life unique to living and working in a rural community. For example, the lack of anonymity in the community and knowing their patients personally was at times stressful for the nurse but also beneficial to the patients because the nurse would be more attentive to them. The nurses were very supportive of each other and thought of themselves as a tight knit group. However, despite this camaraderie, some nurses were reluctant to share any feelings of being affected emotionally by their work because of a fear of being perceived as weak by their peers.

A healthy work environment is one where nurses use their skills, expertise and clinical knowledge to achieve the goals of the organization while experiencing personal satisfaction from

their work (Disch, 2002). Despite the skills and knowledge of the nurses in this study, there were external contextual factors in their workplace that influenced their ability to care for the patients in the way they considered to be good and safe. This discussion of the findings will help bring new insight into the experiences of nurses working in a rural Ontario emergency. While there are many factors that influence the working environment of an emergency department, this discussion will focus on the key work related elements that emerged from the narratives of the nurses that contributed to, or left them vulnerable to work related mental health issues.

Contextual Factors-Lack of Resources

The lack of resources had a significant impact on the mental well being of the participants in this study. They described feeling stressed, frustrated, overwhelmed and overworked as a result of the lack of resources in their emergency department. We know from previous research that allocating resources and anticipating the needs of an emergency department is difficult because it is a place of unpredictable patient acuity, high patient turnover, and overcrowding (Hamilton, Tran, and Jamieson, 2016). These are all concerns mentioned by the nurses in this study as well. Bushy (2005), points out that a lack of resources is typical of a rural healthcare system where the cost of providing services for a small population can be prohibitive and seasonal surges in populations exist (Rural Health Information Hub, 2016). The scarcity of resources identified in this study included absence of support staff, lack of appropriate numbers of registered nurses to provide good safe patient care, lack of physical space and, at times, poor medical coverage of the emergency department.

When the participants talked about what they needed to provide care for their patients, it was often the lack of *human* resources that impacted them the most. This lack of resources had implications for both the patients and nurses. For example, a lack of ancillary support (meaning

services to support the nurses) made it necessary for nurses to assume non-nursing duties that took them away from providing direct care to the patients. The participants identified secretarial, lab, housekeeping, and even security roles as examples of these additional tasks. Previous research has identified that a lack of needed support staff can result in decreased quality of nursing care and nurses' job satisfaction. Baernholdt and Mark (2009) reported that nurses need enough support staff in order to provide quality care and improve job satisfaction. Mark and colleagues (2003) found that a greater availability of support services could predict better nursing care. Similar to the findings of Duffield and colleagues (2008), this study also found that having highly skilled emergency nurses take on non-nursing roles decreased their job satisfaction, negatively impacted quality patient care, and contributed to burnout.

The nurses discussed how inadequate staffing of R.N.s to meet the patients' needs negatively impacted their nursing care and affected them emotionally. They felt overwhelmed, frustrated and guilty when they could not tend to each patient and provide the quality care they wanted to. In the emergency department, a lack of qualified R.N staffing has been shown to lead to an increase in patients leaving without being seen, an increase in time to care, and a decrease in patient satisfaction (Recio-Saucedo, Pope, Dall'Ora, Griffiths, Jones, Crouch, and Drennan, 2015). Workload for nurses and patient outcomes are closely linked. For example, Aiken and colleagues (2002) found a 7% increase in the risk of patient morbidity and mortality for every patient added to a R.N.s workload. The nurses in this study also described the link between trying to care for too many patients at once and compromised patient care. The nurses described how an unmanageable workload not only had a negative impact on the patients' outcomes in the emergency department but compromised their own mental health as well. For example, the participants in this study described the emotional stress of knowing critically ill patients would

have had a better outcome if more nurses had been available to care for them. Furthermore the high patient to nurse ratios described by the participants in this study has been identified in previous research as a factor that can increase the chance of burnout by 23% (Aiken et al., 2002).

In addition to the stress of having too many patients to care for, the impact of running out of physical space to care for the patients also negatively impacted the nurses' mental well being. Similar to Hostutler, Taft and Snyder's (1990) study, the emergency nurses valued (or believed that) in addition to adequate R.N. staffing ,efficient physical space was necessary to providing good and safe patient care. The participants shared that at times, the emergency department would be at operational and physical overcapacity resulting from an influx of patients and/or increased patient acuity (illness). These conditions forced the nurses to make choices regarding patient care such as caring for patients in hallways. The participants said how frustrating and stressful it was to work in the overcrowded conditions because they knew patients were not receiving the care they needed. Similar to Berry & Curry's (2012) findings, this study also identifies that overcapacity in the emergency department is a significant contributor to excessive workload leading to increased stress. This is significant because the stress of overcrowding in the emergency department even by 10% has been associated with a 1.7-fold increase in mental health issues such as depression, in the nurses who work there (Virtanen et al., 2008). Interestingly, one nurse in my study had a previous diagnosis of depression that she attributed to working in the emergency department.

Experiencing the Trauma of Others

Findings from this study demonstrate that emergency nurses experience a phenomenon described by Figley (1995) as the empathetic response. An empathetic response is a complex cognitive, emotional and behavioural process in which nurses' place themselves into the

experience of a patient and feel similar emotions (Kelley & Lepo, 2011). For example, the nurses in this study described experiences that made them feel sad and hopeless. Many described crying at work, in their car or at home when they thought of a particular distressing day. A few nurses told me how they would avoid getting emotionally involved in order to distance themselves because they just didn't want to feel the distress of the family. These findings are examples of the empathetic response described by Figley (1995, 2002) and can contribute to mental health issues because they blur the professional/personal experiences of the nurse (Figley, 1995 & 2002). These findings are important because people in caring professions such as nursing feel and express empathy as part of their job. Consequentially, they are at a higher risk for experiencing mental health issues (Figley, 1995).

Many of the participants in this study had vivid memories of past traumatic events. The participants told stories in great detail of situations that affected them emotionally and hindered their ability to provide the care they wanted to for the patients. Mostly, it was traumatic pediatric cases that they found most disturbing and could recall easily. These descriptive accounts are interesting because as Figley (1995) identified, if people experience the traumatic event six months later through recollection, reminders, or dreams it could be considered a diagnostic criterion for compassion fatigue. These recollections could also be considered characteristic of the *re-experiencing* symptoms used to diagnose PTSD. These symptoms include flashbacks, bad dreams or frightening thoughts (National Institute of Mental Health, 2016).

Emotional Labour

The participants in this study discussed many situations where they could not express their emotions in order to provide care for the patients. Modifying your emotions in accordance to organizational rules and guidelines at work is referred to as emotional labour (Wharton, 2009).

The concept of emotional labour is used to make the connection between nursing work and adverse psychological effects that cause mental health problems. Emotional labour for nurses means they have to manage their own emotions in order to make others feel cared for and secure rather than expressing what they are really feeling (Smith, 1992). For example, nurses cannot allow themselves to panic when resuscitating a child. Instead, they have to remain calm and suppress their feelings in order to effectively care for the patient. Hochschild (1983) hypothesizes that this suppression of emotions can have a detrimental effect on the emotional well being of the nurse and lead to mental health issues such as emotional numbing (a symptom of compassion fatigue) and burnout (Hochschild, 1983).

Understanding Work Related Mental Health Issues

Understanding the phenomena of work related mental health issues for nurses is significant because of the correlation to nurse retention, staff turnover, and implications for patient care (Garman, Corrigan & Morris, 2002; Halbesleben, Wakefield, Wakefield, & Cooper, 2008). In this study, the participants spoke of experiences at work that affected them emotionally, physically, and/or psychologically, therefore leaving them vulnerable to mental health issues. These reactions have negative implications for the well-being of the nurse, and can be manifestations of mental health issues such as burnout and compassion fatigue (Figley, 1995). In addition, the participants in this study also identified other mental health issues such as depression, and alcohol use as a response to work stress.

Specific Factors that can Lead to Compassion Fatigue and Burnout

The participants identified many factors in their workplace that could contribute to the experience of stress and potential development of compassion fatigue and burnout (and perhaps also PTSD). These factors included the overcrowding of the emergency department, the high

acuity of the patients' illnesses, the fast pace of the emergency department, and a heavy workload. These are similar to the findings of an Australian study of emergency physicians who found factors such as high acuity, overcrowding and patient turnover were contributing stressors leading to compassion fatigue (Hamilton et al, 2016). In addition, these factors have been associated with a lack of job satisfaction, which in turn could further contribute to the development of compassion fatigue and/or burnout, and nurses considering leaving their jobs (Sawatzky & Enns, 2012).

Trauma cases involving young people were very upsetting for the nurses in this study. This is similar to Figley's (1995) findings that children's traumas are particularly distressing and can affect the mental health of caregivers. This can have implications for nurses in a rural emergency department because they see both adult and pediatric cases unlike urban centers that may have separate specialized pediatric facilities. In addition, because the nurses live in the small rural community, they could be further traumatized because they may personally know the children and their families they care for.

Symptoms of Compassion Fatigue and Burnout

During the interviews, the nurses described many symptoms that could be considered examples of compassion fatigue and/or burnout. For example they talked about: (a) experiencing intrusive thoughts after caring for trauma patients; (b) drinking alcohol to de-stress; (c) lashing out at their own families when they carried over the stress of their work life to their home life; (d) experiencing episodes of depression; and (e) feeling helpless to provide emotional support to patients. These are similar to the symptoms of compassion fatigue identified by Figley (2002) and Portnoy (2011) that include experiencing intrusive thoughts or images of another's traumatic

event, self destructive self-soothing behaviours (such as alcohol use, smoking), difficulty separating work from personal life, depression, feeling ineffective at work, and loss of hope.

Compassion fatigue is also implicated in the way the nurses communicated with each other and the patients. For example, one participant described how nurses might sarcastically label a patient during conversation with other nurses to emotionally protect themselves because they do not want to get too involved with the patient, or to justify a lack of care. This behaviour was also identified by Sheppard (2016) who wrote how sarcastic/rude remarks to co-workers or patients can also surface as a symptom of compassion fatigue. This is similar to Gentry, Baranowsky and Dunning's findings, (2002) that a lack of empathy the nurses demonstrated by the labeling patients could be the result of continuously working in an emotional environment (like the emergency department) feeling overtaxed and exhausted.

The participants in this study identified symptoms of burnout in themselves and in their coworkers. Some nurses left their jobs temporarily, some felt exhausted, a few talked about sleep disturbances, one experienced a significant depression, and two used alcohol to cope. These symptoms are examples of the five categories of burnout identified by Kahill (1998), who conducted a comprehensive review of the symptoms of burnout. These included physical symptoms, emotional symptoms, behavioral symptoms, work related symptoms, and interpersonal symptoms. In one interview, Sue talked about how the physical toll of working 12-hour shifts without proper breaks can lead to sleep disturbances and burnout. In addition, many participants spoke about feeling emotional and crying at work or at home as a result of a stressful event at work. Burnout in emergency nurses can be attributed to many factors. Increased workloads, working with dying and suffering patients, organizational factors, and conflicts have been shown to increase the risk of burnout and distress in E.D. nurses (Adriaenssens et al., 2013;

Hinderer et al., 2014). These are all factors identified by the participants in this study as challenges they faced as a result of their work.

Other Mental Health Concerns

In this study, one nurse attributed her diagnosis of *anxiety and depression* to her work experiences in the emergency department. Another nurse took a year off from nursing. She shared that her work experiences including the death of a young patient contributed to her leaving the profession for a year. Also concerning is the behavior of two nurses who drank alcohol after work to cope and help relieve the work stress they could not escape once at home after a distressing work day. The link between stress and alcohol consumption is known (Corbin, Farmer, and Nolen-Hoekesma, 2013). Researchers have reported that nurses' alcohol consumption is similar to the general population (Schluter, Turner, Huntington, Bain, and McLure, 2011). However, nurses have been found to have higher rates of binge drinking for those 35 and over than the general population (Kenna & Wood, 2004). Additionally, Trinkoff & Storr (1998) found emergency nurses and psychiatric nurses had higher rates of substance abuse than nurses in other units. Using alcohol to cope with stress can become problematic According to the US Department of Veteran Affairs (DVA) (2015), PTSD and the misuse of alcohol are often found together. The use of alcohol as a coping mechanism can exacerbate the symptoms of PTSD and lead to other mental health issues such as depression and anxiety (DVA 2015). The findings of this study indicate that 20% of the sample admitted to using alcohol as a coping strategy. This means, alcohol awareness should be considered when structuring support programs to mitigate the effects of stress on the nurses. The hospital did have programs already in place to address critical incident stress but the awareness and participation varied among the participants.

Some of the participants shared experiences, symptoms, and feelings that are seen in people with PTSD. Intrusive thoughts about a child's death kept Sue up at night. Ann described how after she would leave work, "stuff" would run through her head and how she would sit in her car and cry at the lake when thoughts about work became overwhelming. Interestingly, the nurses were able to recall very specific details such as the age of numerous pediatric trauma patients they cared for years ago. The behaviour of a grieving parent was firmly imprinted in Ann's mind as she demonstrated the clapping movements of a father during 6 hours of CPR on his son. Sue recalled vividly, a mother walking around the hospital holding her deceased child. These characteristics could indicate symptoms of PTSD in these nurses as described by the APA (2013). Symptoms used to diagnose PTSD include intrusive thoughts, difficulty sleeping, and recollection of traumatic events (APA, 2013). The nurses described how the recollection of traumatic events impacted their ability to function at work and negatively affected interaction with their own family members.

Experiences with Support Programs

A few nurses talked about their experiences with debriefings provided to them by the hospital following a particularly traumatic event. Some nurses did not find debriefing or critical incident stress management helpful and attributed it to personal preferences, and the use of a "city person" to conduct the sessions, and time restraints. Some of the participants were unaware of any programs at all available to them following traumatic work events. These findings are similar to Healy & Tyrrell (2013) who asked 103 emergency doctors and nurses about their experience with debriefings following a traumatic event in their emergency department. In their study, barriers to debriefing included lack of guidelines, staffing issues and time restraints such as the emergency being too busy and overcrowded to take the time to attend the debriefing. The

city person, as ‘outsider’, is an issue identified within rural nursing theory. In rural nursing theory, rural dwellers (in this case, the nurses) are seen as self-reliant and resist accepting help or services from those seen as outsiders (Long & Weinert, 1989). The nurses in this study felt uncomfortable with the person brought in from an urban centre to conduct the debriefing for them because they were an outsider and therefore assumed, not able to understand the way they work in a rural emergency department. This can have implications when allocating resources to address occupational workplace mental health for rural providers.

Moral/Ethical Distress

The nurses in this study echo the thoughts of Storch, Rodney & Starzomski (2013) who said the nursing profession is experiencing a “moral chaos” related to altered work environments, increased patient acuity, and lack of human and structural resources. Moral distress has been linked to several negative outcomes in workers including job dissatisfaction, fatigue, and turnover (DeTienne, Agle, Phillips, and Ingerson, 2012). Nurses with moral distress experience burnout and high job turnover, and may leave nursing all together (Torjuul & Sorlie, 2006). In addition, moral distress can build over time and make it more difficult to overcome (Hamric, 2012).

Participants in this study reported experiences of moral (and professional/ethical) distress. Three participants identified that they were occasionally required to work outside their scope of professional practice in order to save patients’ lives or prevent further negative health consequences for patients. They shared that this occurred when the patient acuity was high and emergency department patient visits surged. In these circumstances emergency department physicians were often unavailable as they were providing care to other critically ill patients. The participants discussed the legal ramifications of this practice in terms of concern for their own

registration with the College of Nurses of Ontario. The Nursing Act provides nurses in Ontario a scope of practice statement and defines the controlled acts that nurses are authorized to execute (Government of Ontario, 1991). Providing patient care outside of the RN scope of practice not only exposes the nurse to disciplinary action by their provincial regulatory body, but also exposes them to personal liability related to their actions and implicates the institution as well. Conversely, the participants shared that if they chose not to work outside their scope of practice in an emergency situation; it could lead to a negative outcome for the patient. Kim described this choice, as “not being right but it is what has to be done for the patient” (p.49). Making these critical decisions leaves the nurses vulnerable to ethical and/or moral distress. This type of distress can arise when a nurse makes a decision in what he/she decides is the right course of action but cannot carry it out due an obstacle, such as institutional policies (Canadian Nurses Association [CNA], 2003). Moral distress is not uncommon in nursing. Redman & Fry (2000) in their study found that 1 in 3 nurses have experienced some kind of moral distress.

The issue of rural R.N.s working outside their scope of practice has been addressed in other countries. In Australia, a program was introduced in 1996 to expand the role of Registered Nurses in rural and remote areas (Timnings, 2007). After attending a 9 month program the nurses were allowed to administer a selection of prescribed and controlled drugs to patients they assessed without a physician’s order. This program was successful and the number of qualified rural nurses grew from 500 to over 2000 in 7 years (Timnings, 2007). There are no programs in Ontario to expand the scope of practice for rural R.N.s other than return to school for a nurse practitioner program.

Hamric (2012) identified three root causes of moral distress. These include internal factors such as perceived lack of power, external factors such as inadequate staffing or feeling

unsupported by management, and the immediate clinical situation. The findings in this study also reveal the nurses were concerned about inadequate staffing, unsupportive management and having to make decisions based on an immediate clinical need in order to save lives. They knew they were going beyond their scope of practice but felt they had no choice but to act in the patient's best interest. This is important because in a research study of critical care nurses, the findings indicated the more morally distressed the nurses were, the higher their incidence of compassion fatigue was (Maiden, Georges & Connelly, 2011). In addition, this study found that compassion fatigue and moral distress could be contributing factors for medication errors by critical care nurses. In another study, compassion fatigue was also associated with medical errors by medical residents (West, Tan, Habermann, Sloan, & Shanafelt, 2009).

Similar to Hamric's (2012) root causes above, one nurse shared how a perceived lack of power or control combined with a clinical situation involving a critically injured child affected her emotionally. For example, she shared the stress and anxiety she felt when an incoming patient fit the description of her own child. This was replaced with a sense of guilt when she found out it wasn't her child but someone else's child. This brings in another mental health concept, that of *survivor guilt*. The nurse felt guilt over experiencing relief that she was spared the grief of her own child being injured (Hutson, Hall and Pack, 2015). Survivor guilt can lead to alterations in identity, problems with relationships, mental and physical health problems (Hutson et al., 2015).

The participants identified situations where they were unable to uphold profession standards related to overcrowding and patient acuity. One nurse put it this way "There's not ten of me". Another nurse remembers not being able to check on her critically ill patients for two hours and hoping someone else did. They looked at these issues from both a legal and moral

point of view. This is consistent with a 2009 survey by the College of Nurses of Ontario that found emergency departments were under continual pressure from overcrowding that resulted in the nurses experiencing vulnerability, a loss of control, and an increased risk of fatigue and moral distress because they could not deliver safe and effective care (College of Nurses of Ontario, 2009). One participant acknowledged when the physical space in the department could not meet their needs, the nurses would *under triage* a patient to an area that was not appropriate to the patient's acuity in order to get them out of the waiting room and at least a step closer to being seen by a nurse in a treatment area. This dilemma was stressful for the nurses because they knew this was not best practice and could compromise the patient's health by being placed in part of the emergency department meant for less acute patients. Emergency department overcrowding is seen as a measure of health system performance and is a potential environment for medical errors (Canadian Association of Emergency Physicians [CAEP], 2016). In addition, CAEP (2016) states caring for patients in an overcrowded emergency increases stress on caregivers and has implications for staff retention and staffing.

Culture of the Emergency Department

The nurses' described themselves as a tight knit group that took great pride in their work. They felt that by managing the working conditions of the emergency department, they were *survivors* and *resilient*. One nurse proudly said it is "a certain type of nurse that works in emerg". They relied on each other and did more with less than they felt their urban peers did. Interestingly there was a paradox of support within the culture of the emergency department. This climate of machismo could be detrimental in that nurses could be labeled as *weak* and *not cut out for it* if they voiced being negatively affected by their work. A 2004 University of British

Columbia report acknowledged the macho culture in the emergency department and that staff think they should be tough enough to deal with the challenges of working there (Smishek, 2004).

Nurses who work with trauma patients find the terms such as compassion fatigue stigmatizing, and negative, and the idea that a nurse could lose compassion as shameful and not something to admit (Shepard, 2015). This attitude was also found in this study as one nurse put it “It’s not always coolest to show vulnerability”. Employers can perpetuate this stereotype as well. A St. Elizabeth Healthcare webpage tells us “A nurse has to be physically, emotionally and mentally tough enough to engage the demands that the job will place on them” (St. Elizabeth Healthcare, 2015). This means nurses who experience work related mental health issues may not identify themselves or seek treatment.

Most of the nurses in this study said they went into nursing because they wanted to help people. People in caring professions, such as nursing, are particularly vulnerable to mental health issues as a result of the work they do (Figley, 2002). Other expectations of the job expressed by the participants included job security, flexible work hours, independence and that it would be interesting and patient focused. Changes in these job characteristics have been found to predict job satisfaction and influence long-term consequences such as leaving the profession (Adriaenssens et al., 2013).

Anonymity and Confidentiality

The findings of this study revealed that the nurses had all cared for people they knew in some capacity from the community. Some of the nurses even identified parents and siblings as patients they had cared for. Maintaining anonymity and confidentiality in health care is a concern for most people who live in rural areas (Bushy, 2004). Well-meaning residents have a genuine interest in other members of the community and may ask nurses about the health of relatives and

neighbours (Bushy, 2004). Managing this professional/personal boundary is one of the most common ethical issues for rural and remote practitioners (Roufeil, Battye, and Lipzker, 2004). In this study, the nurses were members of the rural community. This means, the nurses may know most patients as friends, neighbours, friends of friends, or even relatives (Bushy, 2005). In addition, this familiarity made it more likely they would be recognized in the community during nonworking hours and potentially asked about patients or work events which can be distressing for the nurse. Despite strategies to deal with inquiries about work from community members, participants mentioned the questioning could be awkward or place them in an uncomfortable position. Outside of work, being asked about a particularly upsetting work event could trigger disturbing memories. This can have implications for the mental health of the nurses. For example, compassion fatigue can be manifested by re-experiencing traumatic events (such as being asked to recall them) and being reminded of the traumatic event (Figley, 1995).

Because most people in the community know each other, the risk of a breach of confidentiality may deter people from seeking healthcare (Long & Weinert, 1989). In this study, some of the participants acknowledged that treating people they know could be awkward and embarrassing for both of them if it is for something “not the status quo” meaning a sexual or mental health issue. This supports the findings in Lee & Winters (2004) study who found the lack of anonymity in a rural area may influence residents seeking care for something they didn’t want the whole town to know about. This belief may also have implications for the nurses who work in the emergency department because the macho attitude of the ED coupled with a lack of anonymity may deter the nurse in seeking care for a perceived mental health issue such as compassion fatigue or burnout.

An unexpected finding from this study was that some of the nurses said that caring for patients they knew from the community for a traumatic illness was not very upsetting or stressful for them during the crisis. Instead, as one nurse phrased it, they would rely on their “instincts” to remain professional and task oriented. They also described techniques such as “distancing or blocking out” to keep from becoming distressed by traumatic events involving people they knew. This is contrary to what Roberts, Nimegeer, Farmer and Heaney (2014) found in a sample of community first responders who reported discomfort assisting known people in times of extreme vulnerability.

Leaving the Profession

Two of the ten nurses I interviewed for this study had left nursing for an extended period of time related to work induced mental health issues. They described how the stress of the working environment plus the emotional impact of caring for trauma patients led them to consider leaving nursing. This would necessitate the training of replacement staff for their positions. Hogan (2013) identified a direct link between nursing retention and quality of care. Essentially, this means that having permanent staff and not constantly training new nurses can improve patient care. In addition to the negative effects of staff turnover on patient care; the cost to the hospital is significant. The Canadian Nurses Association (2008) estimated it costs an institution approximately \$25,000 to replace each nurse that leaves his or her job. The cost of recruitment and training of R.N.s can be a huge impact to a rural hospital, such as this one, that is already struggling with cuts to its operating budget. The Ontario Health Coalition (2016) calls these cuts unprecedented and reported that Ontario had fallen to last place in terms of hospital funding and has the lowest nurse to patient ratio in Canada. The sustainability of rural Ontario emergency departments is threatened by a lack of retention and recruitment of qualified staff,

thus potentially impacting the health of the Canadians who live in these rural communities (Hogan, 2013).

The majority of the participants in this study were 45 years of age or older and a most said they would not be working at their current job or retire in ten years. This has implications for nurse retention because a CIHI (2000) report on nursing in small town and rural Canada noted that the number of R.N.s working in rural Canada had decreased while the number of people living in these areas increased. If this trend continues, not only do rural areas need more nurses, it is very important to retain the ones already working there in order to provide access to quality care for the residents of the community. More recently, since January 2015 Ontario hospitals have cut 1400 R.N. positions while the population continues to grow leaving fewer R.N.s to care for patients (Ontario Nurses' Association, 2016). Hogan, (2013) suggested in rural areas, where retention and recruitment of R.N.s can be challenging due to the aging nursing workforce and shortage of R.N.s, the need for retention of the qualified staff already working there is paramount in order to provide access to care to the residents. The aging of the R.N. workforce Hogan (2014) refers to is evident in my sample in that seventy percent of the participants were 45 years of age or older and a majority said they would not be working at their current job or retire in ten years.

Support Programs

Many nurses in the study had limited knowledge of the support available to them to address mental health issues resulting from their work. The participants shared that it wasn't until the hospital hired a new nurse manager, that they became aware of the support available in the hospital. Despite this new information, some nurses (40%) remained unaware that any resources (such as debriefing) were available to them at all. Debriefings are an important strategy

to manage the stress experienced by emergency department staff after traumatic events (Healy & Tyrrell, 2012). Alternative support should be offered to those who feel debriefings are not beneficial such as access to individual counseling or group sessions. In a rural emergency, consideration should be given to training local people or members of the nursing staff conduct the debriefing sessions. The participants felt someone from the city could not understand their rural emergency working experiences. Providing a person from within the department for debriefing would also be supported by Laposa, Alden, and Fullerton (2003) who found that nurses prefer the support of colleagues, families, and friends to formal programs after stressful incidents. Another potential obstacle to participation in such programs includes the stigma of self identifying as needing support for work related mental health issues as discussed earlier in the culture of the emergency department. Also, as previously discussed, the nurses were a tight knit group of individuals who took great pride in their work. Programs should build on this strength and cohesiveness to encourage inclusiveness and team building. This will enhance communication within the group at the local level and foster a sense of it being a safe place for group members to discuss any distressing issues sooner than later.

Implications for Nursing Policy and Practice

Rural emergency nurses play a significant role in the lives of patients who require their care. Due to the nature of the injuries experienced by patients, as well as the challenges of the job, this study shows rural emergency nurses are at high risk for mental health issues as a result of their work experiences and environment. These occupational hazards can threaten the physical and mental health of these nurses, which in turn affects the quality of care their patients receive. It is important to address those aspects of the rural emergency nurses' experiences that increase

their vulnerability to compassion fatigue, and burnout, and other mental health issues such as PTSD.

R.N. Staffing

The findings indicate that the shortage of RNs to care for the patients was a major concern for the participants. In Canada, nurse staffing is one of the few areas in health care where evidence is ignored in making decisions (Hall et al., 2006). Government at all levels needs to provide access to adequate funding to address excessive workloads and shortages of R.N.s, especially in rural areas. The nurses in the study spoke about how flexible work hours and easier access to banked vacation time helps them address issues of fatigue and emotional overload. Part-time work and job sharing was also beneficial to the nurses to enhance a work/life balance. The importance of proper breaks during all shifts needs to be reinforced.

Education

The participants had varying degrees of knowledge on workplace mental health issues. Nursing education programs and hospital orientation should include courses about the impact of compassion fatigue and burnout on patients, nurses, and home life. The nurses should be offered effective programs that are easily accessible to them (in person or on the internet) that emphasize the importance of self-care such as stress management, health maintenance, and professional development.

Other countries (Australia) have examined the responsibilities of rural nurses and have been successful in expanding their scope of practice by providing additional rural nursing programs. In order to meet the need of rural residents in Canada, and reduce the risk of rural nurses stepping outside their scope of practice in order to care for patients, programs to expand their role and additional delegated medical acts should be considered.

Programs to Address Work Related Mental Health Issues

The Occupational Health and Safety Act (Section 25(2) (h)) dictate that employers have a duty to protect their workers (Government of Ontario, 1990). This means taking measures to ensure no foreseeable injuries to the mental health of the worker. Therefore, it is important that hospitals provide mental health support to the nurses who work there including programs to reduce or mitigate mental health issues as a result of their work. Research into the effectiveness of these programs will assist institutions to choose the best fit for the employee who is or could be affected. Findings from this study indicate that programs instituted in urban ED are not necessarily transferrable to a rural ED, and within the ED, the nurses had different ideas of how programs could support them personally.

Charles Figley, along with Gentry and Baranowsky are credited with developing the first treatment program for compassion fatigue called the Accelerated Recovery program in 1997 (Gentry, Baranowsky, & Dunning, 2002). This program was designed to reduce the frequency and intensity of the symptoms of compassion fatigue in trauma workers and features self care strategies. A five-session program was developed with others who had experience working with trauma survivors. The program has been shown to be effective as evidenced by pre and posttest results using Professional Quality of Life scores and Satisfaction with Life Scale scores using actual participants in early sessions (Gentry et al., 2002). As a result of the effectiveness of the program, a specialist-training program was developed to train others to administer the program. This program highlights the importance of early intervention to mitigate the effects of compassion fatigue and that potentially effective programs can be developed to treat and hopefully prevent compassion fatigue.

Management Support

In this study, a past lack of support from management negatively impacting job satisfaction was raised by some of the nurses in different contexts. For example, when previous administration received a complaint about a nurse, the nurses felt that the administration would be more punitive towards the nurses rather than explore the situation for suggestions and alternative solutions to the problem. The nurse felt they were not heard and did not have a voice with management. This lack of support was also mentioned when nurses felt they had to work outside their scope of practice and was also implicated in their awareness and access to emotional support programs. The participants told me it was reassuring that a recently hired manager was knowledgeable about the impact that working in an emergency department can have on the mental health of the staff. They expanded on this by telling me they did not feel supported by previous managers in regard to traumatic events they experienced which could potentially impact their mental health. The importance of management in providing a healthy workplace has been well documented. Melvin (2012) wrote that nurse managers have a unique role to assist nurses who are distressed due to repeated exposure to traumatic events. Other studies have found R.N.s value a supportive nurse manager who demonstrates communication, respect, and cares for the staff (Feather, Ebright, and Bakas, 2015). Conversely, many R.N.s will leave their jobs as a result of a negative experience with a nurse manager (Boyle, Bott, Hansen, Woods, and Taunton, 1999); hence, education about work related mental health issues should include managers as well.

The nurses in this study gave examples of ways they felt the management could help them cope with the challenges of working in their emergency department. Job sharing, flexible work hours and scheduling were attributed to making the work environment more manageable and satisfying to the nurses, and also as stress management strategies. Scheduling is paramount

because if nurses are not given enough time to rest and manage stress between shifts, it can lead to the development of mental health issues such as compassion fatigue (Braunschneider, 2013). This type of improved scheduling has been suggested to reduce burnout in nurses (Witkoski-Stimpfel, Sloane, & Aiken, 2005). The nurses I interviewed said they would often miss breaks during their 12-hour shift because they were too busy to take one. This has implications for patient care because working without proper breaks in a 12-hour shift makes it difficult to perform without errors (Witkoski-Stimpfel et.al, 2012). Joanne et al., even found that working 12-hour shifts are associated with decreased performance in nurses. Manageable work hours and nurses getting enough sleep are important for quality patient care (Lockley et.al, 2004).

Recommendations for Future Research

The participants were primarily older nurses with many years of emergency department experience and countless exposures to traumatic events. Length of career and prolonged exposure to traumatic events has been found to increase the incidence of compassion fatigue in health care providers (Frank & Karioth, 2006; Lauvrud et al, 2009) and variables such as age, vocational education and years of practice have found to influence burn out (Koivula et.al, 2000). This has implications because the average age of an R.N. in Ontario was 45.4 in 2014 (College of Nurses of Ontario, 2015). The need for research into mental health issues for nurses becomes increasingly important to keep these nurses healthy in order to provide quality care for their patients.

Other recommendations for future research include replicating the study to include a larger scale, more diverse sample. A wider age range of participants, recruiting male nurses (to explore gender difference), and nurses from a multicultural background would enhance the sample and provide varying perspectives of mental health issues resulting from work

experiences. A larger scale study including nurses from other provinces would also contribute to the understanding of the potential for occupational mental health issues in Canadian rural emergency nurses. Other provinces may have different funding and access to resources as compared to Ontario which has faced unprecedented cuts to the health care budgets of rural hospitals. A longitudinal study interviewing the same emergency nurses at the beginning of their career and after a few years of working may also yield insight into the development of workplace related mental health issues over time. In addition, including nurses who admit to experiencing workplace mental health issues such as compassion fatigue and burnout would provide valuable information about coping and the success of management and intervention programs for rural emergency nurses. In a broader sense, nursing would benefit from more studies examining occupational health issues for rural nurses such as compassion fatigue and burnout.

Limitations

Some limitations of this study were evident. The first limitation was sample size. The small sample size of ten participants may bring into question the transferability of the findings. A second limitation of the study was the relatively homogeneous sample. All the participants were Caucasian females and most (7) were between 45 and 59 years of age and diploma educated. A third limitation is the use of one site. Using multiple sites would strengthen the transferability of the findings to other rural emergency departments. I was also not able to do a member check after the interview to affirm my interpretations of the interviews because it was not feasible to return to the hospital because distance/travel time. Had I been able to meet with the nurses again, member checking may have provided more insight into the experiences and enhanced the trustworthiness of the findings.

Summary

The discussion of this qualitative descriptive study has provided valuable insight into the experiences of nurses working in a rural emergency department, including the strengths of the team, the resourcefulness required to care for the patients, and the challenges that created significant emotional stress for the participants. New information emerged including the concept of survivor guilt as it impacts the nurses working in a small community. This research study contributes to the growing body knowledge on rural nursing as a distinct group of nurses within a unique working environment. By listening to the voices of rural emergency nurses about their experiences, I have sought to illuminate conditions that make this population vulnerable to mental health issues including compassion fatigue and/or burnout, and PTSD. Findings from this study support previous researchers that concluded working in an emergency department is a source of significant stress for nurses. This study expands on previous research but studies it from the lens working in small, rural community. Themes emerged that are unique stressors for rural nurses such as anonymity, confidentiality, and knowing the patients who present for treatment in the emergency department. This knowledge will inform policy and practice to ultimately improve the care of rural patients, benefit the nurses, and the community.

Conclusion

This study support previous research that declares occupational mental health matters are prevalent in nursing and are becoming a more prominent issue (Dominguez-Gomez & Rutledge, 2009; Nikosi, 2002; Porter et al., 2010). In this research study, we learn what workplace challenges rural emergency nurses' face that can contribute to occupational mental health issues such as compassion fatigue and burnout. Findings indicate that rural emergency nurses are challenged by a lack of resources (space, R.N.s and support staff), anxious about working outside

their scope of practice, and are concerned about issues related to patient privacy and their own anonymity in the community. Added to this is the emotional impact of caring for young trauma patients, family, and people they know from the community. The findings show that the experiences of the nurses also affect their family members and can be expressed by lashing out, impatience, and withdrawing from interactions with them. The participants had varied knowledge of support programs available to them, and mixed reviews on the access and effectiveness of such programs. Managers of rural emergency departments need to acknowledge the unique working conditions of the nurses, improve communication, and tailor support programs to meet the needs of each individual nurse who has experienced an occupational threat to their mental well being.

Rural emergency nursing is very different than working in a large urban ED. Despite these differences, very little research has been done exploring the challenges of working in a rural emergency department and how this can contribute to mental health issues in the registered nurses who work there. There is a large body of research to which this study contributes, that demonstrates the negative effect the consequences of compassion fatigue and burnout can have on job satisfaction (Dominguez-Gomez & Rutledge, 2009; Hooper et al., 2010; Lauvrud et al., 2009). This in turn has a negative effect on nurse retention, impacts the patients, and places a significant burden on the health care system to recruit and train new nursing staff.

These findings support a need for additional research, education, and policy to enable rural emergency nurses to care for their patients without compromising their own mental health. On April 5, 2016, the Ontario government passed legislation that recognized posttraumatic stress disorder in first responders is work related. This means that workers will have faster access to WSIB benefits, resources and timely treatment. This legislation applied to 73,000 first

responders in Ontario and does not include emergency nurses, but should. Findings from studies such as this one show us that nurses need to stand together, recognize the threat of the workplace mental health issues and continue to push for comprehensive programs to prevent, mitigate and cope with the effects. It would be beneficial to the healthcare system to retain nurses in an environment that is conducive to mental well being in order to reduce turnover and save costs associated with retraining new staff. This will lead to better care for our patients, improve the lives of nurses, and ultimately restore the professional satisfaction and expectations that drew us into nursing in the first place.

References

- Adams, L. (2015). *Workplace mental health manual for nurse managers*. New York, NY: Springer Publishing Company.
- Adriaenssens, J., De Gucht, V., & Maes, S. (2012). The impact of traumatic events on emergency room nurses: Findings of a questionnaire survey. *International Journal of Nursing Studies*, 49(11), 1411-1422.
- Adriaenssens, J., De Gucht, V., & Maes, S. (2014). Determinants and prevalence of burnout in emergency nurses: A systematic review of 25 years of research. *International Journal of Nursing Studies*, 649-661.
- Adriaenssens, J., De Gucht, V., & Maes, S. (2015). Causes and consequences of occupational stress in emergency nurses, a longitudinal study. *Journal of Nursing Management*, 3, 346-358. <http://dx.doi.org/10.1111/jonm.12138>
- Aiken, L., Clarke, S., Sloane, D., Sochalski, J., & Silber, J. (2002). Hospital nurse staffing and patient mortality, nurse burnout, and job dissatisfaction. *Journal of the American Medical Association*, 288, 1987-1993. <http://dx.doi.org/10.1001/jama.288.16.1987>.
- Almberg, B., Grafstrom, M., & Winblad, B. (1997). Major strain and coping strategies as reported by family members who care for aged demented relatives. *Journal of Advanced Nursing*, 26(4), 683-691.

- American Psychiatric Association. (2013). *Diagnostic and statistical manual of mental disorders* (5th ed.). Arlington, VA: American Psychiatric Publishing.
- American Psychological Association. (n.d.). Gender and stress. Retrieved August 09, 2016, from <http://www.apa.org/news/press/releases/stress/2010/gender-stress.aspx>
- Austin, W., Goble, E., Leier, B., & Byrne, P. (2009). Compassion fatigue: The experience of nurses. *Ethics and Social Welfare, 3*, 195-214.
<http://dx.doi.org/10.1080/17496530902951988>
- Aycock, N., & Boyle, D. (2009). Interventions to manage compassion fatigue in oncology nursing. *Clinical Journal of Oncology Nursing, 13*(2).
- Baernholdt, M., & Mark, B. A. (2009). The nurse work environment, job satisfaction and turnover rates in rural and urban nursing units. *Journal of Nursing Management, 17*(8), 994-1001. <http://dx.doi.org/10.1111/j.1365-2834.2009.01027.x>.
- Baker, T., & Dawson, S. L. (2013). What small rural emergency departments do: A systematic review of observational studies. *Australian Journal of Rural Health, 21*, 254-261.
- Beckstrand, R., Giles, V., Luthy, K., & Heaston, S. (2012). The last frontier: Rural emergency nurses' perceptions of end-of-life care obstacles. *Journal of Emergency Nursing, 38*(5), 15-25. <http://dx.doi.org/10.1016/j.jen.2012.01.003>
- Berger, W., Coutinho, E. S., Figueira, I., Marques-Portella, C., Luz, M. P., Neylan, T. C., ... Mendlowicz, M. V. (2012). Rescuers at risk: A systematic review and meta-regression analysis of the worldwide current prevalence and correlates of PTSD in rescue workers. *Social Psychiatry and Psychiatric Epidemiology, 47*, 1001-1011.
<http://dx.doi.org/10.1007/s00127-011-0408-2>

- Berry, L., & Curry, P. (2012). The nursing workload and patient care. *Canadian Federation of Nurses Union Report*.
- Boudreaux, E., & McCabe, B. (2000). Emergency psychiatry: Critical incident stress management: I. interventions and effectiveness. *Psychiatric Services, 51*(9), 1095-1097.
<http://dx.doi.org/abs/10.1176/appi.ps.51.9.1095>
- Boyle, D. K., Bott, M. J., Hansen, H. E., Woods, C. Q., & Taunton, R. L. (1999). Managers' leadership and critical care nurses' intent to stay. *American Journal of Critical care, 8*(6), 361-371.
- Braunschneider, H. (2013). Preventing and managing compassion fatigue and burnout in nursing. *ESSAI, 11*, 14-18. Retrieved from
https://www.ona.org/documents/File/frontlines/ONA_NursesKnowFeature_201605.pdf
- Burke, R. (2000). Workaholism in organizations: Psychological and physical well-being consequences. *Stress and Health, 16*(1), 11-16. <http://dx.doi.org/>Retrieved from
- Bushy, A. (2002). International perspectives on rural nursing: Australia, Canada, USA. *Australian Journal of Rural Health, 10*, 104-111.
- Bushy, A. (2005). Rural nursing practice and issues. American Nurses Association continuing education module. *American Nurses Association, 23-28*.
- Calgary Health Regional Authority. (2000). Abuse in the workplace: A program development guide for health care organizations.
- Canadian Association of Emergency Physicians. (2016). Emergency department overcrowding. Retrieved May 15, 2016, from <http://caep.ca/advocacy/romanow-commission/emergency-department-overcrowding>

- Canadian Centre for Occupational Health and Safety. (2016). Stress. Retrieved August 03, 2016, from <https://www.ccohs.ca/topics/wellness/stress/>
- Canadian Institute for Health Information. (2000). Registered nurses in rural and small town Canada . Retrieved from https://secure.cihi.ca/free_products/NursingRuralSmallTownCanada2000
- Canadian Institute for Health Information. (2012). Regulated nurses: Canadian trends, 2007 to 2011. Retrieved from http://publications.gc.ca/collections/collection_2012/icih-cihi/H115-48-2009-eng.pdf
- Canadian Institute for Health Information. (2015). Regulated nurses: Trends. Retrieved from <https://secure.cihi.ca/estore/productFamily.htm?pf=PFC3152&lang=en&media=0>
- Canadian Institute of Health Research, Natural Sciences and Engineering Research Council of Canada. (2014). Tri-council policy statement: Ethical conduct for research involving humans. .
- Canadian Nurses Association. (2003, October). Ethical distress in health care environments. *Ethics in Practice*. Retrieved from https://www.cna-aiic.ca/~media/cna/page-content/pdf-en/ethics_pract_ethical_distress_oct_2003_e.pdf?la=en
- Carayon, P., & Gurses, A. P. (2005). A human factor engineering conceptual framework of nursing workload and patient safety in intensive care units. *Intensive Critical Care Nurse*, 21(5), 284-301. <http://dx.doi.org/10.1016/j.iccn.2004.12.03>
- Center for Disease Control. (2008). Exposure to stress occupational hazards in hospitals. Retrieved from <https://www.cdc.gov/niosh/docs/2008-136/pdfs/2008-136.pdf>
- Cicchelli, L., & McLeod, D. (2012). Lived experiences of nurses as family caregivers in advanced cancer. *Canadian Oncology Nurse*, 22(1), 53-61.

- Coffey, M. (1999). Stress and burnout in forensic community mental health nurses: An investigation of its causes and effects. *Journal of Psychiatric and Mental Health Nursing*, 6(6), 433-443. <http://dx.doi.org/10.1046/j.1365-2850.1999.00243.x>
- College of Nurses of Ontario. (2009). Nursing in temporary locations: Listening to Ontario's nurses. Retrieved from <http://www.cno.org/globalassets/docs/policy/nursinginthehallsaugust2009.pdf>
- College of Nurses of Ontario. (2015). Membership statistics highlights 2014. Retrieved from http://www.cno.org/globalassets/docs/general/43069_stats/43069_membershipstatistics-highlights.pdf
- Corbin, W., Farmer, N., & Nolen-Hoekesma, S. (2013). Relations among stress, coping strategies, coping motives, alcohol consumption and related problems: A mediated moderation model. *Addictive Behaviors*, 38(4), 1912-1919. <http://dx.doi.org/10.1016/j.addbeh.2012.12.005>
- Corley, M., Minick, P., Eslwick, R. K., & Jacobs, M. (2005). Nurse moral distress and ethical work environment. *Nursing Ethics*, 12(4), 381-390.
- Crabtree, B. F., & Miller, W. L. (Eds.). (1999). Sampling in qualitative inquiry. *Doing Qualitative Research* (2nd ed., pp. 33-45). Thousand Oaks, CA: Sage Publications.
- Daniels, J. K., Hegadoren, K., Coupland, N. J., Rowe, B., Neufeld, R. W., & Lanius, R. A. (2011). Cognitive distortions in an acutely traumatized sample: An investigation of predictive power and neural correlates. *Psychological Medicine*, 41, 2149-2157.
- DeTienne, K. B., Agle, B. R., Phillips, J. C., & Ingerson, M. (2012). The impact of moral stress compared to other stressors on employee fatigue, job satisfaction, and turnover: An empirical investigation. *Journal of Business Ethics*, 110(3), 377-391.

- Disch, J. (2002). Creating healthy work environments. *Creative Nursing*, 8(2), 3-4.
- Dominguez-Gomez, E., & Rutledge, D. (2009). Prevalence of secondary traumatic stress among emergency nurses. *Journal of Emergency Nursing*, 199-204.
- Donnelly, E. A., & Siebert, D. C. (2009). Occupational risk factors in the emergency medical services. *Prehospital and Disaster Medicine*, 24(5), 428-435.
<http://dx.doi.org/10.1017/S1049023X00007251>
- Duffield, C., Gardner, G., & Catling-Paull, C. (2008). Nursing work and the use of nursing time. *Journal of Clinical Nursing*, 17(24).
- Dwyer, T. (1996). Stress in the rural emergency room. *The Australian Journal of Rural Health*, 4(4), 270-274.
- Elfering, A., Semmer, N. K., & Grebner, S. (2006). Work stress and patient safety: Observer-rated work stressors as predictors of characteristics of safety-related events reported by young nurses. *Ergonomics*, 49(5-6), 457-469.
<http://dx.doi.org/10.1080/00140130600568451>
- Elo, S., & Kyngas, H. (2007, November). The qualitative content analysis process. *Journal of Advanced Nursing*, 107-115.
- Epstein, P. M., Burns, C., & Conlon, H. A. (2010). Substance abuse among registered nurses. *American Association of Occupational Health Nurses Journal*, 58(12), 513-516.
- Erickson, R., & Grove, W. (2008). Why emotions matter: Age, agitation, and burnout among registered nurses. *Online Journal of Issues in Nursing*, 13(1). <http://dx.doi.org/10.3912/OJIN.Vol13No01PPT01>

- Feather, R. A., Ebright, P., & Bakas, T. (2015). Nurse manager behaviors that RNs perceive to affect their job satisfaction. *Nursing Forum*, *50*(1), 125-135.
<http://dx.doi.org/10.1111/nuf.12086>.
- Figley, C. (Ed.). (2002). ARP: The accelerated recovery program (ARP) for compassion fatigue. *Treating Compassion Fatigue* (pp. 123-137). New York, NY: Brunner-Routledge.
- Figley, C. R. (1995). *Compassion fatigue: Coping with secondary traumatic stress disorder in those who treat the traumatized*. New York, NY: Routledge Taylor & Francis Group.
- Figley, C. R. (Ed.). (2002). Diagnosis and treatment of helper stresses, traumas, and illnesses. *Treating Compassion Fatigue* (pp. 17-37). New York, NY: Routledge.
- Flarity, K., Gentry, J. E., & Mesnikoff, N. (2013). The effectiveness of an educational program on preventing and treating compassion fatigue in emergency nurses. *Advanced Emergency Nursing Journal*, *35*, 247-258.
- Frank, D. I., & Karioth, S. P. (2006). Measuring compassion fatigue in public health nurses providing assistance to hurricane victims. *Southern Online Journal of Nursing Research*, *7*(4), 1-13. Retrieved from
http://www.resourcenter.net/images/SNRS/Files/SOJNR_articles/iss04vol07.pdf
- Gacki-Smith, J., Juarez, A. M., Boyett, L., Homeyer, C., Robinson, L., & McLean, S. L. (2009). Violence against nurses working in US emergency departments. *Journal of Nursing Administration*, *39*(7-8), 340-349. <http://dx.doi.org/10.1097/NNA.0b013e3181ae97db>
- Garman, A., Corrigan, P., & Morris, S. (2002). Staff burnout and patient satisfaction: Evidence of relationships at the care unit level. *Journal of Occupational Health Psychology*, *7*(3), 235-241.

- Gates, D., & Gillespie, G. (2008). Secondary traumatic stress in nurses who care for traumatized women. *Journal of Obstetric, Gynecologic, & Neonatal Nursing*, 37(2), 243-249.
- Gates, D., Gillespie, G., & Succop, P. (2011). Violence against nurses and its impact on stress and productivity. *Nursing Economics*, 29(2), 58-66.
- Gentry, E., Baranowsky, A., & Dunning, T. (2002). ARP: the accelerated recovery program(ARP) for compassion fatigue . In C. Figley (Ed.), *Treating Compassion Fatigue* (pp. 123-138). New York, NY: Brunner/Routledge.
- Gillespie, M., & Melby, V. (2003). Burnout among nursing staff in accident and emergency and acute medicine: A comparative study. *Journal of Clinical Nursing*, 12(6), 842-851.
- Glaser, B. G., & Strauss, A. L. (1967). *The discovery of grounded theory: Strategies for qualitative research*. Chicago, IL: Aldine Pub. Co.
- Goins, R., Williams, K., Carter, M., Spencer, M., & Solovieva, T. (2005). Perceived barriers to health care access among rural older adults: A qualitative study. *Journal of Rural Health*, 3, 206-213.
- Golshiri, P., Pourabdian, S., Najaimi, A., Zadeh, A., & Hasheminia, J. (2012). Job stress and its relationship with the level of secretory IgA in saliva: A comparison between nurses working in emergency wards and hospital clerks. *The Journal of the Pakistan Medical Association*, 62, 26-30. <http://dx.doi.org/>Retrieved from
- Gountas, S., Gountas, J., Soutar, G., & Movando, F. (2013). Delivering good service: Personal resources, job satisfaction and nurses' 'customer' (patient) orientation. *Journal of Advanced Nursing*, 70(7), 1553–1563. <http://dx.doi.org/10.1111/jan.12308>
- Government of Ontario. (1990). Occupational health and safety act. Retrieved July 15, 2016, from <https://www.ontario.ca/laws/statute/90o01>

Government of Ontario. (1991). Nursing Act, 1991, S.O. 1991, c. 32 . Retrieved March 6, 2016, from <https://www.ontario.ca/laws/statute/91n32>

Government of Ontario. (2011). Rural and northern health care report. Retrieved from http://www.health.gov.on.ca/en/public/programs/ruralnorthern/docs/exec_summary_rural_northern_EN.pdf

Guba, E., & Lincoln, Y. (1994). Competing paradigms in qualitative research. In N. K. Denzin & Y. S. Lincoln (Eds.), *Handbook of qualitative research* (pp. 105-117). Thousand Oakes, CA: Sage.

Halbesleben, J. R., Wakefield, B. J., Wakefield, D. S., & Cooper, L. B. (2008). Nurse burnout and patient safety outcomes: Nurse safety perception versus reporting behavior. *Western Journal of Nursing Research, 30*(5), 560-577. <http://dx.doi.org/10.1177/0193945907311322>.

Hall, L. M., Pink, L., Lalonde, M., Murphy, G. T., O'Brien-Pallas, L., Lashinger, H. K., ... Akeroyd, J. (2006). Decision making for nurse staffing: Canadian perspectives. *Policy, Politics and Nursing Practice, 7*(4), 261-269.

Hamilton, S., Tran, V., & Jamieson, J. (2016). Compassion fatigue in emergency medicine: The cost of caring. *Emergency Medicine Australasia, 28*(1), 100-103.

Hamric, A. B. (2012). Empirical research on moral distress: Issues, challenges, and opportunities. *HEC Forum, 1*(1), 39-49. <http://dx.doi.org/10.1007/s10730-012-9177-x>.

Happell, B., Dwyer, T., Reid-Searl, K., Burke, K. J., Caperchione, C. M., & Gaskini, C. J. (2013). Nurses and stress: Recognizing causes and seeking solutions. *Journal of Nursing Management, 21*, 638–647. <http://dx.doi.org/10.1111/jonm.12037>

- Harkin, M., & Melby, V. (2014). Comparing burnout in emergency nurses and medical nurses. *Clinical Nurse Studies*, 2(3), 152-163.
- Harvard Medical School. (2012). Why stress causes people to overeat. Retrieved August 06, 2016, from http://www.health.harvard.edu/newsletter_article/why-stress-causes-people-to-overeat
- Healy, S., & Tyrrell, M. (2011). Stress in emergency departments: Experiences of nurses and doctors. *Emerg Nurse*, 31-37.
- Healy, S., & Tyrrell, M. (2013). Importance of debriefing following critical incidents. *Emergency Nurse*, 20(10), 32-37.
- Hicks Morley Hamilton Stewart Storie LLP. (2014). WSIAT finds limitations on mental stress unconstitutional. Retrieved Sept. 02, 2016, from <https://hicksmorley.com/2014/05/15/wsiat-finds-limitations-on-mental-stress-unconstitutional/>
- Hinderer, K., VonRouden, K., Friedmann, E., McQuillan, K., Gilmore, R., Kramer, B., & Murray, M. (2014). Burnout, compassion fatigue, compassion satisfaction, and secondary traumatic stress in trauma nurses. *Journal of Trauma Nursing*, 21(4), 160-169.
<http://dx.doi.org/10.1097/JTN.0000000000000055>
- Hochschild, A. (1983). *The managed heart: Commercialization of human feeling*. Berkeley: University of California Press.
- Hogan, K. (2013). *How to sustain emergency health care services in rural and small town Ontario* (Doctoral dissertation, Queens University). Retrieved from http://qspace.library.queensu.ca/bitstream/1974/8306/1/Hogan_Kerry-Anne_201309_Ph.d.pdf

- Hooper, C., Craig, J., Janvrin, D. R., Wetsel, M. A., & Reimels, E. (2010, September). Compassion satisfaction, burnout, and compassion fatigue among emergency nurses compared with nurses in other selected inpatient specialties. *Journal of Emergency Nursing*, 420-427.
- Hostutler, J. J., Taft, S. H., & Snyder, C. (1999). Patient needs in the emergency department: Nurses' and patients' perceptions. *Journal of Nursing Administration*, 29(1), 43-50. <http://dx.doi.org/>Retrieved from
- HRPA Today. (2015). The toxic workplace and employee mental health. Retrieved from <http://www.hrpatoday.ca/article/the-toxic-workplace-and-employee-mental-health.html>
- Hsieh, H., & Shannon, S. E. (2005, November). Three approaches to qualitative content analysis. *Qualitative Health Research*, 15(9), 1277-1288.
- Hughes, R. G. (Ed.). (2008). Work stress and burnout among nurses: Role of the work environment and working conditions. *Patient safety and quality: An evidence-based handbook for nurses*. Rockville, MD: Agency for Healthcare Research and Quality.
- Hunsaker, S., Chen, H., Maughan, D., & Heaston, S. (2015). Factors that influence the development of compassion fatigue, burnout, and compassion satisfaction in emergency department nurses. *Journal of Nursing Scholarship*, 47(2), 186-194.
- Hutson, S., Hall, J., & Pack, F. (2015). Survivor guilt: Analyzing the concept and its contexts. *ANS Adv Nurs Sci*, 38(1), 20-33. <http://dx.doi.org/10.1097/ANS.0000000000000058>
- Jackson, E. R., Shanafelt, T. D., Hassan, O., Satele, D. V., & Dyrbye, L. N. (2016). Burnout and alcohol abuse/dependence among U.S. medical students. *Academic Medicine*. Retrieved from <http://www.ncbi.nlm.nih.gov/pubmed/26934693>

- Jahoda, M. (1981). Work, employment and underemployment: Values, theories and approaches in social research. *American Psychologist*, 36(2), 184-191.
<http://dx.doi.org/10.1037/0003-066X.36.2.184>
- Joinson, C. (1992). Coping with compassion fatigue. *Nursing*, 22, 116-121.
- Jones, C., & Gates, M. (2006). The costs and benefits of nurse turnover: A business case for nurse retention. *Online Journal of Issues in Nursing*, 12.
<http://dx.doi.org/10.3912/OJIN.Vol12No03Man04>
- Jones, D., Tanigawa, T., & Weisse, M. (2003). Stress management and workplace disability in the US, Europe, and Japan. *Journal of Occupational Health*, 45(1), 1-7.
- Kahill, S. (1988). Symptoms of professional burn-out: A review of the empirical evidence. *Canadian Psychology*, 29(3), 284-297. <http://dx.doi.org/10.1037/h0079772>
- Kandolin, I. (2007). Burnout of female and male nurses in shiftwork. *Ergonomics*, 141-147.
<http://dx.doi.org/10.1080/00140139308967865>
- Kawano, Y. (2008). Association of job related stress factors with psychological and somatic symptoms among Japanese hospital nurses: Effects of departmental environment in acute care hospitals. *Journal of Occupational Health*, 50(1), 79-85.
- Kelley, K., & Lepo, A. (2011). Empathy and nursing education from mirror neurons to the experience of empathy: 21st century nursing education. *International Journal for Human Caring*, 15(4), 22-28.
- Kenna, G. A., & Wood, M. D. (2004). Alcohol use by healthcare professionals. *Drug Alcohol Dependence*, 75, 107-116.

- Klopper, H. C., Coetzee, S. K., Pretorius, R., & Bester, P. (2012). Practice environment, job satisfaction and burnout of critical care nurses in South Africa. *Journal of Nursing Management, 20*, 685-695. <http://dx.doi.org/10.3390/ijerph10062214>
- Koivula, Paunonen, & Laippala (2000). Burnout among nursing staff in two Finnish hospitals. *Journal of Nursing Management, 8*(3), 149-158.
- Laposa, J. M., Alden, L. E., & Fullerton, L. M. (2003). Work stress and posttraumatic stress disorder in ED nurses/personnel. *Journal of Emergency Nursing, 29*(1), 23-28.
- Lauvrud, C., Nonstad, K., & Palmstierna, T. (2009). Occurrence of post traumatic stress symptoms and their relationship to professional quality of life (ProQol) in nursing staff at a forensic psychiatric security unit: A cross sectional study. *Health and Quality of Life Outcomes. <http://dx.doi.org/10.1186/1477-7525-7-31>*.
- Lavoie, S., Talbot, L. R., & Mathieu, L. (2011). Post-traumatic stress disorder symptoms among emergency nurses: Their perspectives and a “tailor-made” solution. *Journal of Advanced Nursing, 67*(7), 1514-1522.
- Lee, H., & Winters, C. (2004). Testing rural nursing theory: Perceptions and needs of service providers. *Online Journal of Rural Nursing and Health Care, 4*(1), 51-63. Retrieved from <http://rnojournl.binghamton.edu/index.php/RNO/article/viewFile/212/185>
- Leiter, M. P., & Maslach, C. (2009). Nurse turnover: The mediating role of burnout. *Journal of Nursing Management, 17*, 331-339.
- Lincoln, Y. S., & Guba, E. G. (1985). *Naturalistic inquiry*. Newbury Park, CA: Sage.
- Lobiondo-Wood, G., Haber, J., Cameron, C., & Singh, M. D. (2009). *Nursing research in Canada* (2nd ed.). Toronto, ON: Elsevier.

- Lockley, S. W., Barger, L. K., Ayas, N. T., Rothschild, J. M., Czeisler, C. A., & Landrigan, C. P. (2007). Effects of health care provider work hours and sleep deprivation on safety and performance. Retrieved from <https://www.jointcommission.org/assets/1/18/S2-JQPS-11-07S-lockley.pdf>
- Long, K. A., & Weinert, C. (1989). Rural nursing: Developing the theory base. *Scholarly Inquiry for Nursing Practice*, 113-127.
- Lu, D., Dresden, S., McCloskey, C., Branzetti, J., & Gisondi, M. (2015). Impact of burnout on self-reported patient care among emergency physicians. *West J Emerg Med*, 16(7), 996–1001. <http://dx.doi.org/10.5811/westjem.2015.9.27945>
- Lu, H., While, A., & Barriball, K. (2005). Job satisfaction among nurses: A literature review. *International Journal of Nursing Studies*, 211–227.
- Maiden, J., Georges, J. M., & Connelly, C. D. (2011). Moral distress, compassion fatigue, and perceptions about medication errors in certified critical care nurses. *Dimensions in Critical Care Nursing*, 30(6), 339-345.
- Mark, B. A., Salyer, J., & Wan, T. T. (2003). Professional nursing practice impact on organizational and patient outcomes. *Journal of Nursing Administration*, 33(4), 224-234.
- Marshall, R. E., Zahorodny, M. R., & Passannante, M. (1998). Burnout among neonatologists and pediatricians. *Neonatal Intensive Care*, 11
- Maslach, C., & Jackson, S. (1982). Burnout in health professions: A social psychological analysis. In G. Sanders & J. Suls (Eds.), *Social Psychology of Health and Illness*. Hillsdale, NJ.: Erlbaum.
- Maslach, C., & Leiter, M. P. (1997). *The truth about burnout*. San Francisco: Jossey-Bass.

- Mathieu, F. (2007). Running on empty: Compassion fatigue in health professionals. *Workshops for the Helping Professions*. Retrieved from <http://www.compassionfatigue.org/pages/RunningOnEmpty.pdf>
- McCoy, C. (2009, March). Professional development in rural nursing: Challenges and opportunities. *The Journal of Continuing Education in Nursing, 40*, 128-131.
- McVicar, A. (2003). Workplace stress in nursing: A literature review. *Journal of Advanced Nursing, (44)*, 633-642.
- Mealer, M., & Jones, J. (2013). Posttraumatic stress disorder in the nursing population: A concept analysis. *Nursing Forum, 48(4)*, 279-288.
- Melvin, C. (2012). Profession compassion fatigue: What is the true cost of caring for the dying? *International Journal of Palliative Nursing, 18(12)*, 606-611.
- Miles, M. B., Huberman, A. M., & Saldana, J. (2014). *Qualitative data analysis* (3rd ed.). Thousand Oaks, CA: Sage.
- Mills, J., & Aubeeluck, A. (2006). Nurses' experiences of caring for their own family members. *British Journal of Nursing, 15(3)*, 160-165.
- Ministry of Health and Long-term Care of Ontario. (2012). Rural and Northern Health Care Report. Retrieved from http://www.health.gov.on.ca/en/public/programs/ruralnorthern/docs/exec_summary_rural_northern_EN.pdf
- Mobley, M. J., Rady, M. Y., Verheijde, J. L., Patel, B., & Larson, J. S. (2007). The relationship between moral distress and perception of futile care in the critical care unit. *Intensive critical Care Nursing, 23(5)*, 265-263.

- Moszczyński, A., & Hanley, C. (2002). Stress and coping of Canadian rural nurses caring for trauma patients who are transferred out. *Journal of Emergency Nursing*, 28(6), 496-504.
<http://dx.doi.org/10.1067/men.2002.129727>
- Multi-Site/Small Hospitals Advisory Group. (2006). . Retrieved from
<http://www.ruralontarioinstitute.ca/file.aspx?id=06f58a3b-ee30-46eb-84c2-e5ee1b718733>
- National Institute of Mental Health. (2016). Post-traumatic stress disorder. Retrieved July 14, 2016, from <http://www.nimh.nih.gov/health/topics/post-traumatic-stress-disorder-ptsd/index.shtml>
- National Institute of Mental Health. (2016). Post-traumatic stress disorder. Retrieved July 23, 2016, from <http://www.nimh.nih.gov/health/topics/post-traumatic-stress-disorder-ptsd/index.shtml>
- Niemira, D., & Townsend, T. (2009). *Handbook for rural health care ethics: A practical guide for professionals*. Lebanon, NH: University Press of New England.
- NVivo 10 (Version 10) [computer software]. (2012). : QSR International Pty Ltd.
- Ontario Health Coalition. (2016). 2016 Ontario budget — Minimal funding increases for hospitals: Not far enough. Retrieved from
<http://www.ontariohealthcoalition.ca/index.php/release-2016-ontario-budget-minimal-funding-increases-for-hospitals-not-far-enough/>
- Ontario Joint Policy and Planning Committee. (2006). The core service role of small hospitals in Ontario. *Summary Report to the Ministry of Health and Long-term Care*.
- Ontario Nurses' Association. (2016). It's time to take action for better care. Retrieved from
https://www.ona.org/documents/File/frontlines/ONA_NursesKnowFeature_201605.pdf

- Pines, A., & Aronson, E. (1988). *Career burnout: Causes and cures*. New York, NY: Free Press.
- Polit, D. F., & Beck, C. T. (2012). *Nursing research: Generating and assessing evidence for nursing practice* (9th ed.). Philadelphia: Wolters Kluwer Health/Lippincott Williams & Wilkins.
- Portnoy, D. (2011). Compassion fatigue watch for the signs. Retrieved July 15, 2016, from <http://www.compassionfatigue.org/pages/healthprogress.pdf>
- Potter, P., Deshields, T., Divanbeigi, J., Berger, J., Cipriano, D., Norris, L., & Olsen, S. (2010). Compassion fatigue and burnout: Prevalence among oncology nurses. *Clinical Journal of Oncology Nursing*, *14*(5), 56-62.
- PTSD Association of Canada. (2016). What is PTSD ? Retrieved August 03, 2016, from <http://www.ptsdassociation.com/about-ptsd/>
- Pyper, Z., & Patterson, J. (2016). Fatigue and mental health in Australian rural and regional ambulance personnel. *Emergency Medicine Australasia*, *28*(1), 62-66.
- Recio-Saucedo, A., Pope, C., Dall'Ora, C., Griffiths, P., Jones, J., Crouch, R., & Drennan, J. (2015). Safe staffing for nursing in emergency departments: Evidence review. *Emergency Medicine Journal*, *32*(11), 888-894. <http://dx.doi.org/10.1136/emmermed-2015-204936>.
- Redman, B. K., & Fry, S. T. (2000). Nurses' ethical conflicts: What is really known about them? *Nursing Ethics*, *7*(4), 360-366.
- Roberts, A., Nimegeer, A., Farmer, J., & Heaney, D. (2014). The experience of community first responders in co-producing rural health care: In the liminal gap between citizen and professional. *BMC Health Services research*, *14*. <http://dx.doi.org/10.1186/1472-6963-14-460>

- Rodgers, B., & Cowles, K. (1993). The qualitative research audit trail: A complex collection of documentation. *Research in Nursing & Health, 16*(3), 219-226.
<http://dx.doi.org/10.1002/nur4770160309>
- Roufeil, L., Battye, K., & Lipzker, A. (2007). Psychology services in rural and remote Australia. Retrieved from https://www.psychology.org.au/publications/inpsych/rural_remote/
- Rural Information Hub. (2016). Health and healthcare in frontier areas introduction. Retrieved July 03, 2016, from <https://www.ruralhealthinfo.org/topics/frontier>
- Rural Ontario Institute. (2013). Overview of Ontario's rural geography. Retrieved from www.ruralontarioinstitute.ca
- Rushton, C. H., Batcheller, J., Schroeder, K., & Donohue, P. (2015). Burnout and resilience among nurses practicing in high-intensity settings. *American Journal of Critical Care, 412-420*. <http://dx.doi.org/10.4037/ajcc201591>
- Sabo, B. (2011). Reflecting on the concept of compassion fatigue. *The Online Journal of Issues in Nursing, American Nursing Association, 16*.
- Sandelowski, M. (1995). Sample size in qualitative research. *Research in Nursing & Health, 18*(2), 179-183.
- Sandelowski, M. (2000). Whatever happened to qualitative description? *Research in Nursing & Health, 23*, 334-340.
- Sawatzky, J. V., & Enns, C. L. (2012). Exploring the key predictors of retention in emergency nurses. *Journal of Nursing Management, 20*, 696-707.
- Schaufeli, W. B., Salanova, M., Gonzalez-Roma, V., & Bakker, A. B. (2002). The measurement of engagement and burnout: A two sample confirmatory factor analytic approach. *Journal of Happiness Studies, 3*, 71-92.

- Schulter, P., Turner, C., Huntington, A., Bain, C., & McLure, R. (2011). Work/life balance and health: The nurses and midwives e-cohort study. *International Nursing Review*, 58(1), 28-36. <http://dx.doi.org/10.1111/j.1466-7657.2010.00849.x>
- Sheppard, K. (2015). Compassion fatigue among registered nurses: Connecting theory and research. *Applied Nursing research*, 28(1), 57-59.
- Sheppard, K. (2016). Compassion fatigue: Are you at risk? *America Nurse Today*, 11(1). Retrieved from <https://americannursetoday.com/compassion-fatigue/>
- Showalter, S. (2010). Compassion fatigue: What is it? Why does it matter? *American Journal of Hospice Palliative Medicine*, 27, 239-242.
- Smishek, E. (2004). Shell shock in the emergency room. Retrieved from <http://news.ubc.ca/2004/03/04/archive-ubcreports-2004-04mar04-shellshock/>
- Smith, P. (1992). *The emotional labour of nursing*. London: Macmillan.
- St. Elizabeth Healthcare. (2015). Answering the call: The mental toughness required for nursing. Retrieved from <https://stelizabethhealthcare.wordpress.com/2015/11/09/mental-toughness-nursing/>
- Staff Abuse: Prevention and Management Initiative*. (2000). Abuse in the workplace: A program development guide for health care organizations. Staff Abuse: Prevention and Management Initiative.
- Stamm, B. (2010). *The concise ProQOL manual* (2nd ed.). Pocatello, ID: ProQOL.org.
- Storch, J. L., Rodney, P., & Starzomski, R. (2013). *Toward a moral horizon: Nursing ethics for leadership and practice* (2 ed.). Toronto, ON: Pearson Education Canada.
- Stordeur, S., Vandenberghe, C., & D'hoore, W. (1999). Predictors of nurses' professional burnout: A study in a university hospital. *Recherche en soins Infirmiers*, 59, 57-67.

The Government of Ontario. (1991). Nursing Act, 1991, S.O. 1991, c. 32. Retrieved March 6, 2016, from <https://www.ontario.ca/laws/statute/91n32>

The Minister of Health and Long-Term Care. Retrieved from <http://www.ruralontarioinstitute.ca/file.aspx?id=06f58a3b-ee30-46eb-84c2-e5ee1b718733>

Thorne, S. (2000). Data analysis in qualitative research. *Evidence Based Nursing*, 3(3). <http://dx.doi.org/10.1136/ebn.3.3.68>

Thorne, S. (2008). *Interpretive description*. Walnut Creek, CA: Left Coast Press Inc.

Timmings, R. (2007). Expanded roles = RIPRN. *Australian Nursing Journal*, 14(6), 37.

Torjuul, K., & Sorlie, V. (2006). Nursing is different than medicine: Ethical difficulties in the process of care in surgical wards. *Journal of Advanced Nursing*, 56(4), 404-413.

Trinkoff, A. M., & Storr, C. L. (1998). Work schedule characteristics and substance use in nurses. *American Journal of Industrial Medicine*, 34, 266-271.

Trinkoff, A. M., Zhou, Q., Storr, C. L., & Soeken, K. L. (2000). Workplace access, negative proscriptions, job strain, and substance use in registered nurses. *Nursing Research*, 49(2), 83-90.

United States Department of Agriculture. (2013). Rural classifications. Retrieved from <http://www.ers.usda.gov/topics/rural-economy-population/rural-classifications/what-is-rural.aspx>

US Department of Veterans Affairs. (2015). PTSD and problems with alcohol use. Retrieved August 03, 2016, from <http://www.ptsd.va.gov/public/problems/ptsd-alcohol-use.asp>

- Vaismoradi, M., Turunen, H., & Bondas, T. (2013). Content analysis and thematic analysis: Implications for conducting a qualitative descriptive study. *Nursing & Health Sciences, 15*, 298-405.
- Virtanen, M., Batty, D., Pentti, J., Vahtera, J., Oksanen, T., Tuisku, K., ... Kivmaki, M. (2010). Patient overcrowding in hospital wards as a predictor of diagnosis-specific mental disorders among staff: A 2-year prospective cohort study. *Journal of Clinical Psychiatry, 71*(10), 1308-1312. <http://dx.doi.org/10.4088/JCP.09m05238blu>
- West, C. P., Tan, A. D., Habermann, T., & Sloan, J. (2009). Association of resident fatigue and distress with perceived medical errors. *Journal of the American Medical Association, 302*(12), 1294-1300. <http://dx.doi.org/10.1001/jama.2009.1389>.
- Wharton, A. S. (2009). The sociology of emotional labor. *Annual Review of Sociology, 35*, 147-165.
- Whittemore, R., Chase, S. K., & Mandle, C. L. (2001, July). Validity in qualitative research. *Qualitative Health Research, 11*, 522-537.
- Williams, M. A., Andrews, J. A., Zanni, K. L., & Stewart Fahs, P. S. (2012). Rural nursing: Searching for the state of the science. *Online Journal of Rural Nursing & Health Care*. Retrieved from <http://rnojournl.binghamton.edu/index.php/RNO/article/view/117>
- Witkoski-Stimpfel, A., Sloane, D., & Aiken, L. (2012). The longer the shifts for hospital nurses, the higher the levels of burnout and patient dissatisfaction. *Health Affairs, 31*. <http://dx.doi.org/10.1377/hlthaff.2011.1377>
- Wolfgang, A. (1988). Job stress in the health professions: A study of physicians, nurses, and pharmacists. *Hospital Topics, 66*(4), 24-27. <http://dx.doi.org/10.1080/00185868.1988.10543616>

Workplace Safety and Insurance Act. (1997). S.O. 1997, c. 16, Sched. A. Retrieved from

<https://www.ontario.ca/laws/statute/97w16>

Workplace Safety and Insurance Appeals Tribunal. (2014). Decision 2157 09. Retrieved Sept 02, 2016, from

http://www.wsiat.on.ca/NoteworthyDecSummary.asp?lan=E&dec_decid=58670

Workplace Safety and Insurance Board. (2016). Posttraumatic stress disorder in first responders and other designated workers. Retrieved from

http://www.wsib.on.ca/WSIBPortal/faces/WSIBArticlePage?fGUID=835502100635000711&_afLoop=5707068515413187&_afWindowMode=0&_afWindowId=10zuyebao2_131#%40%3F_afWindowId%3D10zuyebao2_131%26_afLoop%3D5707068515413187%26_afWindowMode%3D0%26fGUID%3D835502100635000711%26_adf.ctrl-state%3D10zuyebao2_151

World Health Organization. (2000). Mental health and work: Impact, issues and good practices.

Retrieved from http://www.who.int/mental_health/media/en/712.pdf

World Health Organization. (2016). International statistical classification of diseases and related health problems 10th revision. Retrieved August 25, 2016, from

<http://apps.who.int/classifications/icd10/browse/2016/en#!/IX>

Appendix A



UNIVERSITÉ
UNIVERSITY

OFFICE OF
RESEARCH
ETHICS (ORE)

3rd Floor,
Kaneff Tower,
4700 Keele St.
Toronto ON
Canada M3J 1P3
Tel: 416-736-5914
Fax: 416-650-8197
www.oresearch.yorku.ca

Certificate #:	STU 2015 - 001
Approval Period:	01/14/15-01/14/16

Memo

To: Patricia Dekeseredy, Nursing - Graduate Program, pdekeser@yorku.ca

From: Alison M. Collins-Mrakas, Sr. Manager and Policy Advisor, Research Ethics
(on behalf of Denise Henriques, Chair, Human Participants Review Committee)

Date: **Wednesday, January 14, 2015**

Re: Ethics Approval

Nurse's Experiences and Perceptions of Compassion Fatigue While Caring
for Patients in a Rural Emergency Department

I am writing to inform you that the Human Participants Review Sub-Committee has reviewed and approved the above project.

Should you have any questions, please feel free to contact me at: 416-736-5914 or via email at: acollins@yorku.ca.

Yours sincerely,

Alison M. Collins-Mrakas, M.Sc., LL.M.
Sr. Manager and Policy Advisor,
Office of Research Ethics

Appendix B



Informed Consent Form

Study Title: A qualitative study to investigate nurse's experiences and perceptions of compassion fatigue while caring for patients in a rural emergency department

The researchers:

The lead researcher for this study is Pat Dekeseredy R.N, MScN student at York University, Faculty of Health, School of Nursing, Building HNES, 4700 Keele St., Toronto, Ontario, M3J 1P3, email pdekeser@yorku.ca . My thesis supervisor is Dr Christine Kurtz Landy

Purpose of the study:

The purpose of this study is to ask you about your work experiences in the emergency department and how these experiences made you feel. I am also interested in how these experiences affected your professional and personal life. The findings of this study will inform other nurses, policy makers, and administrators involved in the management of rural ER departments and may be published in professional journals, or presented in person at relevant conferences. This research will also be reported in my MScN thesis and presented in both oral and written form.

What you will be asked to do in the study:

- If you decide to participate in this study, I will ask you to take part in a face to face interview at the hospital during a convenient time.
- During this interview, I will ask you questions about your experience as a rural emergency nurse.
- You will be asked to complete a short demographic questionnaire.
- You can participate in this study even if you do not want to answer all the questions asked.
- Your participation in the interview should take about 30 minutes to an hour.

- You will receive a \$25.00 gift card to thank you for your time and participation.
- If you decide to stop participating in the interview you will still receive the \$25.00 gift certificate for agreeing to participate in the study

Are there any risks to doing this study?

It is not likely that there will be any harms or discomforts from or associated with participating in the interview. Some of the questions are of a personal nature and could lead to emotional distress. You do not need to answer questions that you do not want to answer or that make you feel uncomfortable. In addition, a list of resources for employee assistant programs such as counseling will be made available to those nurses who request additional information on compassion fatigue as a result of this interview. You can end your participation in the interview at any time.

Benefits:

It is unlikely that participating in this study will provide any direct benefits to you. However, by better understanding rural emergency nurse experiences, we may be able to develop strategies to address compassion fatigue in rural emergency department nurses.

Voluntary participation:

Your participation in the study is completely voluntary and you may choose to stop participating at any time. If you decide not to volunteer for the study, your decision will not have any impact on your employment, or the relationship you may have with the researcher or York University either now, or in the future.

Withdrawal from the study

You can stop participating in the study at any time for any reason. Your decision to stop participating, or to refuse to answer particular questions will not have any impact on your employment, will not affect your relationship with the researcher, York University, or any other group associated with this project. In the event you withdraw from the study the information you have provided to us will be immediately destroyed.

Confidentiality

All information you share during the research will be held in confidence and unless you specifically indicate your consent, your name will not appear in any report or publication of the research. Participants will be assigned a code number for

reference. The interviews will be digitally recorded and transcribed. Your information will be safely stored in a locked cabinet and/or secure computer that only members of the research team can access. Data collected for this study will be kept for up to 5 years for the purpose of conducting secondary analysis. After 5 years this information will be destroyed.

Confidentiality will be provided to the fullest extent possible by law.

This study has been reviewed and approved by the Human Participants Review Committee at York University and conforms to the standards of the Canadian Tri-Council Research Ethics guidelines. If you have concerns or questions about your rights as a participant or about the way the study is conducted, you may contact:

Office of Research Ethics, York University

Kaneff Tower

Tel: 416.736.5914

Fax: 416.736.5512

Or email ore@yorku.ca

Do you have any questions or would like any additional details?

Do you agree to participate in this study knowing that you can withdraw at any point with no consequences to you?

Please sign below to indicate your consent. A copy of this form will also be given to you.

Signature of participant

Date

Participant's name (please print)

Study ID number

Signature of person obtaining
informed consent

Date

Name of Person obtaining
Informed consent (printed)

Appendix C

Demographic Questionnaire

Demographic information

Subject number _____

1. Female or Male Marital status _____
2. Age 18-24 25-29 30-34 35-39 40-44
 45-49 50-54 55-59 60-64 Over 65
3. Highest level of nursing education:
- Diploma graduate (College or hospital program)
- Degree graduate (University)
- Advanced degree (Masters or Doctoral degree)
4. How long have been working your present emergency department?
- Less than 5 years 5-9 years
 10-14 years 15-19 years
 20 years or more
5. How many years have you worked as an emergency nurse all together in your career?
- Less than 5 years 5-9 years
 10-14 years 15-19 years
 20 years or more
6. Do you live in the same community as this emergency department?
- Yes
 No
7. Do you work
- Full-time
 Part-time
 Casual

Appendix D

Interview Guide

Introductory script: Thank you for agreeing to participate in this research study. Before we begin, I just want to remind you that you do not have to answer all the questions. If any question makes you feel uncomfortable, we can stop or pause the interview at any time. You are also aware that I am recording this interview and any written notes I make are only to help me understand the content of this interview when I read the transcripts. This interview and my notes will also be kept in strict confidence as indicated on the informed consent form you signed. Do you have any questions?

Interview Guide

Can you tell me why you wanted to be a nurse?

What is it like working in a rural ER?

What do you think is unique about rural emergency nursing?

Can you tell me how it feels to care for someone you know from the community? How do you deal with issues of privacy both for yourself and the patients outside of the hospital?

Compassion fatigue can be defined as the ``Cost of caring``. That is, that care giving can take an emotional and physical toll on providers. This can have negative effects on a nurse's professional and personal life. Have you heard of this and what are your thoughts on the concept of compassion fatigue?

Working in the emergency department can be a very demanding job and we all feel challenged by our work at times. Can you tell me about a particularly challenging patient or situation?

Can you tell me about a situation where you felt that you were not able to provide the emotional support the patient or family needed at a distressing time and why?

Have you ever felt that you needed a break from working in the emergency department? How did you deal with this?

Can you tell me how a bad day at work affects your home life?

Can you tell me about the programs your hospital offers to address the mental well being of the emergency nurses?

Where do you see yourself working in ten years?

Is there anything else you would like to share with me about your experiences working in the ER that I have not asked about?

Appendix E

These are resources available to participants requesting additional information or resources on workplace mental health or compassion fatigue.

Canadian Mental Health Association [REDACTED]-[REDACTED]
1024 2nd Avenue East Owen Sound ON N4K 2H7
E admin@cmhagb.org
F (519) 371-6485
P (519) 371-3642

Ontario Nurses Association, [REDACTED]
210 Memorial Avenue, Unit 126A
Orillia, ON L3V 7V1
Phone: 705-327-0404
Fax: 705-327-0511
Toll-free fax: 1-866-927-0511

Registered Nurses' Association of Ontario
158 Pearl St.
Toronto, Ont.
M5H-1L3 (416) 599-1925 or toll free 1-800-268-7199, Fax number is (416) 599-1926