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# Compassion Fatigue Among Critical Care Nurses

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## Walden University

College of Health Sciences

This is to certify that the doctoral study by

Debra Callender

has been found to be complete and satisfactory in all respects, and that any and all revisions required by the review committee have been made.

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Dr. Barbara Niedz, Committee Chairperson, Nursing Faculty
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The Office of the Provost

Walden University 2019

## Abstract

## Compassion Fatigue Among Critical Care Nurses

by

## Debra Callender

MS, Walden University, 2012 BS, Chamberlain College of Nursing, 2009

Project Submitted in Partial Fulfillment
of the Requirements for the Degree of
Doctor of Nursing Practice

Walden University

November 2019

#### Abstract

Compassion fatigue (CF), also known as secondary traumatic stress (STS), impacts critical care nurses (CCN) through exposure to pain, suffering, and loss of those for whom they provide care and results in a reduction of compassion satisfaction (CS). High incidence of CF and turnover (TO) rates at the project site were identified among CCNs. The institution's CCN TO rate was at 81% in comparison to peers in other areas at 29%– 35%. The practice-focused question asked whether leadership education on CF might ameliorate CF at the project site. The purpose of the Doctor of Nursing Practice project was to reduce the incidence of CF and TO among CCN through leadership education. Watson's theory of human caring was used as a framework. Two hundred twenty-nine CCNs completed the Professional Quality of Life survey that measures CS, STS, and burnout (BO). Comparison of 28 nursing leaders' pretest scores to posttest scores indicated a statistically significant improvement (z = -4.625, p < .001) and knowledge acquisition. BO and CF taken together explained 86% (adjusted  $R^2 = .86$ ) of the variance in CS (F [2, 227] = 691.33, p < .001). Identifying the nursing units with the highest CF scores and providing CF education to the leadership provides a path to reduce turnover and provide needed support to CCNs, a positive social change.

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#### Dedication

The project is dedicated to my mother Ms. Viola Callender, Mom you have been an example of how to face life toughest journey and keep on striding. My husband Kervin Roberts, my husband, and friend you have been patience and supported me during tough times when sleep was not a part of my curriculum. My daughters: Keisha, Mersha, Trisha, and Afiya you all encouraged and have been the driving force throughout my life. I have been blessed with five beautiful and loving grandchildren of which I adore, and they have shown me love beyond words. To all of you I appreciate and thank you for being there when I needed you the most. Most of all, I thank God for giving me the courage, wisdom, grace and walked me to the end of this journey so I can enjoy the fruit of my labor.

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Section 1: Compassion Fatigue Among Critical Care Nurses

#### Introduction

Compassion fatigue (CF) among critical care nurses is a secondary reaction, a result of cumulative exposure to traumatic events and increased emotional stress (Lombardo, & Eyre, 2011). Nurses provide care and may be unaware of their physical and emotional stress level, which impacts their professional and personal health and wellbeing. Awareness of the risks and strategies to avert the onset of CF is necessary to reduce the impact on staff and to optimize the care of staff and the patients served (Vargas et al., 2015).

The purpose of the project was to establish the positive impact of early intervention by the nursing leadership at the site on reducing the incidence of CF among staff, ultimately increasing staff retention and professional quality of life through education and leadership involvement. An increased awareness of CF has emerged over the past decades and needs to be addressed due to the growing global shortage of nursing professionals (Nolte, Downing, Temane, & Hastings-Tolsma, 2017).

#### **Problem Statement**

A high incidence of CF was reported among critical care nurses, amounting to over 50% in comparison to their peers (Mangoulia, Fildissis, Koukia, Alevizopoulos, & Katostaras, 2011). Consequently, intervention is needed to reduce the impact before crisis occurs (Mangoulia et al., 2011). At the practicum site, there was a high turnover of nurses in the critical care areas that needs to be addressed. Recruitment and retention strategies were needed to improve and support staff needs to increase satisfaction in the workplace.

Additionally, recruitment and retention costs have been increasing at the facility due to increased absenteeism and high turnover rate. There was a decline in the staff satisfaction rate as expressed in the annual survey, identifying increased stress levels. Finally, leadership education to recognize, support staff and address CF was sorely needed at the project site.

CF impacts nurses' level of engagement and causes alienation of their emotions from practice which creates a risk for ethical nursing practice (Austin, Goble, Leier, & Byrne, 2009). Healthcare institutions are experiencing recruitment challenges as evidenced by absenteeism, tardiness, and retention of staff nurses in the critical care areas, which is a secondary impact of CF (Boyle, 2011). The Doctor of Nursing Practice (DNP) project is significant to nursing practice given the shortage of nurses globally; intervention is of extreme importance (Nolte, et al., 2017). The focus of the DNP project was directed towards providing leadership education on the impact of CF and promoting intervention to enhance staff satisfaction through leadership rounding on the units.

## **Purpose**

Gaps in nursing administrators' practice led critical care staff members to perceive that their contribution was not valued or recognized by the leadership team. Nurses who were experiencing CF needed to be identified and offered support by the nursing leadership in the organization. Nurses were unaware they were experiencing CF, but they were dissatisfied with their quality of work life. This lack of self-awareness represented an additional gap in individual critical care nurses' practice. In addition, education on self-care coping skills was needed and could be provided to the nursing

staff. Without this identification and targeted interventions, nurses will continue to suffer. Nurses' who experienced a lack of satisfaction with the workplace sought relief with unplanned absences and ultimately left the organization. Sometimes, nurses experiencing CF leave the profession entirely (Nolte et al., 2017). The DNP project was focused on identifying CF among critical care nurses and providing interventions to help resolve it. The practice-focused question that guided the DNP project was: Can leadership education on CF, support education on coping, and screening for critical care nurses assist in identifying CF? Healthcare providers, specifically those in critical care areas, are at an increased risk of experiencing CF due to their ongoing experiences with patients and family who are going through traumatic physical and emotional pain and who are experiencing significant suffering and loss (Lombardo, & Eyre, 2011).

CF influences the quality of care patients receive and may alter the critical care nurses' quality of life (Van Mol, Kompanje, Benoit, Bakker, & Nijkamp, 2015).

Institutions encounter financial burdens associated with increased staff turnover, with CF named as one of the factors involved in the turnover (Cocker & Joss, 2016). Compassion is an important component of nursing care and is progressively under public scrutiny in relation to the delivery of quality of healthcare (Blomberg, Griffiths, Wengstrom, May, & Bridges, J., 2016). The DNP project can successfully reduce the gap in practice experienced by the critical care nurses in their ability to identify CF in themselves and use coping skills to reduce the damage associated with CF. The gap in practice present in nursing leaders will be closed by leaders providing nurses with support, which is named

as the key factor in contributing coping strategies and avoiding occurrences of CF (Nolte et al., 2017).

## **Nature of the Project**

The nature of the DNP quality improvement project was to screen for the incidence of CF as well as provide educational intervention to the organizations' nursing leadership and critical care nursing staff on the recognition and management of CF. The Professional Quality of Life (ProQOL) tool is an instrument with established reliability and validity that is used to measure the incidence of CF and compassion satisfaction (CS). Professional quality of life is related to a person's feelings towards their work as care providers, both positive and negative. In addition to understanding the associated experience, the tool can assist an individual nurse to obtain equilibrium in their professional and personal life (Stamm, 2010). The approach was critical care nurses completing a ProQOL survey on initiation of the project to obtain a baseline of the incidence of CF present. Educational opportunities for nursing leaders that emphasize their role in providing support for the staff nurses as well as providing education to the nurses themselves on self-care and coping skills are strategies that were implemented. I analyzed the results of the screening tool in the quality improvement project and presented intervention recommendations to the nursing leadership team.

The project implementation was focused on the leadership education for support and early intervention on the critical care units. Leadership rounding on critical care units, mentorship, educational support for new and incumbent staff, and acknowledgement of staff contributions all serve to help staff develop a sense of worth

and improve their perception of and engagement in their work, which reduces CF (Dempsey & Reilly, 2016). Leadership support and presence on units also improve staff satisfaction and aid in reducing the incidence of CF (Dempsey & Reilly, 2016). The strategies were identified to assist with increasing retention rates through staff engagement and satisfaction. Managers who create environments that foster satisfaction reduce the associated cost of burnout (BO) and staff turnover (Leach & Yeager 2013).

### **Significance**

The DNP project benefited stakeholders at the micro, meso, and macro levels. The direct caregivers (micro team) experienced a sense of worth and appreciation for their contribution. The frontline managers and charge nurses (meso team) experienced support for themselves and their team on the unit. The hospital executive team (macro team) interventions and actions directly impacted the staff in a positive manner, which will ultimately improve the retention rates, as well as staff engagement and satisfaction. Leadership behavior is a predictor of a staff's job satisfaction and organization commitment (Spencer-Laschinger & Fida, 2014). Patients are the major stakeholder as their satisfaction scores will also improve through patients' feedback and Press Ganey survey responses. Together, all stakeholders will influence and determine the project outcome (Dempsey & Reilly, 2016).

I intended for the project to increase retention and job satisfaction, which would ultimately improve quality of patient care. Healthcare providers' turnover intention impacts patients and the healthcare organization (Asegid, Belchew, & Yimam, 2014).

The DNP project will be used as a model for nursing practice as a hospital-wide initiative

to assist with recruitment, retention, staff satisfaction. Nurses are an integral part of healthcare, and CF affects the nursing shortage globally (Nolte et al., 2017).

Critical care nurses' practice environment includes patients experiencing traumatic, life-threatening conditions, and providing care can be professionally and emotionally challenging, which increases the risk for CF (Van Mol et al., 2015). CF must be recognized, and early intervention is crucial to averting a debilitating impact (Crocker & Joss, 2016). The DNP project can be used in all areas of nursing practice and other disciplines, including the military and families who provide care for loved ones (Day & Anderson, 2011). CF impacts critical care nurses' physical and emotional health, resulting in high levels of compassion stress that may affect their well-being (Day & Anderson, 2011).

Expressions of CF can be cognitive, emotional, physical, spiritual, or interpersonal. It is important to recognize signs of CF and implement an action plan to support nurses and reduce the physical and psychological impact of CF (McLamb, 2015). Nurses experiencing CF may exhibit physical, emotional, and/or work-related symptoms such as decreased interest, hopelessness, emotional exhaustion, job dissatisfaction, and poor behavior (Lombardo & Eyre, 2011). Leadership should work with nurses to address CF by developing nurse support groups, especially for new nurses, to reduce and prevent incidences of CF, thereby improving job satisfaction and increasing retention (Lombardo & Eyre, 2011).

## **Summary**

The DNP project was essential for critical care nurses experiencing CF. CF affects the institution's financial stability and affects critical care nurses' physical and psychological health as well as compromising their professional quality of life. Evidence identified that leadership presence and support were needed to empower nurses' sense of worth and show appreciation for their contributions. The DNP project development was beneficial to the facility's stakeholders, staff, leadership, and patients. It could improve the quality of patient of care and create a positive impact on nursing practice at the institutional level.

## Section 2: Background and Context

The practice problem addressed in the DNP project was CF among critical care nurses. CF is a secondary reaction to progressive cumulative exposure to traumatic events and increased emotional stress (Lombardo, & Eyre, 2011). Nurses working in critical care are exposed to traumatic events and emotional stress almost daily. The purpose of the DNP project was to determine if screening for CF and early intervention for critical care nurses would result in a positive outcome. Boyle (2011) identified strategic interventions addressing CF that can increase staffing retention rates and improve nurses' professional quality of life through education, leadership initiatives, and contributions. Increasing awareness of CF emerged over the past few decades, and it is necessary to address CF due to the increasing global shortage of nursing professionals (Nolte et al., 2017). Thus, the practice-focused question that guided the DNP project was:

PFQ: Can leadership education on CF, support education on coping, and screening for critical care nurses assist in identifying CF?

#### Concepts, Models, and Theories

## **Compassion Fatigue and Compassion Satisfaction**

CF is made up of two distinctly different but related concepts of BO and secondary traumatic stress (Al-Majid, Carlson, Kiyohara, Faith, & Rakovski, 2018). CF is defined as the negative component of caring that is experienced by caregivers, which results from caring for others experiencing traumatic events, pain, and suffering; CF may develop over a period time (Sacco, Ciurzynski, Harvey, & Ingersoll, 2015). BO is identified as related to occupational factors such as working conditions, but it is referred

to as an initial component of CF that is exhibited by exhaustion, frustration, or possible depression (Val Mol et al., 2015). CF usually evolves beyond the stage of BO and exhibits signs of physical or emotional agony with the core factor of an inability to engage in providing care or a caring relationship with those in need (Val Mol et al., 2015). Secondary traumatic stress (STS) is a term that has been used interchangeably with CF (Van Mol et al., 2015), but is also described by Stamm (2010) as the second component of CF along with BO. Persons suffering from STS develop a deep caring relationship for persons experiencing traumatic events or suffering that goes beyond the caregiver's emotional threshold, causing an inability for the caregiver to provide care (Van Mol et al., 2015). CS is identified in the caregiver as a positive experience resulting in personal and emotional gratification of helping others going through traumatic pain or suffering (Sacco et al., 2015). Achieving an equilibrium between CF and CS is important in work-life balance and is defined as professional quality of life, which is measured by the ProQOL (Stamm, 2010) and evidenced as scores on both CF and CS (Sacco et al., 2015). Professional quality of life model defines a person's combined results of BO and STS levels in CF (Sacco et al., 2015). Professional quality of life is the balance of the positive and negative aspects of caring; which develop from the emotions associated with helping others (Sacco et al., 2015).

Van Mol et al., 2015 conducted a systematic scientific literature review of qualitative research articles published between 1992 and 2014. The focus of the review was on the emotional distress experienced by intensive care unit (ICU) healthcare professionals. The search identified 40 of 1,623 articles that met the inclusion criteria and

related to the occurrence of BO and CF and the current accessible preventive strategies (Van Mol et al., 2015). The scientific review extracted original qualitative data written in English from 1992 through June, 2014, from nurses and physicians in critical care practice (Van Mol et al., 2015).

CF affects healthcare providers in various areas of practice including palliative care. Vargas et al. (2015) conducted a study of palliative care healthcare providers evaluating their emotional strength to endure the work and associated stressors. Ten palliative healthcare professionals from Spain were interviewed based on their work lives; the study was exploring the emotional impact on providers who endure daily interaction with suffering and their approach to self-care (Vargas et al., 2015). The participants who were interviewed in the qualitative study had responses that were similar; specific situations evoked strong emotional effects that included negative emotions and feelings of frustration, anger, fear, sorrow, pain, and helplessness (Vargas et al., 2015). The design of the study was grounded theory and used a semistructured approach through interviews (Vargas et al., 2015). Awareness of the associated risk and cost of caring and the use of self-care strategies can protect professionals and help them perform to their optimal level of practice (Vargas et al., 2015).

CF is experienced by nurses across the profession and studies to address CF are ongoing. Sacco et al. (2015) conducted a cross-sectional study surveying nurses using the ProQOL and a questionnaire to measure levels of CF and CS. The purpose of the study was to establish the prevalence of CS and CF in critical care nurses, identify possible factors that increase the risk of CF, and identify interventions for mitigating the risk of

CF (Sacco et al., 2015). These researchers found that CS and CF scores differ in reference to gender, age, educational preparation, patient population and acuity, and management turnover (Sacco et al., 2015). Findings also identified personnel based on years of experience scores differ in BO, CF, and CS (Sacco et al., 2015). Higher scores of BO and lower scores CS were found in critical care nurses with 6–10 years of experience than for their colleagues with less years in practice (Sacco et al., 2015). However, critical care nurses with 11–20 years in practice had the highest rate of CF (Sacco et al., 2015). If nurse administrators and critical care nurses alike are aware of the elements of CF and CS, they can identify strategies to influence the work environment, improve nurses' work-life balance, and ultimately enhance their professional quality of life (Sacco et al., 2015).

## **Compassion Fatigue in Critical Care Nursing**

CF has a negative impact on critical care nurses causing physical and emotional burdens resulting in nurses leaving their job and possibly their profession prematurely (Van Mol et al., 2015). The impact of CF extends beyond the patient-to-nurse relationship, which includes family and significant others, when providing care, specifically during life-threatening events. The possible causes of CF are related to the continuous exposure to critical events that may exceed a person's emotional and physical threshold. Lombardo and Eyre (2011) suggest there are many causes of CF, which affect nurses in several areas of nursing practice. Critical care nurses are repeatedly exposed to human suffering while providing care, which increases their risk for CF. The symptoms exhibited may be similar to post-traumatic stress disorder (Sacco et al., 2015). CF has

been associated with "helper syndrome," which is the direct result of recurring disappointing events that progress to moral distress (Van Mol et al., 2015). Nurses are focused on providing patient care and may be unaware of the level of stress they endure or the effect it has on their well-being. However, over the past decades an awareness of CF has emerged (Nolte, et, al, 2017). Experience of CF in nursing creates reduced satisfaction in the work environment resulting in absences, tardiness, and nurses eventually leaving the organization and possibly the nursing profession (Nolte et al., 2017).

## **Strategies that Reduce Compassion Fatigue**

A total of 13 strategic interventions were named in reducing the prevalence of CF; however, it was determined that the application of resiliency and self-worth were most likely to be successful (Ames, Salmond, Holly, & Kamienski, 2017). Ames et al. (2017) conducted a systematic review of the literature to identify effective strategies to reduce CF and improve CS. The investigation included an in-depth literature database search for published articles with concentration on quantitative studies. Ames et al. reviewed unpublished data from conference proceedings from the past 5 years, in addition to contacting key researchers to review dissertations, abstracts, and theses. The study identified leadership interventions for nurses, such as resiliency programs, preparedness programs, mentor-mentee relationships, mindfulness-based stress reduction, and reward and recognition programs, which all appeared to be positive initiatives (Ames et al., 2017). Leadership teams needed to be aware of CF, have knowledge of the warning signs of CF, and support staff as signs and symptoms of CF evolve. Additionally, pre- and

postmanagement intervention results were evaluated and literature review of previous studies involving various study approaches were collected to determine the effectiveness of intervention on CF and CS (Ames et al., 2017).

## Self-Awareness and Coping Strategies in Compassion Fatigue

Lombardo and Eyre (2011), a psychiatric-mental health clinician and a clinical nurse specialist affiliated with a large teaching hospital, conducted research on CF among nurses and how it is identified. Included in the study were new registered nurses in a residency program including assessment of issues encountered by new nurses (Lombardo, & Eyre, 2011). The approach was a qualitative study, and data were collected by interviewing two registered nurses to gain their insights and reaction to CF (Lombardo, & Eyre, 2011). The purpose of their study was to review Watson's theoretical view of CF and describe symptoms and intervention for addressing CF (Lombardo & Eyre, 2011). The results focused on guiding nurses in the process of self-assessment to help them gain insight on stressors that contribute to CF and to help them develop personal recovery plans (Lombardo, & Eyre, 2011).

CF may be recognized when it is too late; nurses may be unaware they are experiencing CF but may experience physical symptoms or express dissatisfaction with their quality of work life. Professional quality of life is related to a person's perception of their work as healthcare providers; understanding the association between ProQOL and experience is important. The ProQOL instrument is a tool that can assist nurses to obtain personal insight and thereby achieve balance in their personal and professional life (Stamm, 2010). Also, understanding and utilizing the ProQOL tool to identify those with

severe CF and providing education to both leadership and critical care staff can positively impact the work environment and ultimately have a positive effect on patient care outcomes (Sacco et al., 2015).

Nolte et al. (2017) conducted a qualitative study to better understand CF and determine the implications for nursing practice. Contributing factors related to increasing the risk of CF were identified as related to the work environment such as short-staffing, workload, lack of experience in the work area, limited opportunity for professional advancement, and lack of support from leadership (Nolte et al., 2017). An analysis of measures to avert or reduce incidents of CF were identified as peer support, team debriefing, self-care, work-life balance, and leadership role-modeling (Nolte et al., 2017). Additionally, a review of effective coping mechanisms to address CF were identified as exercise, spiritual intervention, work-life balance, counselling, and peer to peer support (Nolte et al., 2017).

## The Role of Leadership in Identifying and Managing Compassion Fatigue

Leaders must be knowledgeable about the signs of CF which may be ineffective coping; the warning signs were identified as a combination of cognitive, emotional, physical, spiritual, or interpersonal responses or actions. Healthcare leadership teams need to be aware that their presence on the nursing units is perceived as support by nursing staff members which improves staff satisfaction and contributes to reducing incidence of CF (Dempsey & Reilly, 2016). Dempsey and Reilly, (2016) were interested in the level of nurse engagement and factors that may possibly impact job satisfaction. These researchers conducted a quantitative study with focus on better understanding CS.

The study involved direct and indirect clinicians; over 1,000 were asked to participate by responding to their perception of compassionate, connected care for the caregiver (Dempsey & Reilly, 2016). A total of 185 clinicians responded via telecommunication, electronic mail, Twitter and LinkedIn which assisted with establishing nurse engagement variables that contributes to success (Dempsey & Reilly, 2016).

Dempsey and Reilly (2016) identified an inverse relationship between CF and quality care; as incidents of CF increase, nurse engagement, which is critical to quality care and patient outcome declines. CF incident is characterized by a strong, visible, emotional response in relationship to an event. For example, a nurse who has just experienced a patient death, runs into the breakroom crying hysterically. Dempsey and Reilly (2016) discussed the need for immediate and appropriate leadership intervention is needed when a CF events occurs to avert additional incidents in the work environment. Dempsey and Reilly (2016) explain the need for leadership teams to value, support and address the need of everyone who provides care to attain a positive work environment by engaging the caregivers (Dempsey & Reilly, 2016). Nurse engagement appears to be instrumental in organizations in reducing the incidents of CF and turnover rates (Dempsey & Reilly, 2016). Dempsey and Reilly (2016) discussed the quality of worklife, identified themes that can guide strategic interventions to improve nurse engagement.

Recognizing CF and implementing early intervention is crucial to averting negative experience which may impact the staff and institutions (Crocker & Joss, 2016). Leadership must be proactive, as their involvement in addressing the incidence of CF

may reduce the impact of it, may help to engage staff, improve job-satisfaction whereby increasing staff retention (Dempsey & Reilly, 2016). Mandatory leadership rounding on critical care units, can help to stem CF by supporting incumbent and novice nurses and acknowledging contributions which create a sense of team spirit and help to develop a sense of value. These conscious activities on the part of the nursing leadership team can improve staff nurse engagement resulting in reduced uncontrolled emotional outbursts, mood swings, anxiety, oversensitivity, physical symptoms like headaches, high blood pressure, and reduced incidents of CF (Lombardo & Eyre, 2011). Leaders can use the ProQOL tool to assess staff members' levels of CF and the scores to strategize interventions (Sacco et al., 2015).

## **Measuring Compassion Fatigue**

An appropriate tool to measure CF is the ProQOL which was developed was in the 1980s and originally named compassion fatigue self-test (CFST). It was renamed in the 1990s by Figley and Stamm, as the Professional Quality of Life Scale (Stamm, 2010). The ProQOL tool comprises of three subscales; CS, BO and CF which are used to measure the positive and negative aspects of caring (Stamm, 2010). The ProQOL instrument is multifaceted because it measures the work environment, the individual's personal traits and the exposure to primary and secondary trauma in the work settings (Stamm, 2010). Professional quality of life reflects achieving a healthy balance of the positive and negative characteristics of caring relationships. There is good construct validity on the ProQOL (Stamm, 2010). The ProQOL is well established and has been used in over 200 peer reviewed journals as well as over 100,000 internet articles. In

addition, there have been at least 100 research studies published on CF or CS of which over half used ProQOL as the measuring tool (Stamm, 2010).

## Watson's Theory of Caring

CF among critical care nurses reflects the concept of caring beyond the physical actions, the intellectual knowledge and experience; it extends to the emotional connection between caregiver and patient (Sinclair et al., 2016). The concept of caring is holistic grounded in the science of caring identified in Jean Watson's theory of human caring (Adams, 2016). Adams, 2016 researched the mystery behind nurses' caring for others and discovered the caring philosophy as an integral part of nursing and remains the art of nursing science. From inception, nursing care was and is central to the philosophy of the profession which emanates through the eyes of nursing theorists, Florence Nightingale, Martha Rogers, Madeline Lininger and Jean Watson (Adams, 2016). Compassion goes beyond the immediate interaction, as caring is a gentle equilibrium between scientific knowledge of which nurses embrace and their humanistic behaviors even amid crisis or critical events (Adams, 2016). Nurses experience CF through empathy and emotional connection when providing holistic care to their patients.

CF can be expressed as an expression of Watson's theory of human caring; a transpersonal caring relationship (Wagner, 2010). One of Jean Watson's original definitions of transpersonal experience as discussed by Clark 2016, was "an intersubjective human-human relationship in which the person of the nurse affects and is affected by the person of the other" (pg. 2).

Jean Watson's Theory of Human Caring emanates from the caring moment and is partially based on the concepts of transpersonal psychology (Clark, 2016). Watson's theory of human caring used as a framework, can convey the understanding of the nurse-patient caring relationship (Mason, Leslie, Lyons, Walke, & Griffin, 2014). Watson's theory of human caring is the appropriate for the DNP project as the definition of transpersonal experience reflects the possible cause of CF among critical care nurses and is related to caring for patients with life-threatening conditions. In addressing CF, Watson's theory of human caring provides the theoretical framework. Thus, the framework is not limited to, but inclusive of carative factors, transpersonal, empathetic, sincere caring, non-judgmental relationships among patient and nurse while sharing intrapersonal knowledge and hope in a safe environment (Mason et al., 2014).

Mason et al., (2014), conducted a pilot study involving trauma nurses working in a surgical intensive care unit (SICU) using a 55-question survey to determine the effects of CF, CS, moral distress, and demographics on work engagement. The participants in the study included (a) registered nurses, (b) who provided 50% or greater on-duty direct patient care in the SICU and who were (c) computer literate (Mason et al., 2014). The nurses included in the pilot study were incumbent nurses with 21 to 30 years in practice and provided direct care 62% of the time in SICU. Of the total sample, 89% held a Bachelors' degree (Mason et al., 2014). A total of 26 of the eligible 34 nurses participated in the study. The outcome of the research revealed that CF, CS, moral distress, and work engagement are statistically significantly correlated; when CF is high CS is low; similarly, when moral distress and CF are high, work engagement is low (Mason et al.,

2014). Educational preparation had no impact on work engagement as 89% earned a Bachelor of Science, 8% held a Master of Science and 2% held an Associate degree in nursing (Mason et al., 2014). However, support was identified as factors in reducing moral distress, STS of CF and should include debriefing lead by multidisciplinary team including leaders, educators, social workers, and chaplains when there're difficult days or events (Mason et al., 2014)

#### **Relevance to Nursing Practice**

Nursing shortage is of great concern globally causing the need for actions focused on retaining nurses which validates the importance of intervention in order to reduce the loss of nurses from the profession (Nolte et al., 2017). The effect of CF encompasses the personnel's experience of stress and the outcome often is that healthcare institutions encounter increase staff absenteeism, reduce quality patient's care and increase staff turnover when their staff experience CF (Val Mol et al., 2015). When the administrative leadership team is not visible on the units and engaged with the direct care nursing staff, this creates of perception of being devalued, not recognized and denotes a lack of support from the leadership team. The DNP project was aimed on educating the administrative team on identifying CF among critical care nurses and providing interventions to help reduce events before they occur.

Nurses' emotional quality of life is impacted when exposed to recurring traumatic events that exceed their emotional threshold (Mooney, Fetter, Gross, Rinehart, Lynch et al., 2017). Mooney et al. (2017) performed an inquiry to evaluate levels of CF and CS in the ICU and oncology nursing units to build existing literature through a comprehensive

investigation and comparative analysis. The researchers theorized that ICU nurses would experience higher levels CF and less of CS than oncology nurses (Mooney et al., 2017). The ProQOL was used in the study to identify CF and CS by nursing specialty, gender, and experience (Mooney et al., 2017).

Mooney et al., 2017 hypothesized that there would be gender differences exhibited with females experiencing higher levels of BO and CF, however, equal levels of CS emerged in both genders. A total of 102 nurses participated with 86 meeting criteria; 16 were excluded due to incomplete data on the ProQOL survey (Mooney et al., 2017). Findings in the study suggested that ICU nurses' level of CS was lower, and BO was higher than oncology nurses. In female nurses CF and BO were higher than male nurses and female nurses are at a higher risk for a poor professional quality of life (Mooney et al., 2017). Mooney et al., (2017), findings suggested as the years in practice, the lower level of CF was discovered which may be related to repetitive exposure to pain and suffering experienced by others; a form of desensitization. Comparison between oncology and critical care nurses identified critical care nurses' level of CS was lower and BO was higher than oncology nurses (Mooney, et al., 2017). Mooney et al., (2017) findings also suggested the impact of CS, BO and CF differs based on gender; males experienced higher levels of CS, lower levels of BO and CF than female colleagues. CF had a negative association related to age, years in practice and years in present position (Mooney et al., 2017).

CF has been identified as one of the contributing factors related to increased turnover rates, (Mason et al., 2014). The DNP project expected outcome was directed

towards improving the work environment, job satisfaction and staff retention, whereby improving quality of patient care. Healthcare providers' turnover intentions impact organizations, nurses and patients' care (Asegid et al., 2014). The DNP project developed a process to be used as a hospital-wide initiative in nursing practice to improve staff retention and staff satisfaction. Nurses are essential to patient care and developing strategies to address CF is the focus of the DNP project (Nolte et al., 2017).

Asegid et al., (2014) researched factors influencing job satisfaction and nurses' intention to leave their jobs in the public health facilities in Southern Ethiopia. The purpose of the study was to assess the factors associated with job satisfaction and nurse turnover (Asegid et al., 2014). The study was conducted in the Sidama zone public health facilities. Asegid et al.'s (2014) approach was a cross-sectional study involving 242 nurses using qualitative and quantitative data. In the study, Asegid et al., (2014) included licensed nurses employed more than six months. The study identified predictors for increasing retention, and improving job satisfaction. Predictors that were related to the work environment included; (a) leadership engagement with staff, (b) staff autonomy in scheduling and in unit operations, (c) recognition, (d) advancement opportunities, (e) professional training and continuing nursing education, and (f) group cohesion (Asegid et al., 2014).

## **Local Background and Context**

The DNP project was undertaken at an acute care hospital setting. The hospital emergency department (ED), ICU and surgical services areas, operating room (OR) and post anesthesia care unit (PACU) are the focused areas for the DNP project. Nurses in

these areas are exposed to patients experiencing major life-threatening events. The patient census is usually high and acute cases are ongoing, typically with cardiovascular, orthopedic, oncological and neurological emergencies. The setting included four facilities with a total of 222 beds and serves an average of 7,600 to 9,000 patients monthly. There are two EDs, and recently a third ED was built, two ICUs, and two surgical services areas inclusive of 13-ORs, 2-PACUs and 1-Obstetrics suite isolated for cesarean sections (C-section). A total of 232 staff nurses, 20 charge nurses, three (3) mid-level leaders in the practice areas and five (5) executive leaders in the settings. Thus, the selected setting was appropriate for the project.

There was a high staff nurse turnover rate in the critical care areas at the project site. The high impact of the staff nurse turnover needed to be addressed as it affected the staffing ratio and patient care. Recruitment and retention strategies was needed to improve and support nursing staff specifically on the critical care units. Intervention to improve staff satisfaction and the work environment was important to the maintain quality patient care. In the literature, the incidence of CF is reported as high among critical nurses resulting in over 50% in comparison to their peers. Therefore, intervention was necessary to identify the prevalence of CF and the impact on provision of care before crisis occurs (Mangoulia, Fildissis, Koukia, Alevizopoulos, & Katostaras, 2011).

There are many studies directed on defining and seeking an approach to reduce the prevalence of CF among nurses. Mangoulia, et, al, 2011 conducted a quantitative study involving 335 ICUs in 22 hospitals in Athens, Greece to evaluate the impact of ProQOL. The initial aim of the study was to investigate the risk of CF, BO and the

possibility of CS among ICU nurses (Mangoulia, et, al 2011). Mangoulia, et, al also tested the relationship between nurses' traits and risk for CF; they concluded, understanding the CF related variables can help healthcare facilities identify nurses at risk and implement strategies to attain a positive outcome such as job satisfaction (Mangoulia et al., 2011).

#### **Definitions of Terms**

Burnout (BO): A physical and emotional exhaustion resulting from the altered ability to cope with the one's environment on a day to day basis (Cocker & Joss, 2016). BO is also referred to as emotional behavioral impairment as a result of occupational stress (Van Mol et al., 2015). BO is determined as not an immediate reaction but progressively develops overtime (Mason et al., 2014). BO tends to occur over a period of time as emotions of contribution not recognized or makes a difference, excessive workload, or when the working environment lacks support Stamm, 2010).

Compassion fatigue (CF): A secondary trauma related to exposure to traumatic events and not direct trauma (Cocker & Joss, 2016). CF is referred to as the negative aspect of caring and involves incidents of BO and secondary traumatic stress (STS) (Stamm, 2010). CF has been referred to as extreme tension, concern with emotional and physical distress experienced by the caregiver related to those being cared for resulting in STS (Cocker & Joss, 2016). CF may alter one's ability to participate in a professional caring relationship due to a state of exhaustion impacting the care provider's performance (Nolte et al., 2017). CF can be identified as a response that is progressive and cumulative

although it can also emerge from a single intense event. CF is related to exposure to stress. interaction with patients and nurse's own coping resources (Mason et al., 2014).

CF incidents are exhibited through various modes of action such as reflective in ones' physical, emotional, social and spiritual responses (Boyle, 2011). CF events is identified when a caregiver becomes overwhelmed and may express symptoms such as anger, anxiety, boredom, hopelessness, inability to cope, desensitization and may exhibit excessive compulsive behavior (Boyle, 2011).

Compassion satisfaction (CS): An accumulation of positive emotions developed from helping others experiencing traumatic events (Sacco et al., 2015). CS is also referred to as a positive interaction and sense of satisfaction the caregiver experiences when patients' needs are met (Ames et al., 2017). CS is defined as the opposite of CF; it is experienced as a sense of personal fulfillment or feeling of offering help to those in need during life-threating situations (Mason et al., 2014). Majid et al., (2018) discussed CS as the personal joy and satisfaction accomplished from caring for patients during their traumatic experience.

Compassion stress: When a caregiver is insistent and is unable to detach from the caregiver role or lacks feelings of satisfaction in caring for patients. Compassion stress can progress to CF if the caregiver has continued exposure to suffering in addition to traumatic memories and challenging demands in life, (Day & Anderson, 2011).

*Professional quality of life (ProQOL):* A condition related to a person's feelings towards their work, both positive and negative which is influenced by a healthy work environment (HWE) (Sacco et al., 2015). In addition to understanding ProQOL and the

associated experience which includes CS and CF (Sacco et al., 2015), the ProQOL tool can assist an individual nurse to obtain equilibrium in their professional and personal life (Stamm, 2010).

Secondary traumatic stress: The second component of CF and exhibits a sense of anguish which is directly related to emotional transference of pain or suffering the caregiver experience related to those they care for and can develop quickly (Sacco et al., 2015). The experience of caregiver develops when caring and empathizing with their patient(s) is definitive of STS; at times it relates to particular category of patients or events (Sacco et al., 2015).

## **Role of the Doctor of Nursing Practice Student**

As a part of the administrative team at the setting, I play an active role in patient advocacy, program development and policy proposals. With other doctoral students at the site, I have been instrumental in developing and evaluating care delivery methods to meet existing and future needs of patient populations with focus on evidence-based practice and scientific findings in nursing (American Association of Colleges of Nursing, 2006). Additionally, the expectation of my role was to assure safe patient care and accountability through delivery of quality care for populations in the environment they work (American Association of Colleges of Nursing, 2006). My role in the DNP project was to educate the leadership team and the critical care nursing staff on the impact of CF on the institution and to screen for the incidence of CF among the critical care nursing staff members and conduct secondary analyses on the ProQOL screening. CF can negatively impact the critical care nurse, causing them to leave the unit or nursing practice

permanently (Mason et al., 2014). CF also creates an increased financial burden on healthcare institutions related to recruitment and retention (Hopper, Craig, Janvrin, Wetsel, & Reimels, 2011). In my work experience at the DNP site, a Level-I Trauma Center, I observed nurses leaving the institution and the profession for reasons expressed was BO, high level of emotional stress and lack of leadership support, all of which are components of CF.

#### **Institution Involvement, Motivation, and Potential Biases**

The institution embraced the project and was receptive to supporting the project. The executive leadership team was interested in improving the staff morale and retention. The institution onboarded new leadership teams who showed interest and support the DNP project as overall staff retention is of importance to the facility. The site leadership has sanctioned widespread education for staff nurses, offered as an e-training on coping skills and to heighten awareness of the topic. The organization-wide training supported the DNP project and add to its success. Executive and department leaders were motivated at the practicum site and were interested in continuing future initiatives to reduce CF post implementation. There were no foreseen barriers or biases towards the DNP project or implementation or proposed changes.

## Summary

Section 2 provided the reader with an overview of the relevant concepts, models and theories that were germane to the DNP project; essentially a summary of the scholarly work and review of the literature. CF at high levels among critical care nursing staff members was suspected and needed to be addressed. It was of great importance to

healthcare institutions, to critical care nurses, the nursing profession and essential to the delivery of safe quality patient care (Dempsey & Reilly, 2016). By screening the critical care nurses for levels of CF, implementing a leadership education plan to support critical care nurses to improve staff-engagement and satisfaction, I potentially closed the gap in nursing administration's practice. Utilizing Jean Watson's Theory of Human Caring (Clark, 2016) as a model for the project, delivered clarity to the nursing-patient caring relationship (Mason, Leslie, Lyons, Walke, & Griffin, 2014). Understanding the level and impact of CF among the critical care nurses at the institution had an impact on positive social change.

It was relevant that institutions and leadership team pay attention to the impact of CF on the nursing profession and facilities given the nursing shortage globally (Nolte et al., 2017). Critical care nurses and ICU nurses experience higher levels of CF, BO and less CS than oncology nurses (Mooney et al., 2017). Executive and Administrative leadership must to be cognizant of CF and the financial burden associated related to staff turnover, quality care, and patients' satisfaction (Mason et al., 2014). CF has been named as one of the contributing factors related to retention challenges and increase staff turnover rates, (Mason et al., 2014). The DNP project emphasis was directed towards the facility's ED, ICU, OR and PACU due to the high incidences of critical care events and turnover rates. I developed an educational program for both nurse administrators and critical care nurses as well as the screening program. The DNP project process was used throughout critical care units to ultimately improve staff retention and satisfaction.

#### Section 3: Collection and Analysis of Evidence

#### Introduction

CF among critical care nurses is a result of cumulative exposure to increased emotional stress related to traumatic events (Cocker & Joss, 2016). Emotional stressors are present at high levels in critical care areas, which creates an increased risk of CF among these nurses (Van Mol et al., 2015). Most of the nurses providing care to critically ill patients are unaware of the impact on their personal health and well-being, and intervention is necessary to avoid crisis (Mangoulia et al., 2011). Additionally, supportive initiatives are necessary to increase staff satisfaction and reduce high turnover rates in the workplace. Leadership education on CF is an important initiative to support staff and encourage engagement of critical care nurses. Healthcare institutions encounter major challenges involving recruitment, retention, tardiness, and absenteeism, which are secondary effects of CF (Boyle, 2011).

Critical care nurses who practice in various settings including the ED, cardiac care unit, ICU, surgical services, trauma, hospice, and palliative care are nurses who provide care in critical and high-stress areas (Vargas et al., 2015). In high-stress critical areas of practice, nurses experience emotional pain, distress, anger, sorrow, frustration, and feelings of helplessness, which results in CF (Vargas et al., 2015). The focus of the DNP project was to implement an early strategic approach through leadership education on the signs and prevalence of CF aimed on achieving awareness and a positive outcome for the staff and the institution. Strategies to identify CF are important not only to critical care nurses but to the nursing profession in terms of the well-being of nurses (Nolte et al.,

2017). Knowledge and awareness of signs of CF are important as they should be identified and addressed as they emerge; which can be achieved with education on coping skills to facilitate management of the events as they arise (Caine & Ter-Bagdasarian, 2003).

The nursing leadership team plays an important role in managing incidences of CF through support and being engaged during their presence on units, which can increase job satisfaction and reduce turnover (Moss, Good, Gozal, Kleinpell, & Sessler, 2016). CS, the polar opposite of CF, provides caring that is beyond physical, intellectual knowledge, and experience which creates an emotional connection between the caregiver and patient (Sinclair et al., 2016). Watson's theory of human caring provided the theoretical framework for exploring the factors involved in CF; the theory involves curative, transpersonal, empathetic, sincere, nonjudgmental relationship between patient and nurse caregiver (Mason et al., 2014). Although, leadership plays an important role in managing CF, critical care nurses need to be aware of their role in managing and coping with the stressors they encounter while providing care. Self-evaluation can assist with addressing early phases of CF as a person's personal quality of life may contribute to CF (Stamm, 2010). The appropriate evaluation instrument to assess for risk of CF is the ProQOL tool, which can help nurses gain insight into their CF status and achieve balance between their personal and professional life (Stamm, 2010).

#### **Practice-Focused Ouestion**

Mangoulia et al. (2011) identified 57.9% of critical care nurses are at a high risk for CF. Therefore, intervention is necessary to identify high levels of CF before it evolves

into a crisis (Mangoulia et al., 2011). The DNP project site experiences high turnover rates in the critical care areas and intervention is needed. Recruitment and retention strategies are important to improve support of nurses and increase satisfaction and engagement in the workplace. Recruitment and retention costs increased at the practicum site in the past year due to high rates of turnover, tardiness, and absenteeism. The staff satisfaction rate declined as expressed in the annual survey, which identified increased levels of stress and the need for leadership presence and support. It is possible that CF was a contributing factor to high turnover and poor staff satisfaction. Leadership needed to be aware of the signs and impact of CF, address the events through support, and use strategic approaches to reduce the gap in practice that was related to CF at the project site.

Nurses' affected by CF, sometimes experience an alienation of their emotions from practice which may create a risk for ethical nursing practice by denying the patient the full care they need and deserve (Austin et al., 2009). Healthcare institutions are experiencing recruitment challenges and are experiencing staff absenteeism, tardiness, and attrition of staff nurses in critical care areas, which is the secondary impact of CF (Boyle, 2011). The DNP project was significant to nursing practice given the shortage of nurses globally. (Nolte et al., 2017). For this DNP project I focused on leadership education regarding the impact of CF on nursing staff, developing nursing staff coping skills, and effective interventions to enhance staff satisfaction and improve engagement. I focused on providing education to the leadership team and critical care nurses and

screening critical care nurses for CF. The DNP project practice-focused question that guided the project was:

PFQ: Can leadership education on CF, support education on coping, and screening for critical care nurses assist in identifying CF?

#### **Sources of Evidence**

#### **Published Outcomes and Research**

A literature review was important to the DNP project to validate and inform the evidence-based practice (EBP) project. I conducted an in-depth review of previous studies involving CF for this project including a qualitative and quantitative research. I conducted a literature search using computerized databases including Embase, Medline, OvidSP, CINAHL, Web-of-science, PsychINFO, PubMed publisher, Cochrane, and Google Scholar with a CF-focused search phrases "compassion fatigue in the critical care setting" and "compassion fatigue impacts the retention of critical care nurses."

The selected criteria for the literature research included articles within 2010 to 2017 from which 60 articles were selected and reviewed, including qualitative, quantitative and mixed-method research. Of the 60 articles, I excluded 10 due to small sample size and 15 due to lack of a clear data collection methodology. As a result, 35 articles met the criteria to be included in the evidence presented in the DNP project. All relevant articles were included in the reference list and described in Section 2 as they related to the concepts, models, and theories that were important to and supportive of the DNP project.

## **Evidence Generated for the Doctoral Project**

**Participants.** There were 29 members of the nursing leadership team, which included five executives, nine midlevel leadership team members, and 14 charge nurses; in addition, there are 231 critical care nurses who were targeted for the education presented by the organization and screening processes. The units involved in the project included ED, ICU and Surgical Services, OR, and PACU. Nursing leadership participants were requested to complete the screening before the education was provided.

**Procedures**. There were three procedures that were relevant to the project, and they are addressed in detail in this section. The first involved the use of the ProQOL instrument. The second was a description of the procedures that were used to collect data from the participants on their viewpoints regarding their professional quality of life. The third procedure involved nurse leadership training and education on CF, CS, and strategies and interventions to help prevent and reduce the incidence of CF while maximizing CS.

The ProQOL instrument. The ProQOL tool was used to measure CF, to reveal positive and negative feelings related to nurses' level of emotional stress (Adams, 2016). The ProQOL tool identified associated experiences that were significant in nurses' process in establishing an equilibrium for their professional and personal life. Addressing the incidence of CF in an organizational setting is relevant to nursing practice as it impacts retention of nurses and may help mitigate the global nursing shortage by aiding nurse retention (Nolte et al., 2017). It was important to assess the impact of CF, develop

an approach to address incidents as they arise, and present evidence to validate the gap in practice.

The ProQOL tool is a survey assessment used to evaluate the positive and negative effect of caring for others (Stamm, 2010). The ProQOL tool has well established reliability and validity (Stamm, 2010). Sacco et al. (2015) completed a cross-sectional study utilizing the response of 221 critical care nurses to identify the presence of and factors associated with CS and CF. The ProQOL measuring scale was used to identify levels of CF and CS to determine reliability for internal consistency using Cronbach's alpha on the CF subscale and on the CS subscale. The ProQOL studies revealed internal consistency reliability for CS of 0.91, BO of 0.45, and STS of 0.73 based on the Cronbach alpha values (Sacco et al., 2015). The aim of Sacco et al.'s (2015) study was to identify the prevalence of CF and CS among critical care nurses, which was validated using the ProQOL measuring tool.

The ProQOL tool comprises 30 items that ask the participant to identify their experience with both the negative and positive aspects of caring (Stamm, 2010). The responses are based on the past 30 days of experiences. The ProQOL's 30 questions fall into three subscales identified as STS, BO, and CS, with Likert-type responses. The ProQOL instrument measures professional quality of life, conceptualized as both the negative side as CF (through the BO and STS subscales) and the positive side through CS (Stamm, 2010). Professional quality of life reflects achieving a healthy balance of the positive and negative characteristics of caring relationships.

The ProQOL tool includes 30 questions and three subscales, each with 10 items. The ProQOL tool measures responses based on a Likert scale which range from 1-never, 2-rarely, 3-sometimes, 4-often and 5-very often (Stamm, 2010). The three subscales taken together assess professional quality of life. High scores on the BO and STS subscales indicate higher levels of CF. High scores on the CS subscale indicate more positive caring behaviors in the individual. Thus, high scores on the components of CF (i.e., STS and BO) are often negatively correlated with scores on CS. Each participant receives a score on each subscale: BO, STS, and CS. The highest possible sum score on each subscale is 50; however, about 25% of people score an average of 43 points out of a possible 50 in all three subscales (Stamm, 2010). The request for permission to use the ProQOL tool was standard if use is for nonprofit purposes and changes are not being made. However, for the purpose of the DNP project, the standard request was submitted electronically as notification of use; the response and permission for use can be found in Appendix A.

Screening for ProQOL at the Project Site. There was an educational session with the critical care staff on their respective units to discuss their level of satisfaction on the job when providing care as well as identification of self-awareness, and coping skills for CF. The ProQOL survey was distributed to the critical care staff to return within seven days. Data was collected using an alpha-numerical code to protect participants' identity. The alpha code identified the unit to determine the rate of CF on the specific unit. However, participants were anonymous, confidential and purely voluntary; several optional demographic questions were included. An analysis of the survey responses was

de-identified, held confidential and analyzed by me, as the DNP student, to determine the evidence of CF and CS on each unit and combined results of all units. All data was aggregated, and no individual scores will be disclosed unless an individual request a personal copy of their own analysis.

Separate, voluntary sessions was established to collect ProQOL data from nursing leadership and the critical care staff nurses. Nurse executives, directors and managers, all attend regularly scheduled meetings. Time on the agenda was requested; all participation was voluntary and consented (for the screening and for participation in the education) participants' information remained secured. The ProQOL instrument was distributed at scheduled 30-minute sessions and made available to all charge nurses and critical care staff nurses over a two-week period of time. It was doubtful that we would achieve a 100% response rate, but as the DNP project had been sanctioned by the Recruitment and Retention committee as an improvement opportunity, I expected at least a 75% response rate. After two weeks 75% return rate was not met making it necessary to extend the data collection period by two weeks to achieve the highest possible response rate.

Educational processes. There was a leadership education module developed to increase awareness of CF among the charge nurses, nurse executives, managers and directors. The leadership education was interactive and included 17-question pre-test on awareness of CF, a PowerPoint presentation on: (a) the need for presence of CF on the critical care units, (b) organizational resources for staff in the event of a CF event on the unit, (c) prevention strategies, (d) coping strategies that staff can use. An outline of the training can be found in Appendix B. At the time of leadership training, the staff ProQOL

survey results was confidentially disclosed. The leadership education also included the impact of CF related to staff turnover, recruitment and retention cost analysis, EBP recommendations, importance of leadership support and actions needed to increase staff engagement. Leadership completed the same 17-question post-test to evaluate if learning has occurred (see Appendix C). The evaluation method was a comparison analysis of pre and post-test scores to determine if there was an increase of knowledge on CF. Expected outcome of the education project was increased awareness of CF among critical care nurses and leaders, leadership support and engagement on the in-patient units with mandatory sessions for incumbent staff, leadership team and new hires during orientation.

**Protections.** The integrity of the institution is vital to the organization's corporate image as they are currently in the process of implementing nationwide practice changes to promote the vision, mission and values of the new corporation's chief executive officer (CEO) who oversees a total of 45 hospitals. The facility's institutional review board (IRB) reviewed the application to identify any risks which may compromise their mission, vision and values. There were no demographic identifiers, the units' numerical code was used to protect the subjects' identity. All pre and post-test data were deidentified for secondary analysis in the DNP project. All participants in the screening and the educational sessions signed a consent in order to participate. Request for permission to conduct survey was submitted to the institution's Office of Research Ethics and Compliance for IRB approval received; number 04-22-19-0241879.

Walden University's IRB ensures ethical principles in data collection, protects participants' privacy and well-being and that informed consents were in place and approval was received prior to the start of any DNP doctoral scholarly projects (Walden University, 2016). I agreed to support all of the requirements of two Walden blanket approval manuals (a) an existing quality improvement initiative and (b) the manual for educational DNP projects, including consent from the organization and consent from the individual nurses completing the survey. My adherence to the IRB processes affirms my validation, commitment and understanding of Walden's University's ethical standards (Walden University, 2016).

### **Analysis and Synthesis**

CF is a phenomenon affecting healthcare providers based qualitative, quantitative and mixed studies. The DNP project was focused on reviewing the impact of CF on critical care nurses through staff nurse education, and leadership education and intervention. To evaluate the impact of CF among critical care nurses the tool selected was ProQOL for the DNP project. The ProQOL was developed by Stamm and in use since 1995 and the most used tool to measure the negative and positive effect of caring (Stamm, 2010). ProQOL is referred to as the quality of one's experiences in relation to their role as a caregiver both positive and negative; the tool (scale) measures CF and the pre-cursors BO and STS and if CS is present (Crocker & Joss, 2016)

To analyze the results of the screening process. The ProQOL survey was distributed to the critical care units during weekly in-service to increase participation.

The expected overall participation was to be completed in one week but was extended to

an additional two weeks to maximize participation. The analysis of the data was completed within three-week post survey using the ProQOL evaluation scoring tool developed by Stamm, (2010) to determine the levels of CF, CS and BO. Descriptive statistics was used to identify nurses in need of additional support and was compared by unit, age, education level and other demographic characteristics. Summary of the data without disclosing the names of the individuals was provided to the nursing leadership team for brainstorming and problem solving around the results.

The pre and posttest used before and after the nursing leadership educational session consists of 17 questions (see Appendix C), measured on a scale between 0 and 100% correct answers. To analyze the results of the leadership education, the data were tested as to normality; because the leadership group is a small sample, I found the data to be possibly skewed and therefore used the non-parametric Wilcoxon Signed Rank test to determine whether there was a statistically significant difference in the mean score when the pre-test was compared to the posttest.

## **Summary**

CF has been described as a form of STS, a form of BO that is specific to those who care for patients experiencing life threatening or traumatic events (Sacco et al., 2015). CF is considered negative coping due to increased severity of pain, suffering and traumatic events to which a caregiver is exposed (Cocker & Joss, 2016). There have been many qualitative, quantitative and mixed method studies on CF and the prevalence among healthcare care providers requiring attention. Sacco et al. (2015) define BO and STS as components of CF; and a result of accumulative exposure to increased emotional

stress related to traumatic events (Cocker & Joss, 2016). The focus of the DNP project was directed to review the impact on critical care nurses and the need for leadership recognition through education and intervention. Section 3 provided an in-depth overview of the plan for providing education to both leadership and critical care staff nurses, as well as detailing a plan for conducting the screening and analyzing the data.

#### Section 4: Findings and Recommendations

#### Introduction

The purpose of the DNP practicum project was to increase leadership knowledge and awareness of CF at the practicum site. The practicum site critical care nurses' turnover rate was higher than other units throughout the facility. Leadership education strategies were needed to improve retention and reduce turnover intention of current critical care staff. Leadership presence was recognized as important to staff at the practicum site. Leadership education and awareness can close the gap in the practice deficiency through strategies to engage staff on critical care units and thereby improving retention and practice outcomes. Austin et al., (2009) discussed the impact of CF on nurses' levels of engagement. The DNP practicum project was significant to nursing practice at the practicum site given the high turnover rates and the shortage of critical care nurses globally (Nolte, et al., 2017). The DNP project was focused on leadership education on the impact of CF, including initiatives to improve staff satisfaction and engagement through leadership support and presence through leadership rounding on the units.

#### **Source of Evidence**

The organization's internal data from 2018 revealed an 81% turnover rate in critical care nurses as compared to 29% to 35% in other units. Mangoulia et al. (2011) discussed CF as high among critical care nurses in comparison to their peers who work in noncritical care areas. Staff engagement and satisfaction ratings on the DNP project site's

annual survey indicated some problem areas in the critical care units. Evaluation of staff and leaders using the ProQOL survey to identify the level of CS, BO, and STS present among critical care nurses was conducted prior to an educational program for nursing leaders. A 17-question pretest on awareness of CF was developed to assess leaders' knowledge deficiencies and to structure an education program focused on the units needing help on strategies to reduce CF and maximize CS. An educational program was presented on the early signs and symptoms of CS, BO, and STS/CF, the results by unit of the ProQOL survey, and strategies to reduce STS events and improve engagement and support initiatives. After the education program presentation, a posttest was used to determine the level of leaders' learning outcomes and assess the DNP project.

# **Findings and Implications**

To provide additional insight on the state of CF at the DNP project site prior to the educational sessions with the nursing leadership, 229 nurses participated in the ProQOI data collection survey process to determine the extent of the issue across critical care nurses at the site. The ProQOI tool has three sections, one on BO, one on STS, and one on CS. The STS section includes 10 questions measured on a Likert type scale, where 1 equals *never* and 5 equates to *very often*. None of these items required reverse scoring, resulting in a possible range between 10 and 50. Stamm (2019) stated that a score of 42 or greater indicates a high level of STS and, as a result, of CF. Table 1 provides an overview of the nursing units with the counts of high-level STS. Two units emerged with the highest count of nurses with CF, the ICU/CCU and the PCU. The ED nurses had the lowest count of nurses with CF.

Table 1

Counts of Low, Moderate, or High Secondary Traumatic Stress by Unit

	Ambulatory	ED	ICU/CCU	Charge and	PACU	PCU	Surgical
				managers			
Low and moderate	17	45	20	23	14	23	27
High	2	9	18	5	2	18	6
Totals	19	54	38	28	16	41	33

Because the data on CF as measured by STS were not normally distributed, I used a nonparametric Kruskal-Wallis test, which indicated that there were statistically significant differences between the groups (Kruskal-Wallis = 40.558,  $6 \, df$ , p = <.0001). I used individual Mann-Whitney U tests with the Bonferroni correction (p < .01) to localize the differences (Table 2). Notably, there were statistically significant differences between the lowest scoring units (the ED), the highest scoring units (ICU/CCU), and the remaining nursing units on the ProQOL results.

Table 2

Mann-Whitney U Test Significance Levels

	ICU/CCU	ED	
ASC	p<.003	p<.001	_
Charge and	p<.0001	p<.0001	
managers			
PACU	p<.005		
Surg	p<.001		
PCU		p<.0001	
ICU/CCU		p<.0001	

Not surprisingly, there was a statistically significant negative relationship between BO and STS to CS. That is, 86% of the variance in CS was explained by the combination of BO and CF/STS, taken together (F [2, 227] = 691.33, p < .001). These results were used to pinpoint the nursing units that most needed with CF intervention and to strategize with the nursing leadership appropriate strategies.

A total of 28 leaders participated in the education program initiative. A score of 80% and above identified basic knowledge of signs, symptoms of CF, and actions necessary to reduce the impact of CF. The pretest scores were quite low and the posttest scores showed clear improvement. Nursing leadership scores on the pre- and posttest can be found in Table 3. There was a 25.97 difference in the mean score when the pretest was compared to the posttest; that is, the nursing leaders' mean scores improved after the educational program.

Table 3

Nursing Leadership Pre- and Posttest Scores

	Pretest $(n = 28)$	Posttest $(n = 28)$	Difference
Mean score	56.89	82.86	
Standard deviation	13.7	8.008	
Minimum score	41	62	
Maximum score	84	94	

The data were tested for normality, and because this assumption was not met, I used a nonparametric Wilcoxon Signed Ranks test to find a statistically significant difference in the mean scores when the pretest scores were compared to the posttest scores (z = -4.625, p < .001).

In my original DNP project design, I had planned to compare scores on the basis of educational background and tenure. However, this comparison was precluded as the nurses perceived that demographic data would disclose their identity, an unanticipated outcome. Thus, these data were not collected, and additional comparisons were not possible. Sacco et al. (2015) explained that BO, CF, and CS scores differ relative to gender, age, educational preparation, and years of experience. Critical care nurses with 6 to 10 years of experience scored higher on BO and lower scores CS in comparison to their colleagues with less years in practice, and for those with 11 to 20 years in practice, CF rates were the highest (Sacco et al., 2015). Awareness of the components of CF and CS can guide strategies to influence the work environment, promote work-life balance, and enhance professional quality of life (Sacco et al., 2015). The project survey results revealed the critical care units with the highest level of CF were also the units with the highest turnover rates. The least tenured nurses in the DNP hospital setting work in the critical care areas that was the DNP setting, and the units that had the least experienced nurses were the ICU, the coronary care unit, and the progressive care unit. CF has also been more prevalent among the millennial generation (Salmond, Ames, Kamienski, Watkins & Holly 2017). The ICU/CCU and PCU nurses care for patients over a period of time and develop relationships with patients unlike nurses who work in the ED, which has a quick patient turnover. ED nurses at this site are more tenured, tend to have more advanced degrees, and may not have formed attachments to patients as have the nurses in the ICU/CCU and PCU areas.

A comparison analysis of the leadership education pre- and posttest results identified an increased knowledge on the signs and symptoms of CF. However, a detailed review of question #7, the manager's response to a CF event, was unexpected. The expected intervention during an active or pending CF event is to intervene with actions to support the staff or team. However, the leaders' responses differed to more of a disciplinary or dismissive action as opposed to calling the chaplain or providing additional support. The leaders needed additional education on strategic interventions to better understand the needs of staff experiencing high levels of CF, STS, and BO. Ames et al. (2017) identified leadership interventions for nurses experiencing CF that included resiliency programs, preparedness programs, mentor-mentee relationships, mindfulnessbased stress reduction, and reward and recognition programs as positive initiatives. Effective coping mechanisms identified to address CF included exercise, spiritual intervention, work-life balance, counselling, and peer to peer support (Nolte et al., 2017). Leaders need to be knowledgeable of signs of CF and be prepared with appropriate interventions to support staff. Dempsey and Reilly (2016) discussed the need for immediate and appropriate leadership intervention when a CF event occurs. It may be more appropriate to send a nurse home and to counseling during a CF event rather than mandating that they "tough it out" and complete the shift.

The outcome of the DNP project contributed to positive social change in the institution. Since the screening process and the training, the leadership team members are more knowledgeable about CF. An active leadership rounding process was instituted ensuring leaders' presence (including off shifts) on the CCUs. Anecdotally, nursing

leaders voiced a better understanding of the impact of CF and were more knowledgeable about needed interventions required to reduce or ameliorate CF events among critical care nurses, which is a significant positive social change. Support systems are now in place in the event a staff member experiences a CF event. Action plans for continuous readiness were identified, including a post-CF event debriefing and active follow-up with staff after a CF event. Nursing leaders are more visible on the units, express more verbal compassion to staff, and better identify their needs. Overall, work-life balance seems to resonating throughout the critical care nurses as evidenced by fewer incidents of absenteeism or unplanned time off in the past 2 months since the educational initiative took place. Communication among the critical care nurses and the facility leaders has improved, and purposeful rounding by leadership is part of the normal daily routine.

#### Recommendations

Implementing ongoing education on CF and strategies to resolve same can improve both nursing leadership and staff engagement. Education focused on identifying the signs, symptoms and early intervention can reduce or avoid CF among the focused population. Teaching work-life balance can improve the professional quality of life of the nursing staff and ultimately improve the quality of care delivered. Sacco et al, (2015) explained that the ProQOL measures three concepts, and that a balance of CS, CF and BO is necessary to assure a positive worklife. Thus, insight on ProQOL scores for the critical care nurses and knowledge of the elements associated with ProQOL by nursing leadership can have a positive impact on worklife environment.

The recommendations are based on the survey outcome specifically on leadership results. The first recommendation is implementation of an annual survey using the CF Education and ProQOL assessment to identify units at risk. The second recommendation is to develop a response team with staff support who can be readily available in the event there is a pending or an active CF event. The response team will include representatives from Chaplain Services, The Lavender Committee (a bereavement support team), and the on-call administrative representatives. The third recommendation has already been implemented: a mandated debriefing of each CF event to evaluate strategies used to support staff, the outcome, and a post event follow-up to support the affected staff or team and referral to employee assistance program, if needed. The importance of identifying CF and strategies to support staff to reduce the impact on CF are components of the annual CF education program. Supportive initiatives such as Chaplain Services, the Lavender Committee and response from the on-call administrative personnel (supports staff in real time) will be made available to staff members who are experiencing a CF event and are part of the recommendations. Leadership rounding on units to support staff engagement is also important to support and engage staff. As a result of the DNP project, the organization has been actively implementing activities, such as seminars to improve education, and educational opportunities on CF awareness and prevention during the onboarding process. I have been partnering with the facility's marketing department to develop a booklet which will include available resources for staff to use when experiencing stressful, traumatic events or having a difficult work-life balance. The booklet will address resources available such as one-on-one counseling with employee

assistance program (EAP) personnel, a Chaplain, a Lavender committee member, an engagement strategist or and employee relationship specialist and relaxation and mediation session(s),

### **Strengths and Limitations**

One strength of the practicum project was the availability of current and historical data which validated the need for the project. Access to critical care units' staff and interaction with leadership to observe and collect data allowed the opportunity to implement education and strategic initiatives to improve practice and retention. A second strength was the ProQOL survey sample size of 229 and access to critical care staff, the level of transparency, and minimal resistance to the project. Another strength of the project was the smooth process of implementing the education program, having a forum available and times to educate teams without time constraints.

There were some limitations encountered with the clinical education department and critical care staff. Limitations encountered were concerns of being identified and fear of retaliation. Some participants opted out of the survey process entirely, and all nurses and nursing leader participants declined to disclose their degree status, length of time in practice or tenure at the institution. The concerns created a limitation in analyzing the differences in CF using these demographic characteristics. The responding nurses indicated they would like to know the overall results of the ProQOL assessment on a unit basis.

### **Summary**

The DNP project focused on increasing leadership knowledge and awareness of CF at the project site. The rate of critical care nurses' turnover was the highest in the facility. Education to develop awareness about CF, and strategies to reduce CF, like increased leadership visibility on the nursing units, will ultimately reduce turnover and improve retention. The 2018 internal data revealed an 81% turnover rate in critical care nurses as compared to 29% to 35% in other units. CF was highest in two areas: ICU/CCU and the (PCU) among critical care nurses in comparison to their peers. Assessment of the staff using ProQOL survey identified moderate to high levels of BO, CF / STS among critical care nurses. A total of 28 leaders participated in a 17-question pretest on awareness of CF was used to assess the leadership team revealed knowledge deficiency. An educational program on CS, BO, STS/CF including early signs and symptoms of CF was presented. After the education program posttest scores were statistically significantly higher in comparison to the pretest scores which supported knowledge acquisition. Future work on CF will include: (a) annual survey and education program, (b) developing a formal response team available to support the staff or team if a pending or active CF event occurs, (c) mandatory debriefing and follow-up on staff, or team post CF events, and (d) referral to EAP if needed were all recommended. Additionally, counseling, a Chaplain, the Lavender committee, employee's representative from HR, relaxation and mediation session(s) for staff are now available to staff as a support system. The strengths of the project included the ease of access to critical care units' staff interaction, leadership interaction and opportunity to implement education and strategic initiatives,

the sample size (n=229), and approval to educate nursing leadership without time constraints. Limitations encountered were related to individual fear of being identified, and staff declined disclosing demographic characteristics; comparison analysis to research findings could not be evaluated.

#### Section 5: Dissemination Plan

To disseminate the results of the project at the project site, I will hold live educational lectures using PowerPoint presentations and posters. Face to face interactive oral and PowerPoint presentations promote an approach that is applicable to the audience and is consistent with adult learning principles (Brownson, Eyler, Harris, Moore, & Tabak, 2018). Dissemination across the corporate organization at other sites will follow through annual continuing education for leaders and staff including the onboarding of new hires. Ultimately the goal is to deliver to a broader audience through a journal publication. The recommendation of the World Health Organization is to present clinical trials through publishing within 1 year after findings both positive and negative (Moorthy, Karam, Vannice & Kieny 2015). Disseminating EBP findings through publication reaches a wider audience and is identified as the gold standard (Edwards, 2015).

## **Analysis of Self**

The DNP project presented the opportunity to develop my skills as a leader and as an advanced practice nurse. My knowledge and professional growth evolved as I assessed individual and institutional culture, which highlighted gaps in nursing practice. The experiences and opportunity to develop as an advanced practice nurse exceeded my expectations. During my scholarly journey, I encountered challenges including some of the project site's leaders' negative outlook of the expected project outcomes. Despite these negative attitudes, I was able to complete pre- and posttest assessments with the nursing leadership in the critical care areas using the ProQOL survey and disseminate

findings to the leadership team increasing their awareness of issues in practice at the project site, and with confidence, I could implement an education plan to close the gap in practice (Caine & Ter-Bagdasarian; 2003; Stamm, 2010, 2019).

The DNP practicum experience and project contributed to my professional development as a leader, and I became more emotionally intelligent. As challenges developed, I became experienced on how to strategically gain buy-in from resisters by removing barriers. As a scholar, I presented evidence from the published literature to change practice with confidence. I developed the knowledge base of using EBP to guide policy development regarding CF and advocated for adoption and implementation at the site. The DNP program allowed me the opportunity align practice with the DNP essentials by synthesizing knowledge from scientific foundation to demonstrate continuous learning and organizational and system thinking to improve quality of care (American Association of Colleges of Nursing, 2006).

#### Summary

CF affects nurses globally, and initiatives are needed to mitigate its impact on the profession (Nolte et al., 2017). The project site experienced a high turnover rate with the highest incidence of turnover on the critical care units. Education about and awareness of the signs of CF are important to reduce the impact of CF among nurses at the practicum site. Leadership, staff engagement, and awareness of CF can reduce the effect on staff and improve the quality of healthcare outcomes. Professional quality of life and managing a work-life balance are important to the health and well-being of staff, which in turn increases the level of care provided. Sacco et al. (2015) explained that knowledge

of the elements associated with ProQOL can have a positive impact on work-life environment. It is important to continue education and increase awareness of CF among critical care nurses to reduce the physical, psychological, emotional, and financial impact on nurses' health and well-being. Ongoing research and assessment for risk for CF is necessary to mitigate the impact on nurses, the nursing profession, healthcare institutions, and patient care outcomes.

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## Appendix A: Permission to use the ProQOL Instrument

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- You agree to always use the ProQOL or work associated with it in an ethical manner appropriate to human rights policies of the
  United Nations including <u>The United Nations Universal Declaration of Human Rights</u>. You may have other requirements based on
  your setting such as permission from a Human Subjects committee such as is common at Universities. The ProQOL.org does not
  have a Human Subjects review process. You must find that locally.
- You agree to always use the ProQOL in culturally sensitive ways.
- If you collect data, you agree to manage and protect your data the legal and ethical management of data in your employment, training or volunteer setting. For example, if you are from the United States or a European country doing research in a developing nation, you will be held to the procedures of your organization in the United States or European country.
- You, or someone with whom you work, will not profit directly from selling the ProQOL or products that rest in large part on the ProQOL. The ProQOL can be freely used as part of a school course, training curriculum or in a book or journal when it is not the substantial part of the work.
- We encourage you to review and use the Best Practices Parameters from the International Society for Traumatic Stress Studies. To
  find more about these, go to the International Society for Traumatic Stress Studies website at <a href="www.istss.org">www.istss.org</a>. Among others there
  are parameters for <a href="Trauma Research">Trauma Research</a> and <a href="Teaching and Training about Trauma">Training about Trauma</a>, and <a href="International Training Guidelines">International Training Guidelines</a>.

I wish you the very best as you use the ProQOL. Please do consider donating a copy of your data. You can find more information about data donations at the <u>Donate Data</u> page on the ProQOL site.

Beth Hudnall Stamm Developer and Director, <u>ProQOL.org</u>

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Most wording changes do not need additional permission. Here are the guidelines for permission to edit wording changes. You may substitute the appropriate target group for / [helper] / if that is not the best term. For example, if you are working with teachers, replace / [helper] /with teacher. Word changes may be made to any word in italicized square brackets to make the measure read more smoothly for a particular target group. You may not substantially change the wording of a question because it may negate the known reliabilities and validates of the measure.

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No additional permission is needed to change the format of the ProQOL such as re-typing it to fit into a training package or for accommodating a disability or language. You may not change the format to provide a public online form that returns a score to an end user. If you wish to do this type of application, it falls under the Permission to Reprint below. You may put the ProQOL in a format that returns the score to a user for research or training as long as the link is not publicly advertised. Here is the guidance for format changes. You are granted permission to convert the ProQOL into other formats such as a computerized or taped version for the visually impaired. If you are required to provide documentation for changing words to make the measure more appropriate to your target population, provide the requester this page and the Permission for Use letter from above.

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You will find the existing translations at measures page. They may be of use to you as your work on your translation. If you are updating one of the older versions of the ProQOL to the current, v5 version, you can find the line-out comparison of the IV to 5 on the Measures Page. Any translations or translation improvements you can offer would be graciously accepted. When you finish your translation, I hope you will send a copy to us so that we can post it for others to use.

ers html

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The ProQOL is a publically available measure that is free for non-commercial use. If you wish to publish the ProQOL in a print or electronic media outlet, you will need what is called permission to reprint.\* Obtaining permission is usually a simple process because we work with you to make the ProQOL available to as many people as possible.

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The ProQOL measure may be freely copied as long as (a) author is credited, (b) no changes are made other than those authorized below, and (c) it is not sold. You may substitute the appropriate target group for / [helper] / if that is not the best term. For example, if you are working with teachers, replace / [helper] /with teacher. Word changes may be made to any word in italicized square brackets to make the measure read more smoothly for a particular target group.

Additionally you are granted permission to convert the ProQOL into other formats such as a computerized or taped version for the visually impaired.

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YOU WILL NEED TO PRINT A COPY OF THIS FORM FOR YOUR FILES. MAKE SURE YOU PRINT BEFORE SUBMITTING.

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Please tell us briefly about your project (1-3 sentences): \* Permission to Use

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# Appendix B: Leadership Curriculum on Compassion Fatigue

Title of Project: Compassion Fatigue Among Critical Care Nurses

**Problem:** High incidence of CF among critical care nurses and high turnover rates

**Purpose**: Educate Leaders on Compassion Fatigue to increase knowledge, awareness and strategic intervention **Practice Focused Question**: Can leadership education on CF, support education on coping, and screening for critical care nurses assist in identifying CF?

Objectives At the end of this educational program the learner will be able	Content Outline	Evidence	Method of Presenting	Method of Evaluation
to:  Define:  Compassion fatigue (CF) and associated risk factors  Burnout related factors  Secondary traumatic stress  Compassion satisfaction  Tools to measure compassion fatigue	Introduction  Project significance  Purpose of curriculum  Introduction to CF  Introduction of the curriculum  ProQOL screening tools	Sacco, Ciurzynski, Harvey & Ingersoll, 2015.  ProQOL Stamm, 2010	Oral presentation  PowerPoint and group discussion	Pre-test Post-Test
Increased Knowledge Compassion fatigue and the impact on: • Nursing leaders • Staff • Institutions • Patient care outcome	Signs and Symptoms Physical Psychological  Institutional Financial cost Staff Turnover Absenteeism Tardiness  Patient Experience: Quality Care Best Practice Patient outcome	Van Mol, et al. 2015  Mooney, et. al., 2017	Oral presentation  PowerPoint and group discussion	Pre-test  Post-Test
Identify and State:  Signs of a compassion fatigue episode  Precursor of compassion Fatigue  Strategies to reduce compassion fatigue  Compassion satisfaction	Recognition of Signs  Difference between -Compassion fatigue -Burnout -Strategies outlined  -Compassion satisfaction	Nolte, Downing, Temane, & Hastings- Tolsma, 2017.	Oral presentation and PowerPoint with group discussion.	Pre-test Post-Test

Bringing it Together: Awareness and increased knowledge of compassion fatigue and intervention to reduce incidents among leaders (self) and critical care nurses.	Interventions Rounding on units Education on coping skills Internal Support systems -Lavender committee -Peer support -Leadership actions -workshops	EBP Qualitative and Qualitative Research Mooney, et. al., 2017	PowerPoint and internal data collected using the ProQOL measuring tool.	Post test Post-Test
	1			Tost Test

## Appendix C: Leadership Training Pre- and Posttest

# True/False: 2 pts each Multiple choice 5 pts each

- 1. Direct care nurses experience compassion fatigue when patient census in high:
  - a. True
  - b. False
- 2. Compassion is a sign of inappropriate coping
  - a. True
  - b. False
- 3. Burnout progress to compassion fatigue:
  - a. True
  - b. False
- 4. Compassion satisfaction is higher in female nurses than in male nurses.
  - a. True
  - b. False
- 5. Retention and turnover rates are impacted by compassion fatigue.
  - a. True
  - b. False
- 6. What are common signs & symptoms of compassion fatigue (select all that applies)
  - a. Low blood pressure
  - b. Headaches
  - c. Tardiness & Absenteeism
  - d. High Blood pressure
  - e. All of the Above
- 7. A nurse leaves the unit during patient care after the death of an 18-year-old patient post MVA. What action(s) should the unit leader / facility take?
  - a. Redirect staff to proceed with patient care as their action is considered patient abandonment
  - b. Suspend staff for patient abandonment
  - c. Call the Chaplin to speak with the nurse
  - d. Ignore the nurse and wait till she returns
- 8. What places direct care nurses at risk for compassion fatigue?
  - a. Pain and suffering
  - b. Death
  - c. Work Life Balance
  - d. Long shift (12 hours)
- 9. Compassion fatigue is interchangeably termed as:
  - a. Post traumatic disorder
  - b. Secondary traumatic stress
  - c. Burnout
  - d. Emotional distress
- 10. What leadership action(s) can reduce compassion fatigue? (click all that applies)
  - a. Rounding
  - b. Staff Education
  - c. Staff recognition
  - d. No action as compassion fatigue is subjective
  - e. All of the above
- 11. Outcomes of compassion fatigue are:
  - a. Increases financial cost
  - b. Creates turnover intention

- c. Improve quality patient care
- d. Reduces selfcare
- 12. Staff who experience compassion fatigue are:
  - a. Incompetent
  - b. Lacks knowledge in providing care
  - c. Diploma Nurses
  - d. Older nurses
  - e. None of the above
- 13. Does leadership support improve which of the following?
  - a. Staff Engagement
  - b. Compassion Satisfaction
  - c. Quality Patient Care
  - d. Retention -Rates
  - e. A & C
  - f. All of the above
- 14. What committee initiatives can reduce compassion fatigue?
  - a. Lavender Committee
  - b. Daisy Committee
  - c. Shared Governance
  - d. None of the above
- 15. Which nurse is at the highest risk for compassion fatigue? (select all that applies)
  - a. LPN
  - b. Diploma nurses
  - c. BSN prepared
  - d. Masters prepared
  - e. Novice nurses
  - f. Incumbent nurses
- 16. Which nurses are at the highest risk of experiencing compassion fatigue?
  - a. Critical care nurses
  - b. Oncology 'nurses
  - c. Palliative nurses
  - d. Pediatric nurses
  - e. A & B
  - f. All of the above
- 17. What is the pleasure of providing care to those in need is termed?
  - a. Compassionate care
  - b. Compassion satisfaction
  - c. Compassion for selfcare
  - d. Compassion for the profession