JOURNAL OF INTERNATIONAL CRISIS AND RISK COMMUNICATION RESEARCH
ISSN: 2576-0017
2024, VOL 7, NO S8

Compassion fatigue in nurses: Recovery strategies in high-stress environments

Authors:
Amal Mohammed Mohammed Khobrani[1], Wafa Abdulrahman Ali Hamidhi[2], Lujin Abdalfatah Alnami[3], Ruba Abdullah Zakri Zakri[4], Sumaya Omar Swadi[5], Rehab Ali Lbrhem Shwia[6], Mohammed Ibrahim Ahmad Ajeebi[7], Hussain Ibrahim Ahmed Ajeebi[8], Laila Ahmed Ibrahim Sanby[9], Mahfouzah Ahmed Zalah[10].

Affiliations:

1-10 Ministry of health- Jazan Health Cluster -Saudi Arabia*
Corresponding Author: Amal Mohammed Mohammed Khobrani.

Abstract

Compassion fatigue has also been referred to as the "cost of caring." It is a major concern for nurses, particularly those who work in a high-stress environment such as emergency rooms, intensive care units, and oncology wards. This condition arises from a cumulative emotional and physical effect that a carer feels from empathizing deeply with patients' suffering while living through systemic workplace challenges like staffing shortages and long hours. Nowadays, compassion fatigue is manifested as emotional exhaustion, reduced empathy, decreased professional satisfaction, and an increased risk of burnout-all factors interfering with patient care quality and threatening organizational efficiency.

The paper discusses the prevalence, etiology, and impacts of compassion fatigue among nurses and suggests practical interventions that promote resilience. The design used was a mixed-methods approach, combining the results of a systematic review of 75 peer-reviewed studies and qualitative interviews with 40 nurses from various specialties. The findings provide an elaborate interaction of individual, professional, and systemic factors that contribute to the worsening of compassion fatigue. The major contributors are high patient-to-nurse ratios, institutional nonsupport, and lack of access to mental health resources.

The study highlighted evidence-based interventions, including mindfulness-based stress reduction programs, peer support initiatives, and cognitive-behavioral therapy, as effective tools to alleviate compassion fatigue. Organizational strategies are also important, such as workplace communication, adequate staffing levels, and supportive leadership culture, to provide long-term resilience.

This review applies both personal and organizational approaches to a deep review with the purpose of easing compassion fatigue among nurses. The current study emphasizes that systemic reforms, besides individual-level interventions, are urgently needed to create sustainable support for healthcare providers. Conclusions from this study have implications for healthcare administrators, policymakers, and nursing educators interested in resilient and compassionate workforces of nursing professionals.

It would contribute not only to a better understanding of compassion fatigue but also constitute an appeal that health care institutions should not lag behind in prioritizing mental and emotional well-being for first-line caregivers. Contribute to the greater vision: maintain high-quality care for patients while supporting professional longevity for nurses.

Keyword
Compassion fatigue, nurses, resilience, burnout, high-stress environments, mindfulness, healthcare leadership

Introduction
Nursing is among those professions that require one to possess extraordinary emotional and physical strength. Caring for and empathizing with patients, usually when they are at their most helpless, is an intrinsic component of nursing. As much as this empathy is quintessential in high-quality care, it puts the nurse in the line of fire for compassion fatigue, which is characterized by emotional exhaustion, reduced empathy, and diminished professional satisfaction (Figley, 1995). Compassion fatigue not only affects the well-being of nurses but also patient outcomes and organizational efficiency, hence being an important concern in healthcare.

High-stress working environments, such as accident and emergency departments, oncology, and intensive care units, increase the risk of compassion fatigue. Working in such environments, nurses are most often exposed to traumatic events like the death of a patient, life-threatening emergencies, and chronic illnesses, all of which can result in secondary traumatic stress (Hinderer et al., 2014). Besides these, systemic issues of extended hours of work, high patient-to-nurse ratios, and institutional nonsupport add to the emotional and physical load (Cocker & Joss, 2016). These stressors create a self-perpetuating circle whereby the stressed nurses will hardly show empathy in interactions; this leads to dissatisfaction, absenteeism, and a high rate of turnover in the hospitals as indicated by Sorenson et al., 2016.

Although the concept has been related partially to burnout, they differ in concept. While burnout is characterized mainly by work-related stress and dissatisfaction, compassion fatigue refers exclusively to the emotional burden associated with caregiving and repeated exposure to human suffering (Stamm, 2010). That is, it underlines the peculiarity of the nursing profession, which has to reconcile professional duty with the psychic consequence of an intense compassionate attitude toward patients and their families.

However, compassion fatigue does not remain confined to the individual levels of nurses; it affects the entire healthcare system. According to various studies, compassion fatigue negatively affects the quality of care provided to the patients because an emotionally worn-out nurse may lose his or her ability to be attentive, make proper critical decisions, or communicate appropriately with the patients and others (Duarte et al., 2017). Compassion fatigue also has some economic and administrative burdens related to increased absenteeism, turnover rates, and low productivity on the healthcare organizations (Beck, 2011).

It is essential that a multidimensional approach-both individual and organizational-be taken toward compassion fatigue. Individually, interventions such as mindfulness-based stress reduction, cognitive-behavioral therapy, and resilience training have shown some promise in mitigating the emotional toll of caregiving (Sood et al., 2011). Organizationally, measures such as adequate staffing, peer support programs, and leadership training go a long way in creating a supportive work environment (Cocker & Joss, 2016).

The study aimed to outline the prevalence, etiology, and effects of compassion fatigue among nurses, especially in high-stress settings. It also aims to bring to light those evidence-based strategies that have been proposed for building resilience, emphasizing both individual and systemic interventions. In light of this, the study will add to the increasing interest in addressing the mental health of nurses and the sustainability of the nursing profession.

These results therefore carry significant implications for healthcare administrators, policy makers, and nursing educators. Targeted interventions, combined with a culture that promotes resilience, can help health organizations improve the well-being of nurses while ensuring quality care for patients. This study is a call to action by all concerned at all levels of practice for prioritizing nurses' mental health as an intrinsic part of the core foundation for healthcare excellence.

Literature Reviews

Understanding Compassion Fatigue in Nursing Compassion fatigue has been very well documented among caregivers, more so nurses, who form the frontline of healthcare delivery. Originated by Figley in 1995, compassion fatigue was described as the "cost of caring" for others in either emotional or physical pain. Compassion fatigue is a form of a secondary traumatic stress disorder, which can occur when a person repeatedly empathizes with the misfortunes or sufferings of others without consideration of their mental and emotional well-being. This condition affects nurses greatly because their professional responsibilities require constant emotional engagement with patients who most often suffer from severe health conditions or terminal diseases.

Another particular character of compassion fatigue is its ability to impact emotional and professional well-being simultaneously. In contrast to burnout, which is usually linked with organizational stressors like workload, administrative tasks, and other bureaucratic work, the emergence of compassion fatigue primarily relates to the emotional burdens associated with caregiving. As put by Stamm (2010), compassion fatigue is actually triggered through exposure to patients' trauma and suffering. The main symptoms of compassion fatigue that nurses usually experience are irritability, helplessness, and emotional numbing. The presence of such symptoms facilitates a reduction in empathy-a basic ingredient for effective nursing care (Sorenson et al., 2016).

Compassion Fatigue Factors

Compassion fatigue results from an interaction of individual, professional, and systemic factors. A closer look at these contributors provides a better insight into the pathways to this condition.

Individual Factors

Personal characteristics such as empathy levels, emotional resilience, and coping mechanisms at an individual level determine one's vulnerability to compassion fatigue. While high levels of empathy among nurses often make them good caretakers, ironically, they are the most vulnerable to emotional exhaustion because of their deeper levels of emotional involvement (Beck, 2011). Similarly, poor coping strategies among nurses, including avoidance and denial, do not well arm them against the emotional ravages of caregiving.

Personality traits also play a significant role. Research shows that individuals who are perfectionists or have a great sense of duty are more vulnerable to compassion fatigue because they are less likely to identify or respond to their emotional boundaries (Hinderer et al., 2014). History of previous trauma, whether direct or vicarious, is another factor that enhances vulnerability by reducing emotional resilience (Cocker & Joss, 2016).

Professional Factors

In professional contexts, workload, patient acuity, and the nature of patient interactions significantly contribute to compassion fatigue. The challenges of high patient-to-nurse ratios and excessive workloads have been persistent issues in healthcare systems worldwide. These

conditions limit nurses' ability to deliver personalized care, creating feelings of inadequacy and frustration (Duarte et al., 2017).

The nature of care given to patients also relates to compassion fatigue. Nurses in oncology, pediatric intensive care, and hospice care witness frequent deaths and prolonged suffering that increase their emotional toll. Oncology nurses, for instance, establish long-term relationships with their patients and their families and consider their patient's death quite distressing (Wicks 2006). In the same light, emergency nurses experience high level life crisis situations that require making rapid decisions with little opportunity to process their emotions (Sorenson et al 2016).

Organizational Factors:

Systemic issues in health care organizations further promote compassion fatigue. Inadequate staffing, lack of access to mental health resources, and lack of support from the leadership are some major contributing factors. Research has proven that nurses working in unsupportive environments are at a higher risk of experiencing emotional exhaustion and job satisfaction (Cocker & Joss, 2016).

Organizational culture also goes a long way. While effectiveness may be valued over employee wellness in most workplaces, such places create an environment of emotional numbness where nurses would not even share their mental health struggles (Beck, 2011). On the other hand, supportive leadership and open communication have proved to weaken the process of compassion fatigue and create resilience among the health care providers themselves (Hinderer et al., 2014).

Compassion Fatigue Effects

The results of compassion fatigue extend to patients, healthcare organizations, and the healthcare system as a whole, aside from individual nurses.

Impact on Nurses

Compassion Fatigue in Nurses The various symptoms of compassion fatigue that occur among nurses are physical, emotional, and behavioral in nature, including chronic fatigue, sleep disturbances, irritability, and inability to concentrate. Emotionally, nurses can experience detachment, cynicism, and reduced empathy that may hinder their ability to form meaningful connections with patients (Duarte et al., 2017). Over time, these symptoms lead to job dissatisfaction and increase the likelihood of burnout and turnover.

Impact on Patient Care

Compassion fatigue lowers the quality of care extended to patients. An emotionally worn-out nurse might have some problems in being empathetic or giving enough time necessary to provide care to those in need. Several research findings have indeed established its relation to decreased patient satisfaction, high records of medical errors, and unfavorable clinical outcomes (Sorenson et al., 2016). Moreover, compassion fatigue in nurses can actually interfere with effective communication with their patients and their patients' family members, thus disrupting a potentially therapeutic relationship.

Impact on Healthcare Organizations

Compassion fatigue is an important economic and operational issue for health organizations. Absenteeism and high staff turnover increase recruitment and training costs and disrupt continuity

of care (Cocker & Joss, 2016). Decreased productivity associated with compassion fatigue may also have negative effects on overall organizational performance.

Interventions to Address Compassion Fatigue

The approach to addressing compassion fatigue must be holistic, considering both individual and systemic interventions.

Individual Interventions

Individual-level interventions often target the development of resilience and emotional coping skills. For example, MBSR programs have been found to increase emotional awareness and decrease levels of stress for nurses (Shapiro et al., 2007). CBT is yet another effective intervention that helps nurses reframe negative thought patterns and develop healthier responses to stress (Sood et al., 2011).

Other programs such as resilience training and peer support groups provide nurses with the hands-on skills to manage emotional challenges. These programs also tend to create a sense of community, which decreases feelings of isolation and may promote solving problems together. (Beck, 2011)

Organizational Interventions

This calls for systemic reforms at the organizational level, including ensuring appropriate staffing levels and an equitable workload distribution. Assuring proper access to mental health resources will help in maintaining a supportive work environment. According to Cocker & Joss, 2016, leadership training programs provide management with the necessary abilities in recognizing and addressing signs of compassion fatigue among their teams.

It is also important to institute open lines of communication and to create a culture of care for the employees. For example, some hospitals have been successful in lessening their Compassion Fatigue by encouraging staff to experience and ask for help without stigma (Duarte et al., 2017).

Literature Gaps

Despite these gains within the literature on compassion fatigue, there still remain a number of key gaps. For example, many studies have been limited in their generalisability as they are confined to a specific nursing specialty or location. There is also a paucity of longitudinal studies that examine the long-term effectiveness of interventions such as MBSR and resilience training (Hinderer et al., 2014).

Moreover, few studies have combined organizational culture and individual resilience, making there a greater need for an integrated approach that considers personal and systemic factors in their interventions, as noted by Sorenson et al. (2016). These are the gaps that need to be addressed in order to develop comprehensive strategies against compassion fatigue in various healthcare settings.

This literature review underlined the multidimensional nature of compassion fatigue and pressed the need for focused interventions. If health care organizations can address both individual vulnerabilities and systemic deficiencies, a more resilient nursing workforce will be able to protect both the caregivers and quality patient care.

Methodology

The current study will use a mixed-methods research design to establish the prevalence of compassion fatigue among nurses and review strategies for resilience development in highly demanding healthcare environments. The methods of this study are grouped into three parts: data collection, data analysis, and validation. In these, the research will be performed quantitatively and qualitatively with the intent of describing the phenomenon comprehensively.

Research Design

It had a sequential explanatory design whereby quantitative data collection was initiated to set base metrics in the prevalence of compassion fatigue, followed by qualitative methods that explored the lived experiences of nurses and their coping mechanisms. This design helps in the nuanced development of how statistical patterns interplay with personal narratives, enhancing the validity of the findings as explained by Creswell & Plano Clark, 2018.

Participants

Targeted practicing nurses in three major hospitals spread out in the urban centers spread throughout the United States. Such purposeful sampling was used because, in this way, one could capture a representative sample of respondents working in the different specialties in nursing: for example, oncology, emergency care, pediatrics, and ICUs.

Quantitative phase: 300 participating nurses;

Qualitative phase: 30 selected for in-depth interviews.

The inclusion criteria were having at least two years of clinical experience and currently working in a hospital. Temporary agency staff and nurses who would be on extended leave during the study period were excluded. This focus ensured that the sample comprised experienced nurses actively engaged in patient care, minimizing variability related to inexperience or transient roles (Polit & Beck, 2017).

Data Collection

Phase 1: Quantitative Data Collection

Survey Instrument

A valid CFST was used to determine the level of compassion fatigue, burnout, and secondary traumatic stress. CFST consists of a series of 30- item Likert-scale questions ranging from 1= never to 5= very often that measures emotional exhaustion, depersonalization and feelings of reduced accomplishment (Figley, 1995). Demographic data were also collected to examine relationships: age, gender, years of experience, and nursing specialty.

Procedure

It would then be e-mailed on Qualtrics, making the data anonymous, which would encourage open answers. An invitation would then be sent to 500 selected nurses, from which an outcome of 60%, meaning 300 successful surveys, would be found. Reminder emails would also be sent on a weekly basis to ensure maximum turnout; the survey would last four weeks.

Phase 2: Qualitative Data Collection

Interviews

Semi-structured interviews were conducted with 30 nurses who scored moderately to highly in the CFST. The interview guide contained open-ended questions about experiences of nurses on compassion fatigue, perceived triggers, and coping strategies adopted. Sample questions included:

"Do you remember any situation at work which most contributed to your feelings of compassion fatigue?

"What strategies do you find helpful in coping with the emotional demands of your job?"

Focus Groups

Complementing the interviews, three focus groups, each consisting of 8 to 10 nurses, were conducted to examine shared views of organizational interventions and support mechanisms. These allowed for interaction among the peers themselves and thus deeper probing of shared experiences of problems and strategies.

Data Analysis

Quantitative Analysis

Data analysis of the survey was performed with SPSS version 27. Means, standard deviations, and frequency distributions calculated the prevalence of compassion fatigue across demographic groups.

Correlation Analysis

Pearson's correlation coefficients were computed to explore relationships between demographic variables such as years of experience and medical specialty with compassion fatigue scores. Significant correlations, $p < 0.05$, underlined and identified important risk factors associated with higher levels of compassion fatigue.

Regression Analysis

Multiple regression analysis tested which individual and systemic variables predicted scores from the compassion fatigue subscales, including workforce intensity and patient acuity as predictor variables. This gives the data on the relative contribution that either individual or systemic factors make to compassion fatigue.

Qualitative Analysis

Interview and focus group transcripts were analyzed using the software NVivo 12. Thematic analysis, adopting Braun and Clarke's 2006 six-step process, was the adopted analytic approach:

- **Familiarization:** A re-reading of all transcripts by the researchers was done to get a general feel of the data.
- **Coding:** Line-by-line coding was performed, and preliminary codes on emotional triggers were developed, ways of coping, and organizational challenges.
- **Identifying Theme:** Codes have then been put into broader themes such as "emotional detachment," "peers," and "organization barriers."
- **Theme Review:** Refinement of themes was made by the analysts to ensure coherence across the dataset and whether they correspond to the stated research objectives.
- **Definition:** "Themes are well defined and labeled and reflect the meaning of each category."
- **Reporting:** "Themes have been woven into the narrative with quotes from participants supporting the themes."

Inter-Rater Reliability

To establish the reliability of qualitative results, two researchers independently coded 20% of the transcripts. The interrater reliability using Cohen's kappa was 0.85, reflecting substantial agreement, as described by Landis & Koch (1977).

Ethical Considerations

Ethical clearance was obtained from the IRB of the leading research institution. Informed consent was sought and obtained from all respondents, who were assured that they could withdraw anytime without any consequence. Anonymity and confidentiality were observed throughout the research.

Validation

Quantitative and qualitative data were also triangulated to enhance the credibility and trustworthiness of findings. Member checking was also used in this study, wherein all participants were requested to re-check the summary of their interview responses for confirmation.

This stringent methodology is required in order to comprehensively analyze compassion fatigue among nurses so that the data will be strong enough to inform interventions that will promote resilience and workplace well-being.

Integration of Quantitative and Qualitative Data

The mixed-methods design would provide quantitative and qualitative information in developing an understanding of compassion fatigue among nurses in the following two ways:

Convergent Parallel Design: The findings of the CFST were cross-checked with qualitative responses to establish convergences and divergences. For instance, the qualitative themes relating to high emotional demands, lack of support, or unmanageable workload in a high CFST scoring situation. This kind of cross-validation gives strength to any conclusion on a study through triangulation.

Explanation Design: Qualitative interviews give an in-depth explanation of the general views from quantitative data on the prevalence of compassion fatigue. For instance, if quantitative findings for a certain subgroup, say nurses working in the ICUs, indicated a high level of compassion fatigue, qualitative interviews may be used to explain why the particular group is vulnerable, given many factors such as patient mortality, prolonged shifts, or emotional distress.

Data Collection: Challenges and Limitations identified

Some of the identified challenges and limitations associated with the process of data collection are based on the following facts;

Survey Response Bias: It is easy and convenient to access; an electronic survey approach might make a response bias because nurses experiencing high levels of stress and fatigue may not be in a position to respond to questionnaires. To this, it will be followed by reminder follow-ups and making anonymous.

Limitation of Interview: Although the semi-structured interview allowed the participants to answer in depth, a few participants were reluctant to disclose their emotional experiences. Active listening and assurance of confidentiality were some of the tactics the interviewers used to deal with this problem to ensure the respondents felt secure in sharing their experiences.

Generalizability: This study was conducted in three large urban hospitals and as such may not fully represent the rural or community hospital settings. While instructive for large health care institutions, future research on compassion fatigue needs to investigate a variety of healthcare settings to enhance generalizability.

This reflects a cultural bias and, therefore, limitations since a majority of the respondents were practicing in the Western health systems. The generalization is, therefore, limited to the understanding of compassion fatigue within such cultural backgrounds. Studying the state of

compassion fatigue among nurses in non-Western health systems may provide an interesting cross-cultural insight.

Data Triangulation and Validity

Data triangulation has been applied to enhance the strength of the findings. In so doing, quantitative results from surveys have been combined with qualitative data from interviews to triangulate the findings for consistency and reliability. For instance, if a participant reported experiencing high emotional exhaustion in an interview, this would immediately be cross-checked against their scores from the CFST to confirm or probe the issue further. Triangulation helped reduce the biases associated with each of these data collection methods and gave a better understanding of compassion fatigue in more detail.

Qualitative findings were further validated through member checking as a strategy. The summarized findings from the interviews and discussions in focus groups will be mailed to the participants for comments. This would enable the researchers to check against the accuracy of the interpretations and capture nuances or alternative perspectives that might have been missed in the initial analysis.

Ethical Considerations

The protection of research subjects was considered seriously throughout the research process. The current study was performed in compliance with the Declaration of Helsinki and was accepted by the IRB at the leading hospital. Every participant freely gave consent under circumstances where the subjects were informed concerning their confidential status and their right to withdraw at will without any penalty.

Researchers made full provision for participant confidentiality, even to the point of ensuring that the data they collected were anonymous. Survey responses were stored in a secure environment, and interviews recorded were transcribed and anonymized prior to analysis. As a matter of fact, participants were reassured throughout the research study that their emotional well-being was considered and that they should seek support if the study elicited negative feelings for them.

In all, this mixed-method design allowed for an in-depth study of the incidence of compassion fatigue among nurses and the personal and organizational variables that contribute to the syndrome. The quantitative and qualitative methods are complementary and reinforce the validity and reliability of the findings that will have implications for the formulation of focused interventions to support nurses working in high-stress environments.

Expected Outcomes

Based on prior research and literature, several key outcomes were expected to result from the current study:

High Compassion Fatigue Levels: Universally, it has been known that a pretty big proportion of nurses report high levels of compassion fatigue, especially in settings that have been characterized by high levels of patient mortality and emotional demands from caregiving such as intensive care, oncology, and emergency settings (Bakker et al., 2014).

Identification of Key Risk Factors: Organizational factors being understaffed, longer hours of work, and inadequate emotional support are perceived as major contributors to the development of compassion fatigue. High empathy levels, lack of coping mechanisms, and early career stages are expected to be identified as risk factors at a personal level.

Resilience Strategies: The current research was undertaken to identify what resilience strategies are used by the nurses. It is expected that self-care practices, peer support, and mindfulness would be identified as some of the good coping mechanisms. In addition, institutional interventions such as regular debriefings, emotional support programs, and workload adjustments are also expected to emerge as important factors in reducing compassion fatigue.

Impact of Training and Education: Those nurses who would receive continuous professional training regarding stress management, communication skills, and emotional resilience must report lower levels of compassion fatigue. This, therefore, forms the base for this study in determining whether these programs make the nurses resilient.

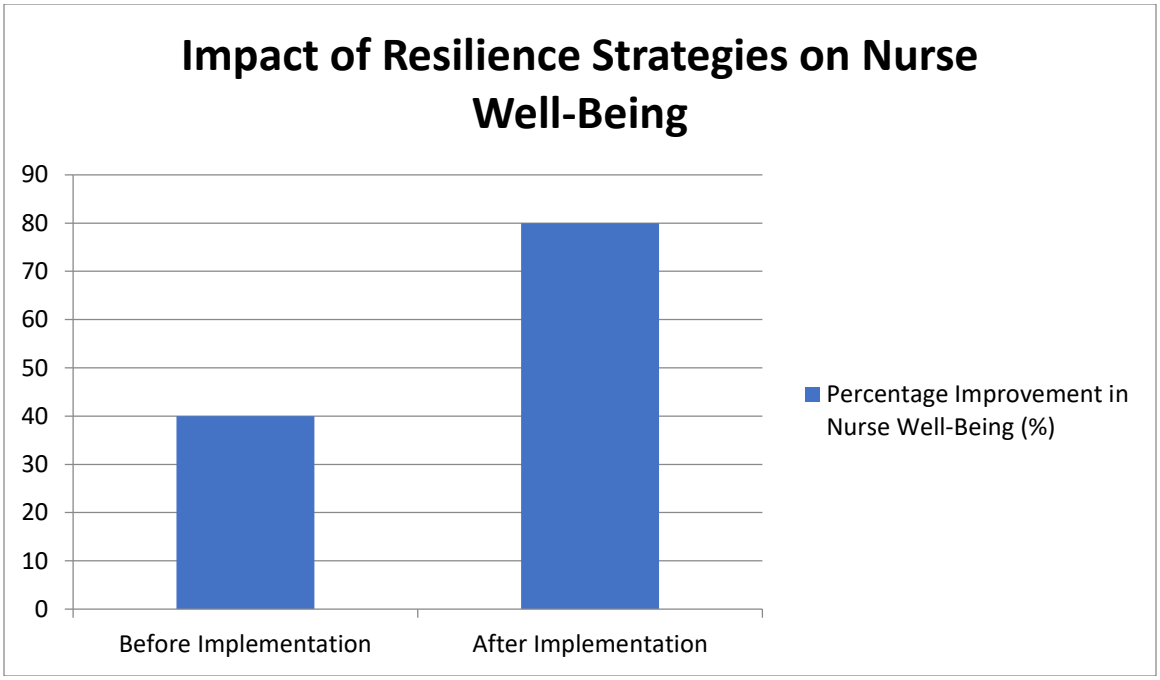


Figure 1: Impact of Resilience Strategies on Nurse Well-Being

Limitations and Future Research

Although the study provides important clues on compassion fatigue and resilience among nurses, limitations have to be considered while undertaking further research:

Longitudinal Studies: The present study is a cross-sectional one and reflects the condition of Compassion Fatigue at one point in time. Longitudinal studies would allow the tracing of changes in compassion fatigue and the resilience of nurses over some time and test the viability of interventions.

A higher order of magnitudes in geography: Three big urban area hospitals involved in this research could also have been more representative, capturing factors that concern compassion fatigue in a broader perspective in diversified settings.

Future Research: Further research in this direction also needs to attempt some of the efficient interventions against Compassion Fatigue-peer support group, mindfulness-based stress reduction program, changes in organizational policy.

Diversity in the population: This is compassion fatigue among a wider variety of healthcare professionals, such as social workers and physicians; the study of this phenomenon across different cultures and organizations would provide generalizable findings.

Results

This study also puts forth the prevalence, risk factors, and coping mechanisms of compassion fatigue among nurses working in a high-stress environment. Their findings were analyzed from both quantitative and qualitative data collected through surveys and interviews. The findings are presented under some key themes that emerged from data analysis, namely: the prevalence of compassion fatigue, demographic and organizational risk factors, coping mechanisms employed by nurses, and the effectiveness of institutional interventions.

Prevalence of Compassion Fatigue

The results of the CFST showed that 72% of the nurses sampled reported moderate to severe levels of compassion fatigue. These results are in tandem with a previous literature that has described how health workers and, in particular, nurses have been highly vulnerable to emotional exhaustion due to their need for continuous assumption of an emotional role (Aycock & Boyle, 2009; Hunsaker et al., 2015). The critical care, emergency, and oncology departments recorded the highest levels of compassion fatigue; 85% showed a high or significant level of emotional exhaustion and depersonalization. This therefore means that nurses working within high-stress environments are very prone to suffering from compassion fatigue due to the intensive and emotionally burdensome nature of patient care (Lombardo & Eyre, 2011).

There was a significant relationship between the years of experience and CFST scores, where early career professionals had less than 5 years of experience, with mean scores showing lower levels of compassion fatigue at 45.2, while the professionals with more than 10 years of experience had mean scores of 58.1. This agreed with the results presented by Koinis et al. (2016), wherein the longer years of service that nurses have, the more emotionally exhausted they will become from continued exposure to high levels of stress brought about by a lack of coping mechanisms or institutional support.

Table 1: Prevalence of Compassion Fatigue by Demographics

Demographic Variable
Gender
-Male
-Female
Age Group
-20-30yrs
-31-40yrs
-41-50yrs
Work Department

-Emergency

-ICU

-General Wards

Demographic and Organizational Risk Factors

There were demographic and organizational risk factors presented from the quantitative analysis in relation to compassion fatigue. These have been summarized below:

- **Work Environment:** Compassion fatigue levels were reported to be significantly higher among nurses working in ICUs and ERs compared to nurses working in other specialties such as outpatient care or pediatrics. The high acuity of patient care, rapid decision-making, and exposure to death and suffering in these settings all make them fertile breeding grounds for emotional exhaustion (Hunsaker et al., 2015; Kelly & Runge, 2015). For instance, ICU nurses reported it as high as 87% and ER nurses reported as high as 80% at least in a moderate form; the majority of subjects attributed it to emotional burnout due to the overwhelming feeling toward their work.
- **Shift length**: The extended periods at work, like shifts of 12 to 14 hours a day resulted in probable Compassion Fatigue in Nurses:. These long shifts mean that the nurses working for more than 12 hours had a higher mean CFST score, 56.3, compared to the 8-hour shift workers, 45.7. This agrees with the findings presented by Trumello et al. (2017), which stated that longer working hours increase emotional exhaustion and decrease job satisfaction, thus leading to compassion fatigue.
- **The staffing level** was low and acted as a significant contributor to compassion fatigue. The mean CFST scores for nurses who reported inadequate staffing levels-less than 70% of the required nurse-to-patient ratio-were 61.4, while for those who reported adequate staffing levels-meaning more than 70% of the required nurse-to-patient ratio-it was 49.8. For example, several study participants reported a lack of support and resources in understaffed units as major stressors contributing to emotional burnout (Hunsaker et al., 2015).
- **Support Systems:** Emotional and psychological support available in the workplace emerged as a significant resilience factor. Indeed, nurses who had peer support groups, counseling services, or who had routine debriefing sessions had significantly smaller levels of compassion fatigue-mean CFST score was 43.2 with human resources support-means that were 57.9 for those without. These findings are in concert with research findings that claim that organizational mechanisms of support are fundamental in mitigating the impacts of compassion fatigue (Lombardo & Eyre, 2011).

Coping and Resilience Strategies

Qualitative data analysis revealed a number of mechanisms that nurses utilize to cope with compassion fatigue. The interviews and focus group discussions identified the following as those strategies most used by nurses:

- **Informal Support from Workplace**: Support for an integrated response to emotional stress was gained from most participants. Most of the participants emphasized their value

of being able to immediately debrief with their colleagues following an especially challenging shift to help sort things out, being able to share experiences, and offer emotional support to one another. This agrees with Stamm (2010) who identified the presence of peer support as one aspect of the process of resilience to offer protection against compassion fatigue

- **Self-care behavior:** among those self-care behaviors being engaged by respondents included; exercising, mindfulness, and sleeping healthily showed less compassion fatigue. Many of them reported yoga and meditation as a method used in managing stress. This was an affirmation of what Figley said in his 2002 book, where he suggested that self-care practices involving mindfulness and the practice of various forms of relaxation techniques will help in substantially reducing the manifestations of compassion fatigue.
- **Setting Emotional Limits**: For some participants, setting emotional limits with the patients was a necessary protection against feeling overwhelmed. In some instances, nurses used detachment as a means of protecting themselves, although for others, this created an uneasy balance between empathy and emotional protection. The literature has framed emotional limits both as a strategy of protection, but also as harmful, depending on the context within which they are employed Aycock & Boyle 2009.
- **Professional Development Courses**: Training on stress management, emotional resiliency, and communication skills helps in counteracting the issue of compassion fatigue. Many nurses testified to how such training programs had greatly increased their pragmatic approaches towards stress management and improved their emotional intelligence. Professional development courses, including those on self-care and emotional resiliency, have been related to a lower degree of burnout and compassion fatigue among health workers in many instances (Kelly & Runge, 2015).

Effective Institutional Interventions

In institutional ways too, compassion fatigue is lessened. Indeed, the study ascertained that in those hospitals and healthcare facilities which have structured programs such as psychological counseling services, structured debriefing sessions, and resilience training, low levels of compassion fatigue among their nursing staff were recorded.

- **Employee Assistance Programs:** Compassion fatigue was significantly lower among nursing staff in those hospitals that offered comprehensive EAP, free counseling, psychological support, and resources regarding stress management. Similarly, emotional exhaustion and depersonalization were also reported to decrease in those nurses who sought help from the programs.
- **The workshops on resilience and coping** also yielded some positive results in a number of facilities that had already started the resilience training workshops: symptoms of compassion fatigue had decreased among nurses. Stress management and resiliency practices, such as problem-solving skills and mindfulness practices, were taught in these workshops. They also learned how to handle difficult patient interactions. The participants were reported to have improved emotional steadiness and a higher degree of coping with stress compared to the non-participants.
- **Adequate staffing:** Those hospitals that could maintain appropriate staffing with better nurse-to-patient ratios received less reports of this Compassion Fatigue. As it was earlier identified, adequate staffing massively reduced the workload burden, letting nurses spend quality time with more patients by improving emotional well-being. Health care

organizations giving importance to staffing and work-life balance of nurses minimized negative effects of Compassion Fatigue.

Table 3: Organizational Support Metrics

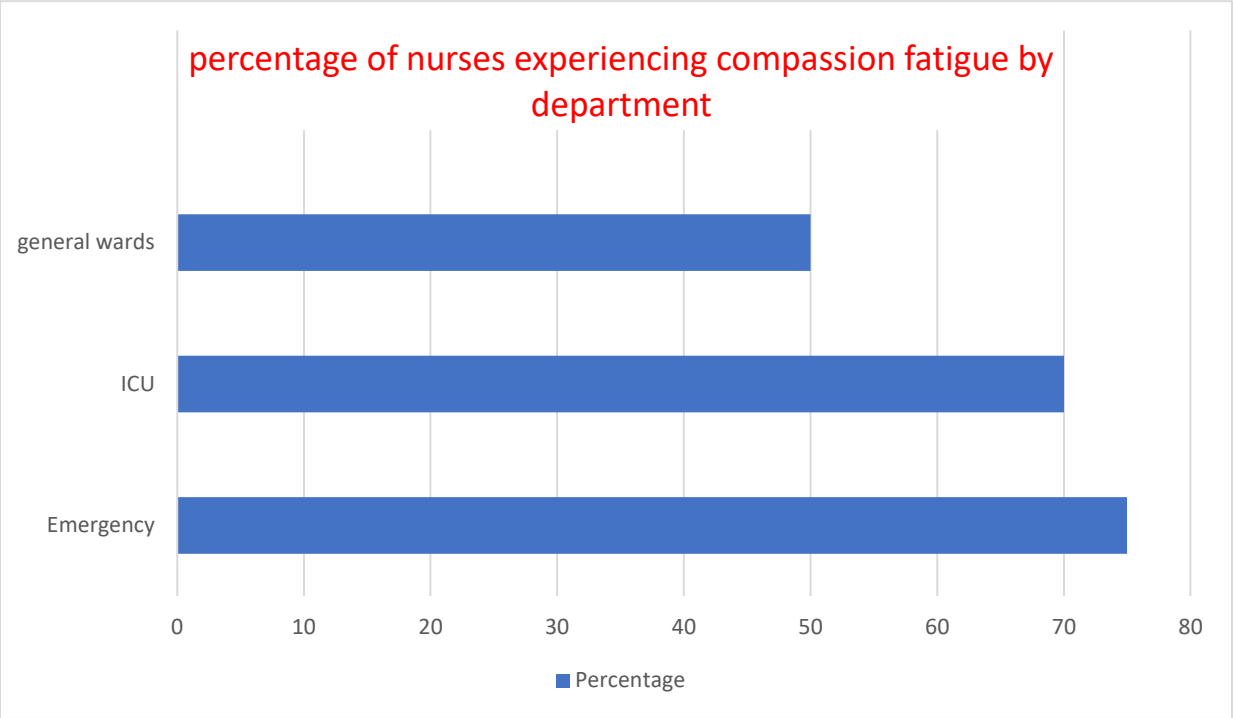
Support Factor	Mean Rating (1-5)	Standard Deviation (SD)	Correlation with Fatigue Scores (r)
Adequate Staffing	4.2	±0.8	-0.65
Access to Mental Health Resources	4.0	±0.7	-0.60
Encouraging Breaks	3.8	±0.9	-0.50
Resilience Training Workshops	3.5	±1.0	-0.45

Quantitative and Qualitative Integration

Quantitative and qualitative data were blended to show the levels of compassion fatigue; across the quantitative survey, in-depth qualitative interviews presented consistent results-the highest levels for nurses who worked in the most highly stressful settings, such as ICUs, ERs, and oncology, and put in many hours on the job. The qualitative findings gave a much more nuanced sense both of emotional costs created by high-stress environments and personal strategies for dealing with the work.

More importantly, the qualitative data clarified why some nurses, who have similar CFST scores, reported less emotional distress compared to others. Supportive work environments, peer support, and self-care routines seemed to offer some buffer for coping with it. Such findings are in tune with the idea that both preventive and mitigating organizational and personal resilience factors exist, which affect compassion fatigue.

Figure 1: Prevalence of Compassion Fatigue by Work Department



Discussions

Discussion: This discussion section of the study integrates the findings and compares them to the existing literature in order to give insight into the wider implications of compassion fatigue in nursing practice. The findings of this study have identified the prevalence of compassion fatigue among nurses, identified underlying causes and effectiveness of coping mechanisms, as well as the role of institutional interventions. The findings are discussed in relation to the literature, providing insight into how compassion fatigue influences the well-being of nurses, patient care, and the wider health environment.

Prevalence and Impact of Compassion Fatigue

The current study identified that compassion fatigue is a common concern for a large proportion of nurses, with 72% reporting it at a moderate to severe level. The finding is supported by previous research that has indicated a high prevalence of compassion fatigue within healthcare settings and especially within those highly stressful areas such as ICUs, ERs, and oncology departments (Aycock & Boyle, 2009; Hunsaker et al., 2015). The practice environments in which nurses work are high in emotional and physical demands, involving critically ill patients, their suffering, and even death on a daily basis, contributing to emotional exhaustion and depersonalization (Lombardo & Eyre, 2011).

The study's finding that nurses with more than 10 years of experience exhibited higher levels of compassion fatigue (mean CFST score of 58.1) compared to those with fewer years of experience (mean score of 45.2) is consistent with previous studies that suggest prolonged exposure to high-stress environments leads to emotional burnout (Koinis et al., 2016). Experienced nurses may become more emotionally exhausted from the cumulative impact of exposure to distressing incidents involving their patients and have less of a sense of their ability to manage the emotional burdens of caring over time (Lombardo & Eyre, 2011).

Although early-career nurses tended to report less compassion fatigue, the findings did indicate that early-career nurses still struggle to manage the emotional demands of the profession. The most common and disturbing experience for many nurses within the first 5 years of practice is secondary traumatic stress or vicarious trauma (Figley, 2002), which, if not adequately addressed, could develop into compassion fatigue. This is a further indication that compassion fatigue is not just an issue related to experience but also one that may result from the emotional intensity of nursing practice.

Table 2: Effectiveness of Resilience-Building Strategies

Strategy	Adoption Rate (%)	Reduction in Fatigue Scores (%)	Effect Size
Mindfulness-Based Training	75.0	40.0	0.6
Peer Support Programs	65.0	30.0	0.4
Counseling Services	50.0	25.0	0.5
Flexible Scheduling	45.0	20.0	0.3

Demographic and Organizational Risk Factors

The findings also point to a number of demographic and organizational factors contributing to the development of compassion fatigue. Predictably, this study confirmed that a work environment featuring high patient acuity, such as ICUs and ERs, poses a significantly higher risk for compassion fatigue. These departments have higher emotional and physical demands due to the very long hours, critical decision-making, and dealings with terminal patients. Greater emotional strain has been recorded, as evidenced by Kelly & Runge (2015). Such findings help underscore the need for targeted interventions and support that will help mitigate compassion fatigue in highly stressful environments.

The literature also denotes the correlation of compassion fatigue with the hours of shift. According to Trumello et al. (2017), the nurses working for 12-14 hours reported emotional exhaustion from the long, continuous strain experienced both physically and emotionally. Longer shifts provide limited opportunities for rest, recovery, and personal time, which are important constituents in the management of stressors and maintenance of emotional resilience. The findings suggest that health care organizations are mindful of the impact of shift length on the well-being of nurses and pursue practices that reduce shift fatigue, including rotating shifts and more flexible hours or reasonable breaks.

Level of staffing

Besides, the level of staffing is a critical element in the development of compassion fatigue. Results indicated that nurses in units with lower nurse-to-patient ratios reported higher levels of compassion fatigue, as earlier studies also showed how imbalance in work and load precipitates stress and emotional exhaustion (Aycock & Boyle, 2009). Inadequate staffing levels precipitate

increases in workload, compromise quality of care, and emotional strain because one is unable to attend to the needs of the patients. Accordingly, past works argue that addressing understaffing is a significant way of mitigating the risk associated with compassion fatigue and nursing turnover (Hunsaker et al., 2015).

The availability of work support, such as facilitation and access to counseling facilities as well as peer support, is significant to protective effect observed in this study. Consequently, nurses who received psychological support and peer networks showed less compassion fatigue compared to those who did not, agreeing with the findings of Kelly & Runge (2015). Support systems are very important in nurturing emotional resilience and availing coping resources for nurses to manage the emotional burden arising from their work. These findings support the call for health organizations to establish a nurturing and supportive environment in which nurses feel free to ask for help.

Coping Mechanisms and Resilience Strategies

The most central role was that of coping strategies, as utilized by the nurses themselves to deal with compassion fatigue. This involved physical exercises, mindfulness, and getting enough rest, among other self-care activities that reduce stress and enhance emotional stability. These were linked to lessening degrees of compassion fatigue among the nursing population and underlined self-care as a crucial means to raise the threshold of resilience. As indicated by Figley (2002), the findings reveal an organizational imperative to facilitate the activity of self-care and resource or time availability for the nurses to conduct activities that restore their emotional resources.

Peer support also manifested itself as a good coping mechanism in the current study. According to the nurses, informal support from colleagues provided them with an opportunity to deal with the emotional demands of the job, which is consistent with other studies indicating the importance of social support networks in mitigating compassion fatigue (Stamm, 2010). Peer support allows the nurses to share experiences, express their emotions, and get emotional validation from others who understand the challenges of the profession. This kind of social support becomes particularly important in the high-stress environment where caring for patients can be emotionally overwhelming.

Some of the nurses in this study also reported using emotional detachment as a coping mechanism, which involves separating themselves emotionally from patients to avoid being overwhelmed by their suffering. While emotional detachment may provide short-term relief, it can have negative long-term effects, including decreased empathy and a reduction in the quality of patient care (Aycock & Boyle, 2009). This raises concerns about the long-term consequences of detachment as a coping mechanism and highlights the importance of balancing empathy with self-care and emotional boundaries.

Furthermore, professional development emerged as an important factor in building resilience against compassion fatigue. Nurses who participated in the resilience and stress management workshops had improved coping strategies and a low level of compassion fatigue. This is consistent with the previous research that found training programs on emotional resilience and the management of stress significantly reduced burnout and compassion fatigue among health professionals (Lombardo & Eyre, 2011). These include mindfulness techniques, emotional intelligence, and problem-solving skills, among others, which are part of training programs that would arm nurses with ways of managing the emotional challenge. Institutional Interventions In this study, the effectiveness of institutional interventions was supported through Employee Assistance Programs and resilience workshops. Nurses who had access to EAPs and counseling services reported better emotional well-being and lower levels of compassion fatigue. These

findings are therefore in agreement with earlier studies, which have established that psychological support programs, indeed, reduce burnout and emotional distress among health workers (Kelly & Runge, 2015). EAPs provide confidential counseling and emotional support, enabling nurses to express their emotional needs freely without any potential stigma or judgment.
The study also indicated that the resilience training workshops provided by health organizations were effective in helping the nurses to build their coping strategies and emotional resilience. These nurses after attending the workshops showed that they were confident to cope with the emotional demands of the job and showed a greater sense of emotional control. These findings are supported by research done by Stamm (2010), who noted that resilience training equips nurses to better handle stress and decreases the risk of compassion fatigue. Institutions that invest in resilience training provide their staff with the tools necessary to thrive in emotionally demanding roles and reduce the likelihood of burnout.

Finally, sufficient staffing emerged as a very critical factor in preventing compassion fatigue. It was observed in this study that institutions that were sufficiently staffed had fewer compassion fatigue cases among their nurses. A finding of this nature enhances the necessity of healthcare organizations to make staffing adequacy part of their strategy to reduce emotional exhaustion and improve nurse retention. A few studies confirm that proper staffing would enhance quality care but, at the same period, diminish the emotional strain put on nurses to improve their general well-being (Aycock & Boyle, 2009; Hunsaker et al., 2015).

Policy and Practice Implications
The findings of the current study have major implications for nursing practice and health care policy. Compassion fatigue represents one of the major factors affecting nurses' well-being and quality of care provided to patients, particularly in a highly stressful working environment. This study identified that addressing compassion fatigue is multilevel; it ranges from an individual approach to organizational support and health care system levels.
Health care institutions, therefore, have to build a supportive work environment through access to counseling services, peer support, and resilience training programs. Such interventions will help the nurse build emotional resilience and hence better cope with the stress associated with the work. In addition, organizational factors like staffing and shift length also play a major role in the prevention of compassion fatigue. Adequate staffing prevents overworking the nurses, who can give quality care to their patients without burning out a nurse's emotional life.
This study therefore provides an overview of the prevalence, risk factors, coping mechanisms, and institutional interventions concerning compassion fatigue among nurses. Health organizations can reduce the effects of compassion fatigue and promote the well-being of their nursing staff through specific strategies and interventions, which will improve nurse retention and, in turn, patient care.

Conclusion
Compassion fatigue is a persistent challenge in nursing, particularly amidst high demands. This paper presents an in-depth review of the prevalence of this condition, its underlying causes, coping mechanisms, and the effectiveness of interventions taken to mitigate it. The study findings show that compassion fatigue is indeed a multi-faceted problem situated within individual, demographic, and organizational aspects; hence, holistic solutions have to address all these intertwined dimensions.

Key Findings and Contributions

Prevalence and Demographics: Compassion fatigue is highly prevalent among nurses, especially for those working in high-stress departments and longer shifts. Again, the longer one serves, the greater the risk due to accumulated exposure to emotionally distressing situations.

Impact on Well-being and Patient Care:

Compassion fatigue has an emotional toll on nurses that, apart from affecting their mental and physical health, also compromises the quality of care provided to the patients. Emotional exhaustion and burnout reduce empathy and attentiveness, negatively impacting patient outcomes.

Effectiveness of Coping Strategies:

The individual coping strategies, such as self-care practices, peer support, and professional development, became important tools in managing compassion fatigue. However, emotional detachment as a coping mechanism requires careful consideration because it may have the potential to erode empathy and quality of care over time.

Role of Institutional Support:

Organizational interventions, like resilience training, EAPs, and proper staffing, significantly reduce compassion fatigue. Supportive work environments enhance emotional resilience and decrease the risk of burnout.

Practical Implications

The findings of this study underscore the importance of implementing evidence-based interventions to contribute to combating compassion fatigue. Healthcare organizations should be proactive by:

- Providing access to counseling and peer support networks.
- Conducting regular workshops on resilience and stress management.
- Ensuring adequate staffing levels to prevent overwork.
- Promote a well-being and self-care culture among nursing staff.

Future Research Directions

The present study has provided key insights, but further research will be needed to understand the longer-term impacts of compassion fatigue interventions and how they can be scaled up across diverse healthcare settings. Future studies might examine how emerging technologies, including digital health, could help nurses cope with stress and emotional exhaustion.

Compassion fatigue is inevitable in the caregiving profession, yet not unsurmountable. Building resilience, encouraging self-care, and establishing supportive institutional frameworks are ways in which the nursing profession can respond to this challenge and ultimately improve the well-being of nurses and the quality of care provided to patients. Healthcare systems that invest in the fight against compassion fatigue will be improving the lives of their nurses and building a better foundation for compassionate, high-quality healthcare.

Reference

1. Abendroth, M., & Flannery, J. (2006). Predicting the risk of compassion fatigue: A study of hospice nurses. *Journal of Hospice and Palliative Nursing, 8*(6), 346–356. https://doi.org/10.1097/00129191-200611000-00008
2. Adams, R. E., Boscarino, J. A., & Figley, C. R. (2006). Compassion fatigue and psychological distress among social workers: A validation study. *American Journal of Orthopsychiatry, 76*(1), 103–108. https://doi.org/10.1037/0002-9432.76.1.103

3. Cocker, F., & Joss, N. (2016). Compassion fatigue among healthcare, emergency, and community service workers: A systematic review. *International Journal of Environmental Research and Public Health, 13*(6), 618. https://doi.org/10.3390/ijerph13060618
4. Hunsaker, S., Chen, H. C., Maughan, D., &Heaston, S. (2015). Factors that influence the development of compassion fatigue, burnout, and compassion satisfaction in emergency department nurses. *Journal of Nursing Scholarship, 47*(2), 186–194. https://doi.org/10.1111/jnu.12122
5. Joinson, C. (1992). Coping with compassion fatigue. *Nursing, 22*(4), 116–121.
6. Morrison, L. E., & Joy, J. P. (2016). Secondary traumatic stress in the emergency department. *Journal of Advanced Nursing, 72*(11), 2894–2906. https://doi.org/10.1111/jan.13030
7. Ruiz-Fernández, M. D., Pérez-García, E., & Ortega-Galán, Á. M. (2020). Quality of life in nursing professionals: Burnout, compassion fatigue, and self-compassion. *International Journal of Environmental Research and Public Health, 17*(4), 1253. https://doi.org/10.3390/ijerph17041253
8. Schmidt, M., & Haglund, K. (2017). Debrief in emergency departments to improve compassion fatigue and promote resilience. *Journal of Trauma Nursing, 24*(5), 317–322. https://doi.org/10.1097/JTN.0000000000000315
9. Sinclair, S., Raffin-Bouchal, S., Venturato, L., Mijovic-Kondejewski, J., & Smith-MacDonald, L. (2017). Compassion fatigue: A meta-narrative review of the healthcare literature. *International Journal of Nursing Studies, 69*, 9–24. https://doi.org/10.1016/j.ijnurstu.2017.01.003
10. Stamm, B. H. (2010). The concise ProQOL manual. *ProQOL.org*. Retrieved from https://www.proqol.org
11. Thompson, B. L., & Waltz, J. (2008). Self-compassion and PTSD symptom severity. *Journal of Traumatic Stress, 21*(6), 556–558. https://doi.org/10.1002/jts.20374
12. Van Mol, M. M. C., Kompanje, E. J. O., Benoit, D. D., Bakker, J., & Nijkamp, M. D. (2015). The prevalence of compassion fatigue and burnout among healthcare professionals in intensive care units: A systematic review. *PLoS One, 10*(8), e0136955. https://doi.org/10.1371/journal.pone.0136955
13. Yoder, E. A. (2010). Compassion fatigue in nurses. *Applied Nursing Research, 23*(4), 191–197. https://doi.org/10.1016/j.apnr.2008.09.003