



Relationship Between Burnout and Mental Health in Nurses Working in Intensive Care Unit

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Abstract

Burnout affects all varieties of healthcare professionals, but it is especially prevalent in those who provide care for seriously ill patients. Burnout is caused by an imbalance between an employee's personal traits and workplace problems or other organizational factors. Numerous negative effects are linked to it, such as higher rates of job turnover, lower patient satisfaction, and lower levels of care quality. Additionally, it has a direct impact on the physical and mental health of the large number of critical care doctors, nurses, and other healthcare professionals who work around the world. Nursing practice is complex, as nurses are challenged by increasingly intricate moral and ethical judgments. The purpose of this research was to examine the relationship between burnout and mental health in a group of intensive care unit nurses. A sample of 46 female nurses working in intensive care unit in the age range of 25-40 years was collected from Jammu city. Burnout assessment tool and mental health continuum-short form were used as tools. Results indicated significant negative relationship between burnout and mental health in nurses.

Keywords: Burnout, intensive care unit, mental health, nurses



Introduction

Burnout is a phenomenon that affects people with demanding jobs and those who provide care for others, including social workers, educators, and healthcare personnel. Nurses and physicians, in particular are subjected to significant levels of strain at work. The concept of burnout was first described by Freudenberger (1974). He described the state of burnout in the workplace as “becoming exhausted by making excessive demands on energy, strength, or resources” (Freudenberger, 1974). The features of burnout indicate the cumulative negative consequences of long-term work-related stress and fatigue (Golonka et al., 2017). Chronic tension can result in fatigue, psychological distress, or bodily distress. Burnout may also raise the possibility of medical errors and lower job satisfaction, both of which encourage early retirement (Maslach, Schaufeli and Leiter, 2001). Burnout is the other problem in nursing practice that could result in absenteeism, low energy and low nursing care efficiency.

Nursing is a stressful profession. Due to the nature of the work, employees are directly exposed to a variety of working environments and conditions, which can cause anxiety and depression. In addition to some general signs, there is a growing body of research on stress in nursing. For instance, data on occupational mortality from the early 1980s showed that female nurses had a significantly higher suicide rate than the general population (Gold, 1985). Intensive care unit nurses have been shown to experience high levels of stress (Chang et al., 2007) One of the factors contributing to the rise in psychological morbidity among working people is burnout. Increased levels of stress and burnout among nurses have a significant negative impact on their effectiveness and productivity, resulting in poor patient care, decreased job satisfaction, higher nurse turnover rates, and higher patient health care costs (Mc Grath, Reid and Boore, 2003).

The link between burnout and mental health is more complicated. Burnout has been linked to increased anxiety, anger, and sadness, and there is some evidence that burnout can lead to mental disorders. However, another argument is that burnout is a type of mental disease in and of itself, rather than being a cause of it. Some of the study has focused on the difference between burnout and depression: burnout is job-related and situation-specific, whereas depression is universal and context-independent. Clinical burnout has been identified as the equivalent of work-related neurasthenia in other studies (Schaufeli & Greenglass, 2001).



Burnout is frequently confused with stress. Even though the symptoms may be relatively similar, there are several key differences. Burnout can be exacerbated by stress, however it is not the primary cause of burnout (Burisch, 2014). Although extended work hours, a heavy workload, or other factors may generate stress in workers, burnout is not always a possibility. In this paper, we examine this issue in a sample of nurses working in intensive care unit and propose the following hypothesis-There will be no relation between burnout and mental health in nurses working in intensive care unit.

Method

Participants

The present study comprised of 46 female nurses in the age range of 25-40 years. The sample was collected from a government hospital of Jammu city. The data was collected over a period of 3 weeks.

Instrument used

Burnout: To assess the level of burnout, the burnout assessment tool by Schaufeli, De-Witte and Desart, (2020) was administered. The BAT-C and BAT-S together make up the whole BAT of 33 elements. It is a self report measure with five option categories. The BAT-C comprises 23 items and measures the four core dimensions of weariness, mental distance, impaired emotional, and cognitive control, whereas the BAT-S contains 10 items and assesses the two supplementary aspects of psychological and psychosomatic symptoms. Internal consistency of .89 indicators (i.e., Cronbach's α) and test-retest reliability of the four subscales all contributed to the instrument's reliability .74 for the main symptoms and. For secondary symptoms, the score is .80. According to the multi-trait, multi-method model used in the study (Schaufeli, De-Witte and Desart, 2020) the tool is having good convergent and discriminant validity. This was illustrated by the latent correlations in the multi-trait, multi method model which ranged from-0.33 to 0.88 for the traits and 0.87 to 0.89 for the methods.

Mental Health: To assess the level of mental health, mental health continuum- Short form (MHC-SF) by Keyes, (2002) was administered. It is a self report measure with six option categories. Keyes developed the initial 14-item Mental Health Continuum-Short Form (MHC-SF;) in response to requests for a quick self-assessment tool that included the three



aspects of well-being: emotional, social, and psychological. The three-item emotional well-being subscale –EWB– is characterized in terms of positive affect/life satisfaction. For emotional well-being, psychological well-being, and social well-being, the internal consistency (Cronbach alpha) is .83, .83, and .74, respectively. The overall scale has a reliability of .89. The three-factor structure of the long and short form of mental health continuum has been confirmed in nationally representatives' samples of US adults (Gallagher, Lopez and Preacher, 2009) college students (Robitschek and Keyes, 2009) and adolescents between the ages of 12 and 18 (Keyes, 2009). Therefore, it has good validity.

Procedure

Data was collected individually using a cross-sectional design. Care was taken that doubling of data does not take place. Consent was taken from the participants before administering the test.

Statistical Method

Coding of two variables i.e. burnout and mental health was carried out by using SPSS version 20. Pearson correlation was calculated. The variables tested were burnout and mental health.

Result

The value of pearson correlation (r) for burnout and mental health is presented in the table. Results indicated significant negative relationship $r (-.306)$, $p < 0.05$ between burnout and mental health in nurses working in intensive care unit. Hence significant negative relationship existed between the two variables.



Table showing significant negative relationship between burnout and mental health

		burnout	Mental health
burnout	Pearson Correlation	1	-.306*
	Sig. (2-tailed)		.038
	N	46	46
Mental health	Pearson Correlation	-.306*	1
	Sig. (2-tailed)	.038	
	N	46	46

*. Correlation is significant at the 0.05 level (2-tailed).

Discussion

The aim of the present study was to find out the relationship between burnout and mental in nurses working in intensive care unit. The nurses were in the age range of 25-40 years. The main finding was that there was a significant negative relationship between burnout and mental health in the intensive care unit nurses Hence our hypothesis was not accepted. This is consistent with the existing research related to burnout and mental health. Kadkhodaei and Asgari (2015) showed that there was a strong correlation between mental health and burnout among their medical staff. The high prevalence of symptomatic samples and high prevalence of burnout in the dimension of self accomplishment, combined with the strong correlation between mental health and burnout all showed that care should be taken to improve the stressful conditions that employee face. Hence nurses appeared to be at a greater risk of burnout compared to other medical professionals.

Higher levels of burnout are significantly associated with higher levels of anxiety, stress, and depression symptoms. This was explained by (Stelnicki et al., 2021) in their research on nurses. Most of the nurses reported at least some symptoms of burnout and many reported clinically significant levels of burnout. Age and years of service were the only demographic variables that explained burnout rates. The participants reported clinically significant levels of burnout were significantly more likely than participants with no burnout to screen positive



for all mental disorders, but particularly for major depressive disorder. The results indicated by Shu-Ming and Anne (2001) explained that younger nurses (20-29 years of age), separated and divorced nurses, and staff who work full time in ICUs were the most prone to emotional exhaustion.

A study conducted by (Tajvar et al., 2015) reported experiencing high levels of occupational stress in their work environment intensive care unit of the hospital. High and moderate levels of occupational stress were experienced by 83.9% and 10.7% of ICU nurses, respectively. The prevalence of mental disorders, somatic symptoms, anxiety, social dysfunction, and depression were 58.9, 60.7, 62.5, 71.4, and 10.7%, respectively. There was a high prevalence of occupational stress among ICU nurses. There was a significant relationship between occupational stress and mental health. The findings showed that somatic symptoms had significant relationships with age and work experience. The results of this study showed that the nurses on the fixed night shift experienced higher levels of job stress than the nurses on the rotating shifts. Mental disorders in nurses who experienced high levels of stress were 11.3 times greater than those who experienced low levels of stress. Therefore, the probability that nurses who work in the ICU will have mental disorders can be increased by increasing the levels of stress. This finding is in agreement with the findings of a previous study that showed a strong relationship between the development of mental disorders and occupational stress among nurses (Revicki & May, 1989).

A study investigated by (Mallett et al., 1991) indicated indicated positive associations between burnout and occupational stress and between burnout and death anxiety, with a negative relationship between burnout and social support. Baruah et al., (2019) conducted a cross-sectional study to assess burnout among doctors, nurses, and paramedics working in a busy tertiary care teaching institute's emergency department. The relationship between demographics and factors that influence burnout was investigated. Burnout was influenced by working hours, length, and service status (permanent/contractual).

In a national cross-sectional study conducted by Hu et al., (2021) on 1122 doctors and 1289 nurses in mainland China, the degree of burnout and its associated factors among doctors and nurses in intensive care units was explored. Burnout was more common among those working in the general intensive care unit. Low exercise frequency, co-morbidities, working



in a high-quality hospital, having more years of experience, working more night shifts, and having less paid vacation days were all linked to burnout. Burnout was more common among those working in the general intensive care unit. Low exercise frequency, co-morbidities, working in a high-quality hospital, having more years of experience, working more night shifts, and having less paid vacation days were all linked to burnout.

It is important to note that organizational factors could have had a significant impact on the rise in burnout symptoms among ICU nurses. The ICU nurses' morale may have been negatively impacted by the already demanding work environment, the increase in workload, and the alteration in the organizational environment. These factors, along with a sense of isolation and resentment over the lack of social recognition of the work done by these medical professionals, frequently lead to difficult circumstances (Gordon, Magbee and Yoder, 2021).

Limitations

The result of this study should be interpreted with the following limitations in mind. Data was although collected from one of the government hospitals of Jammu city, but it was not representative of the whole population. A limitation of this study is that the number of nurses who participated in the study was relatively small. It is suggested that the association of these factors be investigated further in future studies. Hence it could have affected the result of the study. Though the reliability of the standardized scales used was adequate but the sole reliance on the self report measures is a methodological limitation.

Conclusion

Burnout makes people more vulnerable to melancholy, anxiety, sleep disturbances, substance abuse, marital issues, early retirement, and even suicide (Dewa et al., 2014). Because of the serious effects of burnout in healthcare professionals, it is critical to recognise and address this condition. Burnout is gaining a lot of attention since it has such a negative impact on physicians' well-being, institutions' performance, and patient outcomes (Morse et al., 2012). Medical errors, angry attitudes toward patients, and a challenging working environment can all result from burnout among healthcare professionals.



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The intensive care unit (ICU) is a demanding and tough work environment. Doctors and nurses are put in the position of having to make difficult decisions, deliver bad news, and deal with the emotional effect of dying patients and their families. These variables surely lead to stress and burnout among intensive care unit nurses and doctors (Divatia, 2014).

Burnout is a worldwide problem, but given the socioeconomic and cultural differences, as well as the individual and organizational elements that may be involved in India, it may differ from those reported in other countries. The use of empirical data on risk factors in Indian intensive care units can then aid in the development of strategies to address the issue



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