https://dspace.org/

Stress levels and sources of stress among bridging course nursing students at a private nursing education institution in Gauteng

Jonhson, Janis Jae

2019
https://hdl.handle.net/10539/29599
Johnson, Janis Jae (2019) Stress levels and sources of stress among bridging course nursing students at a private nursing education institution in Gauteng, University of the Witwatersrand, Johannesburg, <http://hdl.handle.net/10539/29599>

Downloaded from a DSpace repository. https://dspace.org/

STRESS LEVELS AND SOURCES OF STRESS AMONG BRIDGING COURSE NURSING STUDENTS AT A PRIVATE NURSING EDUCATION INSTITUTION IN GAUTENG

Janis Jae Johnson

A research report submitted to the Faculty of Health Sciences, University of the Witwatersrand, Johannesburg, in partial fulfilment of the requirements for the degree of Master of Science in Nursing

Johannesburg, 2019

DECLARATION

I, Janis Jae Johnson declare that this Research Report is my own, unaided work. All sources quoted have been indicated to the best of my ability by the use of complete referencing using the Harvard referencing style. This Research Report is being submitted for the degree of Master of Science in Nursing at the University of the Witwatersrand, Johannesburg. This report has not been submitted for any other degree or examination at any other University.

24/03/2019

_____ _____

Signature: Date:

Student Number : 1786616

Protocol Number : M180438

DEDICATION

This research study is dedicated to my daughter Isabella Johnson, to highlight the importance of lifelong learning, the pursuit of wisdom through knowledge and that education is a women's right and not a privilege.

ABSTRACT

Background: Stress experienced for many nursing students is considered as a necessary and integral part of their nursing journey however not all students are able to adequately identify, manage and deal with this stress. Existing literature also reveals that nursing students do indeed experience high levels of stress.

Purpose/Aim: The main aim of this study was to describe the stress levels, sources of stress and required support to reduce the stress of the bridging course nursing students at a private nursing education institution in Gauteng

Method: This study adopted a cross-sectional design. Data were collected using the Expanded Nurses Stress Scale medium version tool.

Data analysis: The data was captured on Microsoft excel, support was sought from a statistician for the design of the data capture sheet. The data were analysed by the researcher. Comparative statistics support was sought from a statistician.

Setting: Data was collected at a purposively selected Private Nursing Education Institution in Gauteng.

Main Findings:

The setting and population sample used in this study was unique and the findings of the data analysis differ greatly from other studies conducted on nursing students outside of South Africa.

The bridging course nursing students (n=136) at this private nursing education institution are highly stressed. The highest sources of their stress according to the ENSS medium version tool were Discrimination, death and dying, patients and their families, workload, conflict with physicians, and conflict with supervisors.

The Bridging course nursing students would like to be supported in managing their stress through Professional Stress Management, Adequate Staffing when on duty, Emotional Support and Academic Staff Support.

The findings of this study have answered the research question, by providing the current stress levels, sources of stress and what support is required to support the Bridging Course nursing students at the selected Private Nursing Education Institution in Gauteng.

Keywords: Stress, Stress levels, Nursing Students, Private Nursing Education Institution

ACKNOWLEDGEMENTS

I wish to express my gratitude and appreciation to the following people:

- To my lord and saviour Jesus Christ, thank you for always giving strength, guidance, wisdom, knowledge, understanding and the will to complete this degree.
- To my husband Riaan Johnson, thank you for being my pillar of strength, my support, and encouragement through this journey.
- To my daughter Isabella Johnson for always being patient and acknowledging that Mimi also has to go to university and do her school work.
- To my late father Roy Pillay, thank you for always believing in me.
- To my mother Alisha Pillay and my sister Karen Pillay for being my cheerleaders and biggest supporters.
- To my supervisor Ms. Lizelle Crous for all of her guidance, patience, and support. For her kinds words of encouragement when times were trying.
- To Dr. Sue Armstrong for always keeping me on the straight and narrow, for being honest, motivational and supportive.
- To Ms. Agnes Huiskamp for all of her assistance.
- To Prof Maree and assistant Prof Shelley Schmollgruber for allowing me in as a late registration for this degree, without you, this degree would not be possible.
- To my colleagues, Janice Losos, my HOD and my campus manager, thank you for your patience, encouragement, assistance, and kind words.

TABLE OF CONTENTS **Page**

DECLARATION **2**

DEDICATION **3**

ABSTRACT **4**

Background **4**
Purpose/Aim **4**
Method **4**
Data analysis **4**
Setting **4**
Main Findings **5**
Keywords **5**

ACKNOWLEDGMENTS **6**
CHAPTER 1 **11**
OVERVIEW OF THE STUDY **11**
1.1 Introduction **11**
1.2 Background of the Study **11-13**
1.3 Motivation and Rationale for the Study **13**
1.4 Significance of the Study **14**
1.5 Statement of the Problem **14**
1.6 Research Questions **15**
1.7 Purpose and Objectives of the Study **15**
1.8 Research Design and Method **15-16**
1.9 Research Setting **16**
1.10 Operational Definitions **16-17**
1.11 Summary **17**

CHAPTER 2 **18**
LITERATURE REVIEW **18**
2.1 Introduction **18**
2.2 Clarification of the concept Stress **18-19**
2.3 Types of stress **19-21**

2.4 Nature and Extent of Stress **22**
2.5 Sources of Stress **23**
2.6 Workplace stress in the health sector **24-25**
2.7 Prevention and management of Stress **25**
2.8 Stress in Nursing Education **26-27**
2.9 Costs Related to Stress in the Workplace **27-28**
2.10 Summary **28**

CHAPTER 3 **29**
RESEARCH METHOD **29**
3.1 Introduction **29**
3.2 Research Design and Method **29-30**
3.3 Research Setting **30**
3.4 Population **30-31**
3.5 Sample size and method **31**
3.6 Data Collection **31**
3.6.1 Data collection instrument **32**
3.6.2 Validity and Reliability **32-34**
3.6.4 Data collection procedure **34-35**
3.7 Data Analysis **35-36**
3.8 Ethical Considerations **36-37**
3.9 Summary **37**

CHAPTER 4 **38**
PRESENTATION AND DISCUSSION OF THE FINDINGS **38**
4.1 Introduction **38**
4.2 Findings **38**
4.2.1 Analysis of the Demographic data **38-39**
4.2.2 Analysis of the ENSS Tool **39-49**
4.2.3 Analysis of the two open-ended questions **50-51**
4.3. Discussion of the findings **52-56**

CHAPTER 5 **57**

INTRODUCTION, MAIN FINDINGS, CONCLUSION, LIMITATIONS, AND RECOMMENDATIONS **57**

5.1 Introduction **57**

5.2 Main Findings **57-59**

5.3 Limitations **69-61**

5.4 Recommendations **61**

5.4.1 Recommendations for Nursing Education **61-62**

5.4.2 Recommendations for nursing research **62-63**

5.4.3 Recommendations for nursing practice **63**

5.5 Conclusion **64-65**

REFERENCES **66-73**

ANNEXURES

Annexure 1: ENSS medium version tool **74-77**

Annexure 2: Guidelines for use of ENSS tool **72-82**

Annexure 3: Permission for use of ENSS tool **83-85**

Annexure 4: Information Letter **86-87**

Annexure 5: Wits Protocol Approval **88-89**

Annexure 6: Wits clearance certificate **90**

Annexure 7: Private NEI Approval **91-92**

Annexure 8: Private NEI Site Approval **93**

Annexure 9: Counsellor Assistance **94-96**

Annexure 10: Coding and Themes **91-108**

LIST OF TABLES

Table 1	**: Cronbach's Alpha coefficient scores**	**34**
Table 2	**: Demographic Data of respondents**	**39**
Table 3	**: Means Scores of the 9 Categories**	**40**
Table 4	**: Category I: Discrimination**	**41**
Table 5	**: Category A: Death and Dying**	**42**
Table 6	**: Category H: Patients and their Families**	**43**
Table 7	**: Category F: Workload**	**44**
Table 8	**: Uncertainty Concerning Treatment**	**45**
Table 9	**: Category B: Conflict with Physicians**	**46**
Table 10	**: Category E: Problems with Supervisors**	**47**
Table 11	**: D: Problems with Peers**	**48**
Table 12	**: C: Inadequate Preparation**	**49**
Table 13	**: Analysis of Open-Ended Question 1**	**50**
Table 13	**: Analysis of open-ended question 2**	**51**
Table 14	**: Spearman's Rho Correlation Coefficient**	**55**

CHAPTER 1
OVERVIEW OF THE STUDY

1.1 Introduction

This chapter provides an overview of this research study. In this chapter, we discuss the background, motivation, rationale, and significance of the study. The problem statement, purpose, objectives of the study and operational definitions are presented. A brief overview of the research design, research method setting and is given.

1.2 Background of the Study

Stress experienced for many nursing students is considered as a necessary and integral part of their nursing journey however not all students are able to adequately identify, manage and deal with this stress. (Örtqvist and Wincent, 2008) state that “stress affects individuals in different ways and is considered a cause of physical, emotional, and psychological ill health”.

For nursing students, the stress experienced in the workplace is unavoidable due to the nature of their nursing education programs. There are two aspects of every nursing student's education, the theoretical aspect, and the clinical aspect. The design of most nursing curriculums is such that nurses are first taught the theoretical aspect and then taught the relevant corresponding clinical component. They are then required to practice this learned skill in the workplace.

This can be very stressful as the nursing students often feel overwhelmed as they undertake their role and responsibilities in the workplace which has been reported in studies by (Pulido-Martos,

Augusto-Landa and Lopez-Zafra, 2012) and (Sheu, Lin and Hwang, 2002). Placement in the workplace is essential for students' socialization and development as well as their health and wellbeing (Laschinger and Grau, 2012); (Pulido-Martos, Augusto-Landa and Lopez-Zafra, 2012); (Edgecombe, Jennings and Bowden, 2013); (Chuan and Barnett, 2012) and (Gaberson and Oermann, 2010).

Nursing students have the added pressure of meeting the requirements of their nursing education program, their training regulation and scope of practice as set out by the South African Nursing Council (SANC). Most training courses require nursing students to work a minimum of 1000 clinical based hours over several disciplines. Moving through the different disciplines in the workplace is a challenge in itself as the nursing student is faced with a new environment within that specified discipline, which is unfamiliar in nature and filled with uncertainty.

(Meyer, Nel and Downing, 2016) states that “nursing students experience high levels of stress, due to rigorous academic and emotional demands when they begin to take responsibility for patient care. That stress decreases the nursing student’s ability to think critically and impacts on their experiences while in a nursing programme”.The stress nursing students are faced with during the movement through these different disciplines can be likened to that of starting a new job. (Lazarus and Folkman, 1984) defines stress as “a particular relationship between the person and the environment, appraised by the person, as taxing or exceeding his or her resources, and endangering his or her well-being”.

In a study by (Younas, 2016) an integrated literature review was conducted on the levels of stress and coping strategies used by nursing students in Asian Countries and stated that “four major themes namely: levels of stress, common stressors, coping strategies, association among stress, coping and the demographic variables emerged. Most of the studies reported that the nursing students

experience moderate stress levels and further concluded that a number of methodological limitations were found in the studies which indicate that the topic has not been adequately investigated". Therefore further research is needed to expand the literature on the topic.

In a study conducted by (Govender et al., 2015) in the KZN province, on Occupational Therapy student's experiences of stress and coping, they explored different coping mechanisms using The Ways of Coping Checklist. The study stated that "both problem-focused and emotion-focused coping was utilized by students".

In a study conducted by (Khamisa et al., 2015) in the Gauteng province consisting of two private and two public hospitals on the Work Related Stress, Burnout, Job Satisfaction and General Health of Nurses revealed that "there are gaps in research focusing on work-related stress, burnout, job satisfaction and general health of nurses which is evident within the contexts of a developing country like South Africa".

1.3 Motivation and Rationale for the Study

The researcher, as an educator at an institution of higher learning, has noticed that nursing students often don't identify, manage or deal with the stress that they experience in the workplace. Other than an employee wellbeing programme that addresses stress only upon request from the employee, no other existing systems or support structures are in place.

Therefore the researcher wanted to describe the stress levels, sources of stress and required support to reduce the stress of bridging course nursing students at a private nursing education institution in Gauteng.

1.4 Significance of the Study

There have been a few studies at this Private Nursing Education Institution with regard to stress however no literature was found on the stress levels, sources of stress and required support to reduce the stress of bridging course nursing students. The findings of this study will add to the body of knowledge of nursing, nursing education, educational and counselling psychology, occupational health and human resources management at the Private Nursing Education institution. Evidence and recommendations will be provided based on the findings of this research study in order to enhance the practice of nursing education and the nursing profession at large.

1.5 Statement of the Problem

Literature (Meyer, Nel and Downing, 2016); (Memarian, Vanaki and Baraz, 2015) and (Lim, Bogossian and Ahern, 2010) reveals that stress has been investigated among nursing students nationally and internationally. However no literature was found on the stress experienced by bridging course nursing students in South Africa. The reason that the bridging course nursing students have been selected for this study is due to the demographics of the group with regard to age, gender, the social and marital status which is very different in comparison to the typical nursing student that enters into nursing directly after completing school.

Therefore the stress levels, sources of stress and required support to reduce the stress of bridging course nursing students are not known in this private nursing education institution. An understanding of the stress levels, sources of stress and required support to reduce the stress of bridging course nursing students can assist in developing and implementing a stress management programme for these bridging course nursing students at this private nursing education institution.

1.6 Research Questions

The research question guided this study and informed the research method adopted.

What are the current stress levels, sources of stress and required support to reduce the stress of Bridging Course nursing students at a Private Nursing Education Institution in Gauteng?

1.7 Purpose and Objectives of the Study

The purpose of this study was to describe the stress levels, sources of stress and required support to reduce the stress of bridging course nursing students at a Private Nursing Education Institution in Gauteng.

- To describe the stress levels of bridging course nursing students at a Private Nursing Education Institution in Gauteng

- To describe the sources of stress of bridging course nursing students at a Private Nursing Education Institution in Gauteng

- To describe how the Private Nursing Education Institute can support nursing students in reducing their stress.

1.8 Research Design and Method

A quantitative approach was chosen which provided the researcher with objective data that demonstrated the measured levels of stress, sources of stress and required support to reduce the stress of bridging course nursing students at the Private Nursing Education Institution.

A cross-sectional design was selected for this study. In this study, the researcher used the Expanded Nurses Stress Scale see Annexure 1. Data was collected by means of a self-administered questionnaire namely the Expanded Nurses Stress Scale.

Two open-ended questions were added to the end of the tool to gain insight into the nursing student's perceptions of support related to stress and how they want to be supported in reducing their stress. A detailed description of the Research Design and Method is presented in chapter three of this research report.

1.9 Research Setting

Data were collected in a purposively selected Private Nursing Education Institution in Gauteng.

1.10 Definitions

Stress:
(Lazarus, 1966) defines stress as “a condition or feeling experienced when a person perceives that demands exceed the personal and social resources the individual is able to mobilize”.

(Lazarus and Folkman, 1984) states that “stress is a mental or physical phenomenon formed through ones cognitive appraisal of the stimulation and is a result of one’s interaction with the environment”.

Stress level: (Nursing Outcomes Classification, 2012) defines stress levels as “the severity of manifested physical or mental tension resulting from, factors that alter an existing equilibrium”.

Nursing student: in this Private nursing education institution nursing student refers to a student that is enrolled in the R683 first or second year bridging course programmes that will lead to registration as a general nurse with the South African Nursing Council (SANC).

Private nursing education institution: this refers to a Nursing Education Institution that is a private entity and has no affiliation with the government and provides nursing programmes accredited by the South African Nursing Council.

1.11 Summary

It is evident from the published literature that was consulted, that nursing students do experience stress. Stress affects their work and health negatively and there are many sources of stress for nursing students however not all nursing students are able to adequately identify, manage and deal with this stress.

In this chapter, a brief overview of the study related to the background, the motivation for conducting the study, statement of the problem, research question, purpose and objectives of the study, research design, method, and setting was provided. A description of the paradigmatic perspectives and operational definitions relevant to this study was also presented.

The next chapter will consist of a literature review related to different aspects considered relevant to the concept of Stress, types of stress, nature and extent of stress, sources of stress, stress in the workplace, prevention and management of stress and the costs related to stress.

CHAPTER 2
LITERATURE REVIEW

2.1. Introduction

This chapter presents the literature relevant to stress and addresses focus areas of stress.

2.2 Clarification of the concept Stress

It is important to clarify the concept of stress and enable us to make meaning of stress experienced by nursing students. Stress is very prevalent in nursing and many nursing students do experience stress however not all nursing students are able to adequately identify and deal with this stress as it has many definitions and each individual has their own definition of stress which is based on their personal perception of stress. This perceived stress is influenced by many factors that exist within the individual's life. (Lazarus and Folkman, 1984) define stress as "a particular relationship between the person and the environment, appraised by the person, as taxing or exceeding his or her resources, and endangering his or her well-being".

(Örtqvist and Wincent, 2008) states that "stress affects individuals in different ways and is considered a cause of physical, emotional, and psychological ill health". Hans Selye who is considered as the father of stress research, as early as 1936 defined stress in biological terms as "a non-specific response of the body to any demand of change". (Lazarus and Folkman, 1984) stated that "stress is a mental or physical phenomenon formed through ones cognitive appraisal of the stimulation and is a result of one's interaction with the environment".

The Oxford dictionary defines stress as a “state of mental or emotional strain or tension resulting from adverse or demanding circumstances”. The Merriam-Webster Online Dictionary, (2009) describes stress as “a physical, chemical, or emotional factor that causes bodily or mental tension and may be a factor in disease causation and a state resulting from stress is one of bodily or mental tension resulting from factors that tend to alter an existent equilibrium".

2.3 Types of Stress

In the pursuit to clarify the concept of stress, it is necessary to understand types of stress. Understanding the types of stress and how it manifests itself is important to be able to identify stressed nursing students and gain insight on how to identify, manage and support their stress.

The American Psychological Association (2015), states that “there are three types of stress: acute, episodic acute and chronic”.

“Acute stress – Acute stress is the most common form of stress. It comes from demands and pressures of the recent past and anticipated demands and pressures of the near future. Acute stress is thrilling and exciting in small doses, but too much is exhausting”.
The most common symptoms of acute stress are:

- Emotional distress
- Muscular problems
- Stomach, gut and bowel problems
- Transient over-arousal

“Episodic stress - There are those, however, who suffer acute stress frequently, whose lives are so disordered that they are studies in chaos and crisis. They're always in a rush, but always late. If something can go wrong, it does. They take on too much, have too many irons in the

fire, and can't organize the slew of self-inflicted demands and pressures clamouring for their attention. They seem perpetually in the clutches of acute stress".

The most common symptoms of episodic stress are:

- Extended over arousal

"Chronic stress – This is the grinding stress that wears people away day after day, year after year. Chronic stress destroys bodies, minds, and lives. It wreaks havoc through long-term attrition".

The most common symptoms of chronic stress are:

- Violence and or Fatal Breakdown
- Stroke or cancer
- Heart Attacks
- Depression and anxiety

In nursing, stress is experienced differently because nursing students have the added pressure of meeting the requirements of their nursing education program, their training regulation and scope of practice as set out by the South African Nursing Council (SANC). Most training courses require the nursing student to work a minimum of 1000 clinical based hours over several disciplines.

Moving through the different disciplines in the workplace is a challenge in itself as the nursing student is faced with a new environment within that specified discipline, which is unfamiliar in nature and filled with uncertainty. This uncertainty can cause either negative or positive stress.

As early as 1976, (Levi, 1976) was the first to distinguish between positive and negative stress. Selye defined "positive stress" as "eustress as opposed to distress". (Colligan and Higgins, 2005) state that "stress is divided into two categories: eustress and distress".

(Seyle, 1974) the founding father of stress states that “eustress refers to a positive response one has to a stressor, which can depend on one’s current feelings of control, desirability, location, and timing of the stressor”.

(Seyle, 1974) further states that “distress is the most commonly referred to as a type of stress, having negative implications, whereas eustress is usually related to desirable events in a person's life”.

Although we have two types of stress, namely eustress, and distress which have the same underlying construct and cannot be viewed in the same light as they produce two different outcomes. One must however not to be too quick to exclude that both of these types of stress could occur at the same time and could include each other (Simmons and Nelson, 2007).

Due to the immense pressure on nursing students, as they deal with the pressure of work and study, it could lead to either eustress or distress. If nursing students do not receive the support they need to, adequately identify, manage and deal with this stress, it may lead to impaired performance because of strong anxiety. A stressed nursing student can be very dangerous to both themselves and the patient and this can be seen with the number of disciplinary inquiries that students are faced with.

2.4 Nature and Extent of Stress

In recent years, many authors and publications have reviewed, explored and dissected stress, regardless of how well-documented stress is, it is still not very well understood. This is due to the multi-factorial nature of stress (Santamaria, 1994). We have embraced evolution and the 4th industrial revolution, humans have been exposed to greater workplace demands, job insecurity due to fragile economic conditions, and migration of skilled workers due to globalization. Stress has become a global phenomenon and has taken the workplace by storm.

A lot of focus and energy is put into stress management however it is not very effective in most cases and fails to provide adequate support and management of stress as a whole. This is evident in the private nursing education institution which the researcher has purposely selected for this study, all that they have in place is a referral and contact system for an employee wellbeing programme.

A stressed nurse can negatively impact the bottom line of the business which is patient care. The (International Council of Nurses Code, 2012) Code of Ethics for Nurses, states that “nurse promotes, advocates for, and protects the rights, health, and safety of the patient, but stress can have a negative impact on the quality of patient care”.

Unlike a disease that targets one specific organ or system in the body, stress affects the entire body and has devastating effects on one’s health. (Stress & Stress Management, 2010).

2.5 Sources and Effects of Stress

As early as 1981 (Gray-Toft and Adderson, 1981) stated that their focus was specifically on ‘stressful situations for nurses that affect their work performance, when they developed the Nursing Stress Scale (NSS), identifying three sources of stress from the physical, psychological and social environment”.

Whereas (Stress & Stress Management 2010) argues that “people can experience stress from four main sources: The Environment (weather, noise, traffic, pollution, crowding, unsafe place for living), Social (stressors associated with the different social roles, such as a spouse, parents, caregiver or employee. Moreover, stress can cause loss of a loved one, divorce, deadlines, financial problems, job interviews, co-parenting or disagreements), Physiological (Illness, aging, giving birth, rapid growth of adolescence, menopause, accidents, lack of exercise, poor nutrition, and sleep disturbances), Thoughts (Some situations in life are stress provoking)”.

Nurses face many stresses at work and it is often directly related to the workplace. (Sveinsdottir, Biering and Ramel, 2006) states that “a lack of support from colleagues and superiors and less satisfaction with the head nurses contributed significantly to the appearance of stress”.

According to (Bickford, 2005), which states that “human natural response to stress may cause physical and mental harm. Stress can be associated with negative emotions and vulnerability, hyperactivity of the autonomic nervous system, high hormonal base levels and psychosomatic symptoms”. (Sheu, Lin and Hwang, 2002) stated that “a high level of occupational stress is related to workload and responsibility”. As discussed in the background, nursing students have a great responsibility and immense pressure as the workplace is also their place of study.

2.6. Workplace Stress in the healthcare sector

The concept of stress as discussed above focuses a great deal on the workplace and the effects of workplace stress on the nursing student. The International Labour Organization (ILO) states that “stress is the harmful physical and emotional response caused by an imbalance between the perceived demands and the perceived resources and abilities of individuals to cope with those demands”.

For nursing students, the stress experienced in the workplace is unavoidable due to the nature of their nursing education programs as mentioned in the background. Nursing students have to work and study simultaneously and often juggling the demands of studies and the pressure of work can have a very negative effect on the nursing student's health and wellbeing.

The workplace can be a very demanding and taxing environment, especially in the private sector as the customer is the patient and there is immense pressure to deliver quality nursing care. Often the stress experienced by nursing students in the workplace is perceived as overwhelming and interferes with their ability to cope.

Nursing students are often unaware that they are stressed and do not have the ability to adequately identify when they are stressed or what is causing their stress. Nursing student's absenteeism rates are very high due to illness and these illnesses could often brought on by unidentified stress.

More often than not, nursing units are understaffed and under resourced and it is a sad reality that nursing students are often given a large number of patients to nurse which impacts negatively on clinical teaching and learning.
(Kohler et al., 2006) refers to stress as “a dynamic interaction between the individual and the environment. In this interaction, demands,

limitations, and opportunities related to work may be perceived as threatening to surpass the individual's resources and skills”.

2.7 Prevention and Management of Stress

(Lazarus and Folkman, 1984) states that coping is "constantly changing, cognitive and behavioural efforts, aimed to master specific external and internal expectations, evaluated by a person as aggravating or exceeding his/her resources".

(Satpathy and Mitra, 2015) states that “work-related stress is one of the most important issues in many countries and in different kinds of workplaces. Stress has many negative impacts, including circulatory, gastrointestinal diseases, other physical problems, psychosomatic and psychosocial problems, and low productivity. Increasing emphasis is being placed on improving working conditions, work organization with respect to stress at work, and on practical measures to cope with stressful work situations”.

In order to be able to prevent and manage stress in nursing students, it is necessary to establish levels of stress, identify sources of stress and understand what nursing students need in order to support them in managing their stress. There have been several international studies on this topic however there have not been many studies conducted in South Africa.

2.8 Stress in Nursing Education

Nursing education is robust and rigorous. Educators are faced with nursing students that have to both study and work simultaneously. This in itself brings a lot of stress for both the nurse educator as well as the nursing student. More often than not nursing students enter the profession and underestimate the shifts, roles and responsibilities and the nature of nursing which can bring on added stress.

While mild levels of stress can act as a motivating factor to complete work, achieve results and meet deadlines, higher stress levels accompanied by ineffective coping mechanisms can result in effects such as anxiousness, defeat and severe tension. This is over and above the stress that nursing students already experience from the challenging curricula, demanding coursework, complex materials and stress that is experienced during clinical placement (Clark, Nguyen, and Barbosa-Leiker, 2014).

As early as 1998 (Cooper, 1998), stated that “difficulties in coping with stress combined with psychological or emotional instability could lead to violence and there are several studies supporting that the healthcare workers, specifically nurses and clinic personnel are especially affected by the risk of physical violence, particularly in the emergency rooms” which is a source of stress that still exists today.

(Jones et al., 2003) states that “stress can have a significant impact on individual nurses and their ability to accomplish tasks, more specifically poor decision making, lack of concentration, apathy, decreased motivation and anxiety may impair job performance creating uncharacteristic errors”.

(Grumbach, 2006) states that “nursing is often seen a less attractive on some important occupational characteristics such as job independence and nursing image”. Due to the poor professional image of nursing and the low confidence that the South African public has in Nursing, stress in Nursing Education needs to be managed effectively in order to preserve the few nursing students that register for nursing programmes.

2.9 Costs Related to Stress in the Workplace

In a recent report from the International Labour Organization, it stated that “ work-related stress, major depression, burnout and anxiety disorders are costing South Africa’s economy an estimated R40.6 billion a year, equivalent to 2.2 percent of the gross domestic product”, in comparison to an R3 billion cost in 2012, reported by business live the amount has increased by almost R37.6 billion and seeing that there isn’t any published data of 2018, one can only imagine what the cost is sitting at. This is according to Dr. Renata Schoeman, board member of the Psychiatry Management Group (PsychMG), Dr. Renata further states that “Companies should play a leading role in alleviating and eradicating possible stressors at work”.

Dr. Renata further states that “they should foster a healthy educational environment with pro-active mental health awareness programmes, stress management training, access to services which nurture help-seeking behaviour, implement a coaching or counselling programme, identify people in need of care and offer them resources to ensure proper treatment”.

This is evidence that stress in the workplace is not being managed effectively and is costing the economy billions. Stress more often than not leads to depression and in a (2016) study spanning diverse cultures and gross domestic product (GDP) ranges, Dr Sara Evans-Lacko and Prof Martin Knapp from the London School of Economics and Political Science reported that “depression was collectively costing the nations of Brazil, Canada, China, Japan, South Korea, Mexico, South Africa, and the US more than $246-billion a year”.

2.10 Summary

In this chapter, the literature review was presented. The Researcher critically reviewed stress using published literature from a variety of databases and the following related to Stress was discussed and presented: Clarification of the concept stress, Types of stress**,** Nature and Extent of Stress, Sources and Effects of Stress, Workplace stress in the healthcare sector, Prevention and Management of Stress, Stress in Nursing Education, and Costs Related to Stress in the Workplace.

The literature has revealed that Stress is very prevalent in the workplace and that nursing students are exposed to this stress due to the nature of the profession and requirements of their programmes. It is also evident from the literature that Stress has a major impact on the entire body and that it can lead to many complications in the body. It has been highlighted that management of stress and its complication in the workplace is vital to prevent billions of Rand being spent yearly to manage the effects.

CHAPTER 3
RESEARCH METHOD

3.1 Introduction

In this chapter, the researcher will present and discuss the research design and method, the research setting, population and sampling, data collection and data analysis of this study as well as the validity and reliability and the ethical considerations relevant to the study.

3.2 Research Design and Method

A quantitative approach was chosen which provided the researcher with objective data that demonstrated the measured levels of stress, sources of stress and required support to reduce the stress of nursing students at the selected Private Nursing Education Institution in Gauteng. The quantitative research design method is a formal, objective, rigorous systematic process for generating information for the world, to describe life experiences and give them significance (Burns and Grove, 2009:24).

A cross-sectional design was selected for this study. Setia (2016) states that “in a cross-sectional study, the investigator measures the outcome and the exposures in the study participants at the same time. Unlike in case-control studies (participants selected based on the outcome status) or cohort studies (participants selected based on the exposure status), the participants in a cross-sectional study are just selected based on the inclusion and exclusion criteria set for the study". This research design was deemed to be the most suitable design to describe the stress levels, sources of stress and required support to reduce stress among bridging course nursing students at a private nursing education institution in Gauteng.

Quantitative content analysis was also chosen to analyse the two open-ended questions on the questionnaire, how do you perceive stress and how do you want to be supported in managing your stress? (Krippendorff, 1980) states that “quantitative content analysis is a research method for making replicable and valid inferences from data to their context, with the purpose of providing knowledge, new insights, a representation of facts and a practical guide to action”.

3.3 Research Setting

Data were collected in a purposively selected Private Nursing Education Institution in Gauteng. This institution educates an estimated number of 400 students per annum and currently offers the Bridging Programme 1st and 2nd year, enrolled nurse upgrade programme, post-basic nursing programs, in-service certificates, and short courses.

3.4 Population

Nursing students registered for the Bridging Course for Enrolled Nurses leading to registration as a general nurse first and second year students were chosen for this study. The course is offered under Regulation 683 of the South African Nursing Council (SANC).

Grove et al. (2013: 44) define population as “all the elements that meet certain criteria for inclusion in a given universe.” According to Brink et al. (2012) sampling refers to “the researchers' process of selecting the sample from a population in order to obtain information regarding a phenomenon in a way that represents the population of interest”.

Grove et al (2013: 44) states, "A sample is a subset of the population that is selected for a particular study, and sampling defines the process

for selecting a group of people, events, behaviours, or other elements with which to conduct a study".

The total population of all first and second year bridging course for enrolled nurses leading to registration as a registered nurse was N=168.

3.5. Sample size and Method

The total population (N=168) was included in the study at the selected private nursing education institution. Group 1 consisted of 72 respondents of which 71 participated in the study and group two of 96 respondents of which 94 participated in the study.

The realized sample size was n=136. This was due to 29 respondents being removed from the study due to missing responses which were greater than 50 % of the respective subscales as directed by the instructions of the ENSS tool developers, see Annexure 2. This gives a final response rate of 82%.

Exclusion criteria: Nursing students that were not enrolled for the first or second year Bridging Programme course leading to the registration as a general nurse with South African Nursing Council were excluded from the study.

3.6 Data Collection

Data for this study was collected using a self-administered questionnaire at the private nursing education institution on a preselected day when the bridging students were on campus.

3.6.1 Data collection instrument

A self-administered questionnaire was used for this purpose namely the Expanded Nursing Stress Scale with two open ended questions added to the tool. This tool measures sources and levels of stress perceived by nurses.

The tool consisted of 57 items and 9 subscales namely,

- Death and Dying - items 1,9,17,27,37,47 and 53
- Conflict with physicians - items 2, 10, 28, 38, 48
- Inadequate preparation - items 3, 11, and 19
- Problems with peers - items 4, 12, 20, 21, 22, and 50
- Problems with supervisors - items 5, 30, 31, 40, 46, 49 and 54
- Workload - items 13, 23, 32, 41, 42, 45, 51, 55 and 57,
- Uncertainty concerning treatment - items 6, 14, 18, 24, 29,33,36 39 and 43
- Patients and their families - items 7, 15, 25, 34, 35, 44, 52 and 56
- Discrimination - items 8, 16 and 26

3.6.2 Validity and Reliability of the Tool

The Expanded Nurses Stress Scale tool is an open online source. The tool has been used in numerous studies and has been validated therefore no pre-test was conducted for this study.

According to an empirical study of the Expanded Nursing Stress Scale, it is revealed that “the study of work-related stress among nurses, the Nursing Stress Scale (NSS) is the best known and most widely used scale. The validity and reliability findings are based on a random

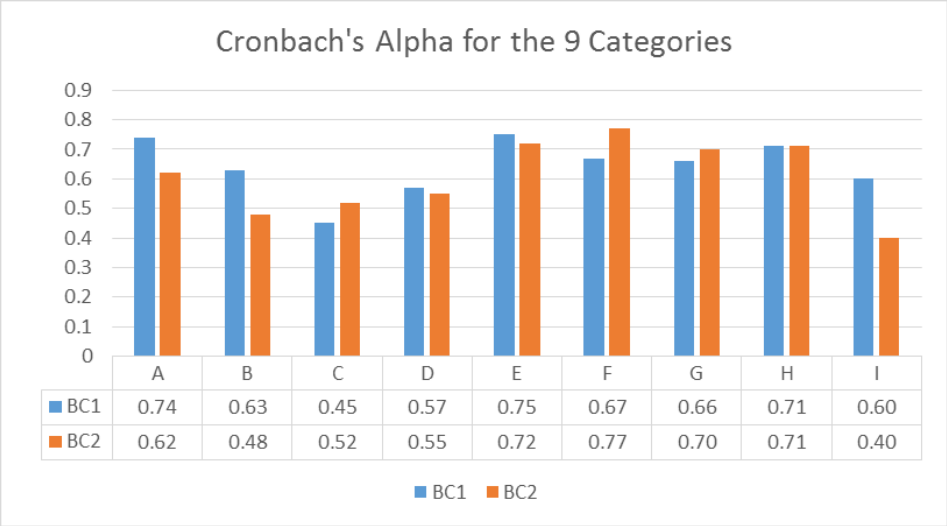
sample of 2,280 nurses in Ontario working in a wide range of work settings. Pre-tests for the study indicated that an expanded version of the NSS was necessary in order to adequately measure sources of stress among nurses.

The sources of stress comprised nine sub scales as discussed above. Confirmatory factor analyses, run on two randomly selected halves of the sample, came close to meeting standard criteria levels. The alpha coefficients of eight of the subscales were .70 or higher, and concurrent and construct validity assessments provided strong support for the expanded NSS".
Cronbach's Alpha was developed by Lee Cronbach in 1951. It is used to measure the internal consistency of a test or a scale and can be expressed as a value between 0-1.

The medium version of the ENSS tool was used in this study and comprised of 57 items and 9 subscales. The vast difference in the population used in this study in comparison to the population used in the study described above warranted that the Cronbach's Alpha coefficient was calculated specifically for this study.

The BC1 group returned a Cronbach's Alpha of *a*=0.88 and the Bc2 Group returned *a*=0.91 which indicates high internal consistency. The Cronbach's was further calculated per group per subscale and averaged to compute a total Cronbach's Alpha per subscale. Cronbach's Alpha coefficient per group per subscale is presented in the table below.

Table 1: Cronbach's Alpha coefficient scores per group



	A	B	C	D	E	F	G	H	I
BC1	0.74	0.63	0.45	0.57	0.75	0.67	0.66	0.71	0.60
BC2	0.62	0.48	0.52	0.55	0.72	0.77	0.70	0.71	0.40

3.6.3 Data Collection Procedure

A period for data collection was negotiated with the campus manager at the site and approval was granted. All Bridging course nursing students present on the two separate days of data collection was approached to participate in the study.

Prior to data collection, the researcher was allowed the opportunity to present the study to the sample population following which an information and invitation to participate letter explaining the process of the data collection was given to all nursing students in the sample population present on the day of data collection.

The data were collected over two days, one day for the bridging course 1 student's during the week that they were at campus and one day for the bridging course two students during the week that they were at campus. Collecting the data on two different days eliminated the risk of mixing data of the two groups, and it allowed for better control excluding the possibility of duplicate submissions.

Questionnaires were distributed to all nursing students in the sample population present on the day. The respondents who had completed the Questionnaires then posted it into one of the two data collection boxes strategically positioned in the venue. The data collection boxes were labelled according to the BC group that the data was being collected from. After the last respondent posted their questionnaire, the two boxes were then sealed and removed from the venue by the researcher which ensures that the boxes were not tampered with. Two new boxes were then used during the next data collection day and the above process repeated.

3.7 Data analysis

The data was captured on Microsoft Excel which provided sufficient tools to analyse the data. The data capture spreadsheet was drawn up by the researcher. The data were analysed by the researcher and descriptive analysis was carried out to determine means, frequency, and standard deviation.

Spearman's rank order was used to determine the correlation between the two groups. Reliability was measured using the Cronbach's Alpha coefficient which was guided by the published guidelines for use of the Expanded Nurses stress scale.

The two open-ended questions were subjected to quantitative content analysis in order to analyze the data collected from the questions. The findings were grouped together and basic stats were used to describe the data. The 1st and 2nd year bridging student’s data was compared and significant differences were identified.

Spearman's Rho Correlation Coefficient was chosen to analyse the association and relationship between the two groups of nursing students. In statistical terms, correlation is a method of assessing a

possible two-way linear association between two continuous variables (Altman and Bland, 1983).

By using Spearman's Rho, the correlation coefficient between the two groups is measured, which gives an indication of the linear relationship that exists between the two groups. The independent variable between the two groups is the year of study due in relation to exposure of the nursing environment.

(Mukaka, 2012) states that “correlation coefficient of zero will give an indication that no linear relationship exists between the two groups. Where a correlation coefficient of (−1) or (+1) indicates that a very high linear relationship exists. The strength of the relationship can be anywhere between −1 and +1. The stronger the correlation, the closer the correlation coefficient comes to ±1. If the coefficient is a positive number, the variables are directly related”.

3.8 Ethical Considerations

Participation in the study was voluntary and nursing students could withdraw from the study at any point without penalty. An information and invitation to participate letter (Annexure: 4) was given to nursing students after the presentation on the study was done. To ensure anonymity and confidentiality of the respondents no identifying data was used in data collection or reporting.

The researcher has no supervisory role with the selected nursing students as the researcher is based at a different campus belonging to the same Private Nursing Education Institution in Gauteng.

All data was coded to ensure anonymity and was made available only to the researcher and the supervisor. This research report does not reflect any information that can identify individuals involved.

The following ethical requirements were taken into consideration:

- Approval from the University Postgraduate Committee for assessment to conduct the study was obtained (Annexure:5)
- Approval from the Human Research Ethics Committee (Medical) of the University of the Witwatersrand was obtained (Annexure:6)
- Approval from the Research Committee of the selected private nursing education institution for permission to conduct the study was obtained (Annexure:7)
- Approval for permission to conduct research at the selected site was obtained (Annexure:8)

Non-maleficence was ensured by ensuring that the respondents and their academic progress or work-related progress was not be affected by participating in the study and the researcher ensured that no harm came to them during participation in the study.
Due to the nature of the study, in the event that the nursing students participation in the study triggered any observed trauma or emotional distress, a counsellor (Ms. Agnes Huiskamp) agreed to assist with any necessary counselling should the need have arisen (Annexure: 9).

3.9 Summary

In this chapter the researcher presented and discussed the: research design and method, the research setting, population and sampling, data collection and data analysis of this study. In addition to this, the researcher also presented and discussed the validity and reliability as well as the ethical considerations relevant to this study.

In the next chapter, the findings of the study will be presented and discussed.

CHAPTER 4
PRESENTATION AND DISCUSSION OF THE FINDINGS

4.1 Introduction

This chapter describes the findings of the data collected from respondents participating in the study of stress amongst bridging students at private nursing education institution in Gauteng.

The findings of the descriptive analysis, Spearman's Rank order correlation between the two groups as well as the quantitative content analysis carried out on the two open-ended questions added to the 57 item expanded nursing Stress Scale medium version will be presented.

The ENSS tool consisted of 9 categories (A-I) in relation to stress as discussed in chapter 3. The findings of these categories will provide an answer to the first two objectives of the study.

The mean scores obtained from the 9 categories ranged from (3.45 - 2.78) all of which have fairly high mean scores. The higher the mean score, the higher the relation to stress. (French et al., 2000).

4.2 Findings

4.2.1. Analysis of the Demographic data

Nursing students enrolled for the Bridging course leading to the registration as a general nurse with South African Nursing Council participated in the study. The demographic data are presented below.

Table 2: Demographic Data of respondents

Demographic Data		
Group	**BC1**	**BC2**
Respondents	64	72
Males	4	3
Married Males	1	1
Females	60	69
Married Females	20	23
Average Age	30 Years	25 Years
Age Range	(24-55) years	(24-47) Years
Average Work Experienc	5.4 years	5.6 Years
Work Experience Range	(3-14) Years	(4-17) Years

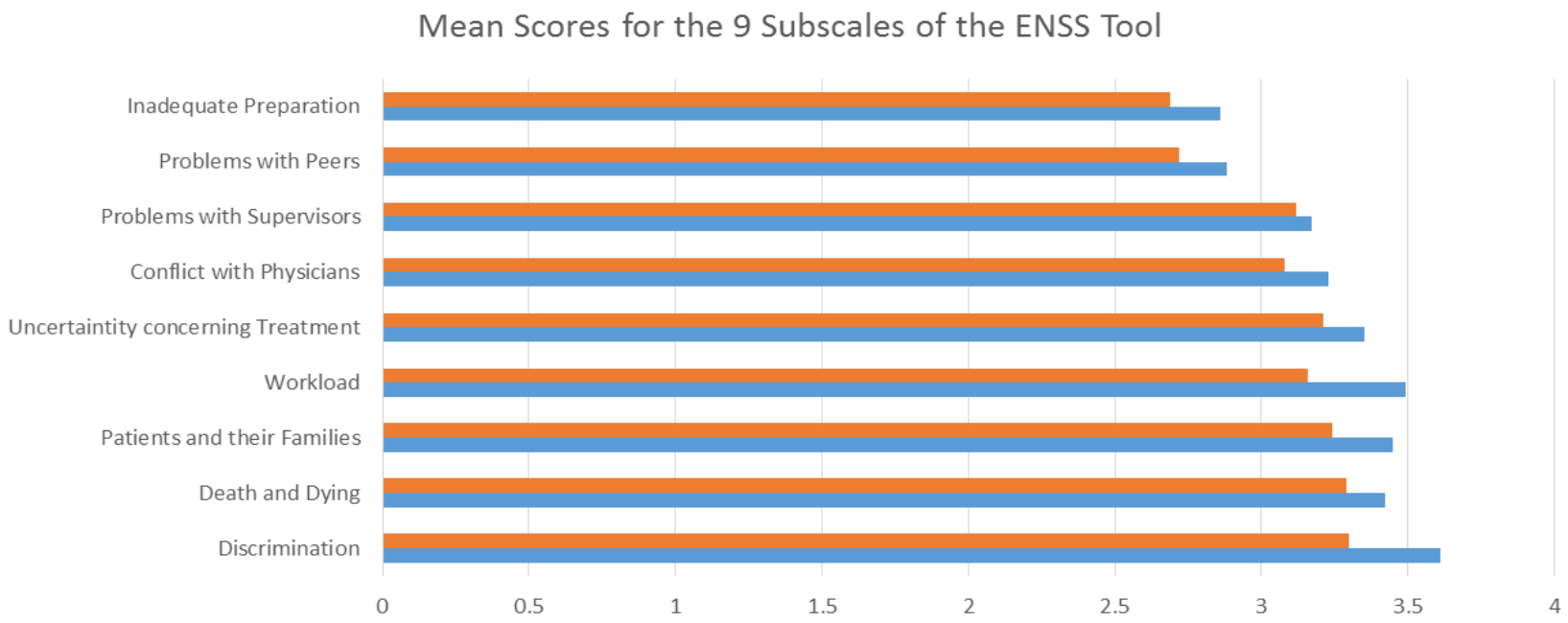
The average age between the two groups differs with 5 years. Year one respondent's average age 30 compared to the second year respondents average age at 25. Although younger in average age the BC2 respondents have 3 years more work experience than the older in average BC1 respondents. One would expect older respondents to have progressed further in their careers which is not seen in this sample.

4.2.2 Analysis of the ENSS Tool

The data will be presented according to the findings, the category with the highest mean score will be presented first, followed by the other categories. The Means obtained from the 9 categories of the ENSS ranged from (3.45 - 2.78) all of which have fairly high mean scores.

The means scores and the analysis of the 9 categories will be presented in the tables below.

Table 3: Means Scores of the 9 Categories



	Discrimination	Death and Dying	Patients and their Families	Workload	Uncertaintity concerning Treatment	Conflict with Physicians	Problems with Supervisors	Problems with Peers	Inadequate Preparation
BC 2	3.30	3.29	3.24	3.16	3.21	3.08	3.12	2.72	2.69
BC 1	3.61	3.42	3.45	3.49	3.35	3.23	3.17	2.88	2.86

Table 4: Rating of Stress in relation to Category I: Discrimination

		BC 1 N= 64									BC 2 N= 72									Total Sample N= 136								
Question	Category: I) Discrimination *a=0.50*	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 64	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 72	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 136	Mean	StdDev
No	Items																											
8	Being sexually harassed	0	11	2	2	17	32	64	3.89	1.49	0	6	3	1	15	47	72	4.31	1.23	0	17	5	3	32	79	136	4.1	1.36
16	Experiencing discrimination because of race or ethnicity	0	3	11	6	40	4	64	3.49	1.00	0	10	7	8	42	5	72	3.34	1.19	0	13	18	14	82	9	136	3.42	1.09
26	Experiencing discrimination on the basis of sex	1	9	10	4	19	21	64	3.47	1.51	2	14	9	6	23	18	72	2.22	1.57	3	23	19	10	42	39	136	2.85	1.54
								Total Mean Score	3.61								Total Mean Score	3.29							Total Mean Score	3.45		

Category I - Discrimination in relation to stress was the highest source of stress with a mean score of (3.45). Just over a third of the BC 1 students, (62.5%, n = 40) find experiencing discrimination because of race or ethnicity as extremely stressful, as does 58.33% (n=42) of students in the BC 2 group.

Table 5: Rating of Stress in relation to Category A: Death and Dying

		BC 1 N= 64									BC 2 N= 72									Total Sample N= 136								
Question	Category: A) Death and Dying *a=0.68*	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 64	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 72	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 136	Mean	StdDev
No	Items																											
1	Performing procedures that patients experience as painful	0	4	18	20	22	0	64	2.94	0.94	0	9	24	20	18	1	72	2.69	1.03	0	13	42	40	40	1	136	2.82	0.98
9	Feeling helpless in the case of a patient who fails to improve	0	4	14	16	30	0	64	3.14	0.97	0	3	17	18	30	4	72	3.21	1.01	0	7	31	34	60	4	136	3.18	0.99
17	Listening or talking to a patient about his/her approaching death	0	5	6	15	32	5	64	3.41	1.03	0	4	8	14	41	6	72	3.49	1.00	0	9	14	29	73	11	136	3.45	1.01
27	The death of a patient	0	5	9	10	37	3	64	3.38	1.04	1	8	8	14	38	3	72	3.23	1.16	1	13	17	24	75	6	136	3.31	1.10
37	The death of a patient with whom you developed a close relationship	0	1	4	11	44	4	64	3.72	0.74	1	2	11	10	42	6	72	3.5	1.03	1	3	15	21	86	10	136	3.61	0.88
47	Physician(s) not being present when a patient dies	0	4	7	6	44	3	64	3.55	0.97	0	9	8	10	39	6	72	3.35	1.18	0	13	15	16	83	9	136	3.45	1.07
53	Watching a patient suffer	0	0	3	7	53	1	64	3.81	0.53	0	3	5	13	48	3	72	3.6	0.85	0	3	8	20	101	4	136	3.71	0.69
						Total Mean Score			3.42						Total Mean Score			3.29						Total Mean Score			3.36	

Just over a third of the BC 1 students, (82%, n =53) find the death the death of a patient with whom you develop as close relationship as extremely stressful as does 66% (n=48) of student in the BC2 group.

Table 6: Rating of Stress in relation to Category H: Patients and their Families

Question	Category: H) Patients and their Families *α= 0.72*	BC 1 N= 64									BC 2 N= 72									Total Sample N= 136								
		0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 64	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 72	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 136	Mean	StdDev
No	Items																											
7	Patients making unreasonable demands	0	3	13	12	36	0	64	3.28	0.94	1	4	18	15	31	3	72	3.10	1.1	1	7	31	27	67	3	136	3.19	1.02
15	Patients' families making unreasonable demands	0	0	15	12	37	0	64	3.35	0.84	0	5	10	17	39	1	72	3.28	0.97	0	5	25	29	76	1	136	3.32	0.9
25	Being blamed for anything that goes wrong	0	3	3	8	49	1	64	3.66	0.8	0	3	6	10	48	5	72	3.63	0.9	0	6	9	18	97	6	136	3.65	0.85
34	Being the one that has to deal with the patients' families	0	4	11	13	35	1	64	3.29	0.98	1	7	19	18	26	1	72	2.87	1.09	1	11	30	31	61	2	136	3.08	1.03
35	Having to deal with violent patients	0	2	7	10	43	2	64	3.56	0.85	0	5	15	8	40	4	72	3.32	1.09	0	7	22	18	83	6	136	3.44	0.97
44	Having to deal with abusive patients	0	4	10	11	35	4	64	3.39	1.03	0	3	7	15	45	2	72	3.50	0.87	0	7	17	26	80	6	136	3.45	0.95
52	Having to deal with abuse from patients' families	0	1	13	11	39	0	64	3.38	0.86	1	4	10	16	38	3	72	3.32	1.05	1	5	23	27	77	3	136	3.35	0.95
56	Not knowing whether patients' families will report you for inadequate care	0	3	9	13	37	2	64	3.41	0.94	0	14	13	13	30	2	72	2.9	1.22	0	17	22	26	67	4	136	3.16	1.08
									Total Mean Score	3.45								Total Mean Score	3.24								Total Mean Score	3.35

In this category, stress related to patients and their families, the most stressful aspect was item 25 77% (n=49) of the BC 1 students and 67% (n=48) of the BC 2 students find that being blamed for anything that goes wrong as very stressful.

Table 7: Rating of Stress in relation to Category F: Workload

Question	Category: F) Workload *α=0.72*	BC 1 N= 64									BC 2 N= 72									Total Sample N= 136								
		0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 64	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 72	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 136	Mean	StdDev
No	**Items**																											
13	Unpredictable staffing and scheduling	1	1	5	11	45	1	64	3.58	0.85	1	5	15	12	36	3	72	3.19	1.12	2	6	20	23	81	4	136	3.39	0.98
23	Not enough time to provide emotional support to the patient	0	3	9	18	33	1	64	3.31	0.91	0	7	19	11	32	3	72	3.07	1.13	0	10	28	29	65	4	136	3.19	1.02
32	Not enough time to complete all of my nursing tasks	0	0	2	7	52	3	64	3.88	0.52	0	3	11	19	39	0	72	3.3	0.88	0	3	13	26	91	3	136	3.59	0.70
41	Too many non-nursing tasks required, such as clerical work	1	3	8	11	41	0	64	3.38	0.98	0	9	10	16	35	2	72	3.14	1.11	1	12	18	27	76	2	136	3.26	1.04
42	Not enough staff to adequately cover the unit	0	0	0	4	59	1	64	3.95	0.28	0	3	8	9	51	1	72	3.54	0.87	0	3	8	13	110	2	136	3.75	0.57
45	Not enough time to respond to the needs of patients' families	0	2	10	13	38	1	64	3.42	0.88	0	7	13	21	31	0	72	3.04	1.01	0	9	23	34	69	1	136	3.23	0.94
51	Demands of patient classification system	0	10	26	17	15	3	64	2.66	1.06	0	10	26	17	16	3	72	2.65	1.1	0	20	52	34	31	6	136	2.66	1.08
55	Having to work through breaks	0	4	5	5	47	3	64	3.63	0.93	1	3	12	18	38	0	72	3.24	0.97	1	7	17	23	85	3	136	3.44	0.95
57	Having to make decisions under pressure	0	0	7	9	47	1	64	3.66	0.7	0	6	12	10	43	1	72	3.29	1.04	0	6	19	19	90	2	136	3.48	0.87
								Total Mean Score	**3.49**								**Total Mean Score**	**3.16**							**Total Mean Score**	**3.33**		

Over a third of the BC 1 nursing respondents, (81%, n= 52) that they do not have enough time to complete their nursing tasks as extremely stressful as does 63% (n=39) of students in the BC2 group

Table 8: Rating of Stress in relation to Category G: Uncertainty Concerning Treatment

Question	Category: G) Uncertainty Concerning Treatment *α= 0.68*	BC 1 N= 64									BC 2 N= 72									Total Sample N= 136								
		0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 64	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 72	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 136	Mean	StdDev
No	Items																											
6	Inadequate information from a physician regarding the medical condition of a patient	0	2	13	13	34	2	64	3.33	0.94	0	9	12	14	35	2	72	3.13	1.13	0	11	25	27	69	4	136	3.23	1.03
14	A physician ordering what appears to be inappropriate treatment for a patient	0	4	15	14	27	5	64	3.22	1.08	0	7	11	12	36	6	72	3.31	1.14	0	11	26	26	63	11	136	3.27	1.11
18	Fear of making a mistake in treating a patient	0	1	5	18	39	1	64	3.54	0.73	0	7	11	16	36	2	72	3.20	1.06	0	8	16	34	75	3	136	3.37	0.89
24	A physician not being present in a medical emergency	0	8	9	10	33	4	64	3.25	1.17	0	6	6	12	41	7	72	3.51	1.06	0	14	15	22	74	11	136	3.38	1.11
29	Feeling inadequately trained for what I have to do	0	5	16	17	23	3	64	3.05	1.06	0	9	18	14	23	8	72	3.04	1.24	0	14	34	31	46	11	136	3.05	1.15
33	Not knowing what a patient or a patient's family ought to be told about the patient's condition and its treatment	0	3	8	13	39	2	64	3.45	0.92	0	10	18	19	24	1	72	2.82	1.09	0	13	26	32	63	3	136	3.14	1.00
36	Being exposed to health and safety hazards	0	5	9	8	40	2	64	3.39	1.03	0	7	11	14	34	6	72	3.29	1.13	0	12	20	22	74	8	136	3.34	1.08
39	Being in charge with inadequate experience	0	3	6	5	43	7	64	3.70	0.95	0	2	10	16	29	15	72	3.63	1.05	0	5	16	21	72	22	136	3.67	1.00
43	Uncertainty regarding the operation and functioning of specialized equipment	0	2	12	20	28	2	64	3.26	0.91	1	2	20	20	28	1	72	3.03	0.99	1	4	32	40	56	3	136	3.15	0.95
								Total Mean Score	3.35								Total Mean Score	3.21								Total Mean Score	3.28	

The highest source of stress for both BC 1(n=43, 67%) and BC 2 (n =29, 40%) nursing respondents was item 39 (mean of 3.67) being in charge with inadequate experience. Due to the respondent's scope of practice R2598 and Training regulation R683 first and second year, they should be working under the direct and indirect supervision of a registered nurse and not left to take charge of the nursing unit.

Table 9: Rating of Stress in relation to Category B: Conflict with Physicians

		BC 1 N= 64									BC 2 N= 72									Total Sample N= 136								
Question	Category: B) Conflict with Physicians *a=0.55*	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 64	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 72	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 136	Mean	StdDev
No	Items																											
2	Criticism by a physician	0	2	13	9	38	2	64	3.39	0.95	1	11	11	11	35	3	72	3.07	1.25	1	13	24	20	73	5	136	3.23	1.10
10	Conflict with a physician	0	10	16	7	26	5	64	3.00	1.27	0	11	13	14	20	14	72	3.18	1.35	0	21	29	21	46	19	136	3.09	1.31
28	Disagreement concerning the treatment of a patient	0	4	18	18	20	4	64	3.03	1.05	0	7	28	19	14	4	72	2.72	1.06	0	11	46	37	34	8	136	2.88	1.05
38	Making a decision concerning a patient when the physician is unavailable	0	6	7	19	25	7	64	3.31	1.11	0	9	11	18	25	9	72	3.19	1.22	0	15	18	37	50	16	136	3.25	1.16
48	Having to organize doctors' work	0	5	7	12	35	5	64	3.44	1.05	0	11	10	15	22	14	72	3.25	1.34	0	16	17	27	57	19	136	3.35	1.19
					Total Mean Score				3.23					Total Mean Score				3.08					Total Mean Score				3.16	

Category B dealt with conflict management. Over a third of BC respondents (n=57, 79%) found that having to organize doctors work is extremely stressful as does 30% (n=22) of BC 2 respondents. This would require further investigation as to what their understanding of doctor's work is.

Table 10: Rating of Stress in relation to Category E: Problems with Supervisors

		BC 1 N= 64									BC 2 N= 72									Total Sample N= 136								
Question	Category: D) Problems with Supervisors a= 0.73	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 64	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 72	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 136	Mean	StdDev
No	Items																											
5	Conflict with a supervisor	1	13	14	13	15	8	64	2.81	1.38	1	14	16	9	19	13	72	2.97	1.46	2	27	30	22	34	21	136	2.89	1.42
30	Lack of support of my immediate supervisor	0	4	13	15	30	2	64	3.20	1.01	0	8	16	14	27	7	72	3.13	1.2	0	12	29	29	57	9	136	3.17	1.10
31	Criticism by a supervisor	0	6	12	10	30	6	64	3.28	1.16	0	7	18	11	28	8	72	3.17	1.21	0	13	30	21	58	14	136	3.23	1.18
40	Lack of support by nursing administration	0	3	8	13	39	1	64	3.42	0.91	0	7	17	22	25	1	72	2.93	1.02	0	10	25	35	64	2	136	3.18	0.96
46	Being held accountable for things over which I have no control	0	1	5	5	52	1	64	3.74	0.69	0	2	6	12	49	3	72	3.62	0.82	0	3	11	17	101	4	136	3.68	0.75
49	Lack of support from other health care administrators	0	3	10	15	36	0	64	3.32	0.90	0	10	20	15	24	3	72	2.85	1.15	0	13	30	30	60	3	136	3.09	1.02
54	Criticism from nursing administration	0	4	7	12	38	3	64	3.45	0.97	0	5	16	14	32	5	72	3.22	1.09	0	9	23	26	70	8	136	3.34	1.03
							Total		**3.17**	**1.00**						**Total**		**3.12**	**1.13**						**Total**		**3.15**	**1.06**

In Category E, item 46 being held accountable for things over which I have no control returned the highest mean score of 3.74 and 3.68 for each of the groups. This aspect needs to be researched further to establish exactly what things this specific population is referring to.

Table 11: Rating of Stress in relation to Category D: Problems with Peers

		BC 1 N=64									BC 2 N= 72									Total Compliment								
Question	Category: D) Problems with Peers a= 0.56	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 64	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 72	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 136	Mean	StdDev
No	**Item**																											
4	Lack of opportunity to talk openly with other personnel about problems in the work setting	0	17	12	8	26	1	64	2.72	1.29	0	15	16	18	20	3	72	2.72	1.2	0	32	28	26	46	4	136	2.72	1.24
12	Lack of opportunity to share experiences and feelings with other personnel in the work setting	0	11	12	12	25	4	64	2.98	1.24	0	13	13	24	15	7	72	2.86	1.23	0	24	25	36	40	11	136	2.92	1.23
20	Lack of an opportunity to express to other personnel on the unit my negative feelings towards patients	0	11	12	17	20	4	64	2.91	1.2	1	10	20	18	16	7	72	2.82	1.25	1	21	32	35	36	11	136	2.87	1.22
21	Difficulty in working with a particular nurse (or nurses) in my immediate work setting	0	3	11	11	35	4	64	3.41	1.00	0	15	14	11	24	8	72	2.94	1.35	0	18	25	22	59	12	136	3.18	1.17
22	Difficulty in working with a particular nurse (or nurses) outside my immediate work setting	0	7	18	10	27	2	64	2.98	1.13	0	23	15	9	19	6	72	2.58	1.39	0	30	33	19	46	8	136	2.78	1.26
50	Difficulty in working with nurses of the opposite sex	0	34	8	2	8	12	64	2.31	1.64	0	36	11	2	3	20	72	2.44	1.74	0	70	19	4	11	32	136	2.38	1.69
							Total		**2.88**	**1.25**						**Total**		**2.72**	**1.36**						**Total**		**2.80**	**1.30**

This category yielded the lowest mean score, so an inference can be made that problems with peers are one of the lowest contributors of stress for the respondents however as expected individual differences will always exist due to personality clashes as seen in the mean scores for item 21. Item 50, difficulty working with nurses of the opposite sex has the lowest mean score in this category.

Table 12: Rating of Stress in relation to Category C: Inadequate Preparation

		BC 1 N= 64									BC 2 N= 72									Total Sample N= 136								
Question	Category: C) Inadequate Preparation	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 64	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 72	Mean	StdDev	0 Missed Response	1 Never Stressful	2 Occasionally Stressful	3 Frequently Stressful	4 Extremely Stressful	5 Does Not Apply	n= 136	Mean	StdDev
No	**Items**																											
3	Feeling inadequately prepa	1	6	17	23	17	0	64	2.77	1.00	1	12	22	21	14	2	72	2.6	1.11	2	18	39	44	31	2	136	2.67	1.06
11	Being asked a question by	0	8	16	20	20	0	64	2.8	1.01	0	7	27	19	18	1	72	2.7	1.01	0	15	43	39	38	1	136	2.75	1.01
19	Feeling inadequately prep	0	4	16	21	21	2	64	3.02	0.98	0	9	20	21	19	3	72	2.8	1.09	0	13	36	42	40	5	136	2.92	1.03
							Total		**2.86**	**1.00**						**Total**		**2.7**	**1**						**Total**		**2.78**	**1.03**

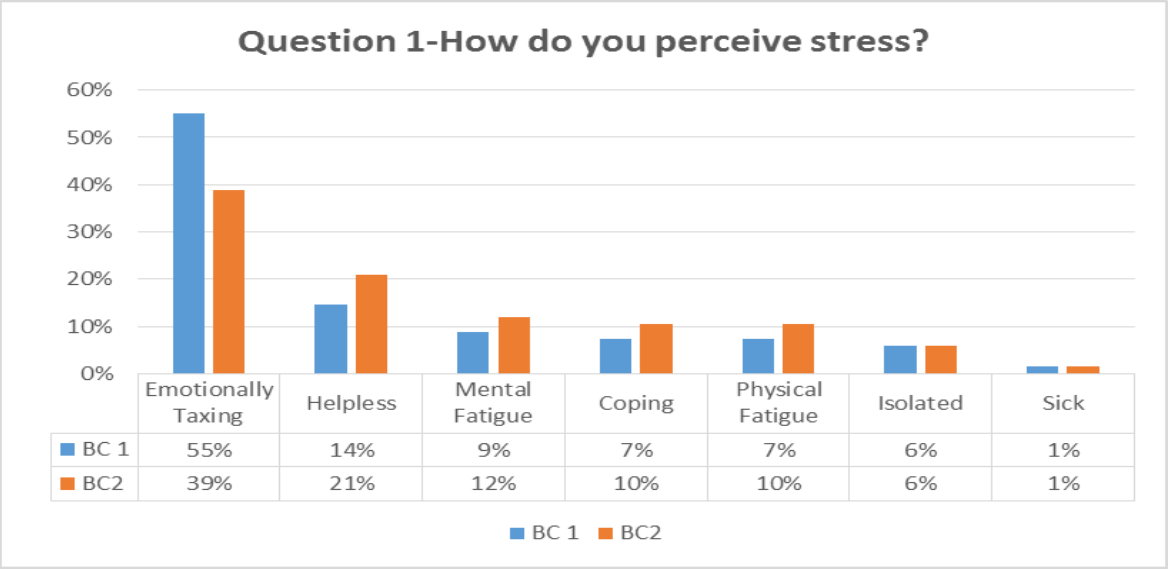
This category had the lowest mean scores for both the groups.

4.2.3. Analysis of the two open-ended questions

The analysis of the two open-ended questions answers the third research objective of the study. The findings of the two open-ended questions were first coded then grouped together as a latent construct in order to quantify the data and derive basic statistics. The themes used to quantify the data were generated from the responses received from the respondents (Annexure 10).

The following generated themes were used for open ended question 1: Emotionally Taxing, Helpless, Mental Fatigue, Coping, Physical Fatigue, Isolated and Sick. Statistics derived per group for Open Ended Question 1 are presented in the table below.

Table 13: Analysis of Open-Ended Question 1



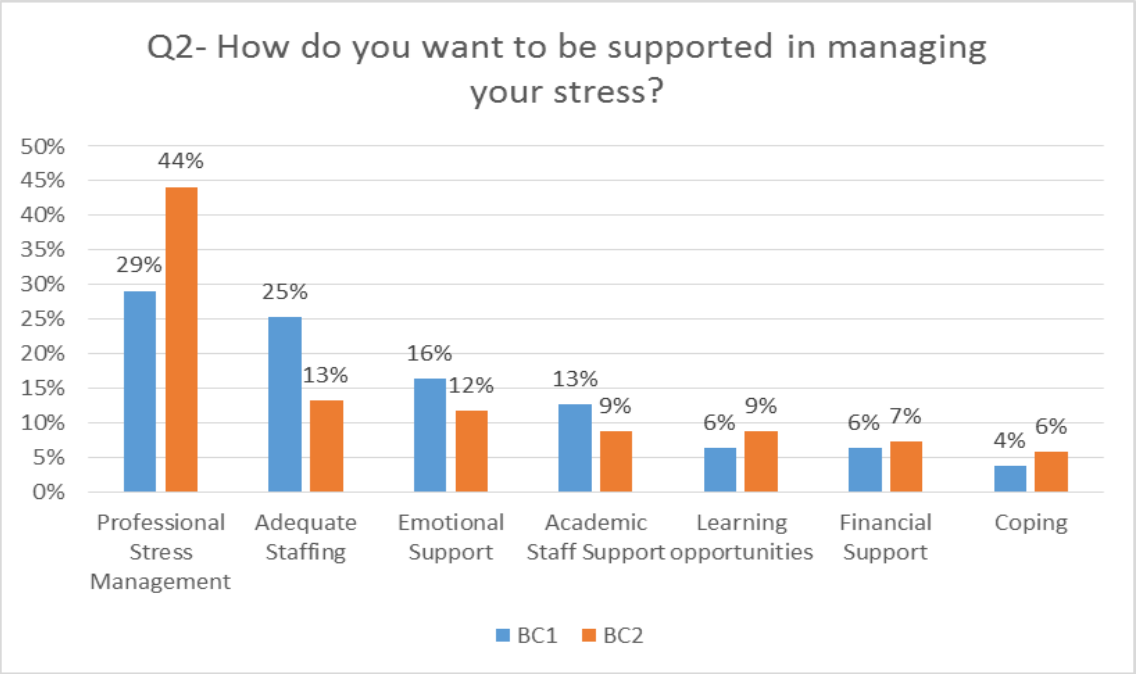
	Emotionally Taxing	Helpless	Mental Fatigue	Coping	Physical Fatigue	Isolated	Sick
BC 1	55%	14%	9%	7%	7%	6%	1%
BC2	39%	21%	12%	10%	10%	6%	1%

Both the BC 1 and BC 2 respondents perceived as stress as emotionally taxing, the BC 1 respondents more than the BC 2 respondents.

This result can be closely linked to the sources of stress described in this chapter specifically table 3, as the mean scores of the ENSS medium version tool reflects that the BC 1 respondents are more stressed than the BC 2 respondents.

The following themes were used: Professional Stress Management, Adequate Staffing, Emotional Support, Academic Staff Support, Learning Opportunities, Financial Support, and Coping to code the data for open-ended question 2. The table below depicts the statistics derived per group for Open Ended Question 2.

Table 14: Analysis of open-ended question 2



The findings reveal that the BC1 and BC 2 respondents require more support in managing their stress, in the form of Professional stress management, adequate staff, emotional support, and academic support. The difference in the ratio between BC 1 and BC 2 respondents clearly reflect who the more mature group of respondents are and substantiates other findings in this chapter.

4.3. Discussion of the findings

Bridging course nursing students (n=136) at this private nursing education institution are highly stressed and this is evident from the high mean scores obtained from the findings of the data analysis presented in this chapter. The findings below answers the first and second research objectives of the study.

The bridging course nursing students experience the highest stress levels from Category I- Discrimination which consists of questions related to sexual harassment, discrimination due to race or ethnicity and experiencing discrimination on the basis of sex. A mean score of (3.45) was obtained with a=0.50 which indicates very good construct validity.

The BC 1 and BC 2 nursing students experience a high level of stress with regards to discrimination due to race and ethnicity and this is could be attributed to the country's history. The source of discrimination is not clearly identified in this study however category H-Patients and their families, the highest mean scores in this category was related to abusive patients and abuse from patients family members.

In other studies by (Roopalekha- Jathanna, Latha & Prabhu, 2012) and (Qiao, Li & Hu, 2011) Category I-Discrimination was reported as the lowest contributing factor to stress. The most important source of stress was time pressure and the least was discrimination.

Category A-Death and dying was the second highest source of stress for the sample population with a= 0.72. This category returned very high mean scores and the biggest sources of stress are attributed to watching a patient suffer and the death of a patient with whom you have developed a close personal relationship. With care being one of the pillars of the nursing profession this is an expected result. It is also

evident from the results that the BC 2 nursing students deal better with death and dying in comparison to the BC 1 nursing students and this can be attributed to the fact that they are BC2 students and are in their last year of training for the BC programme and are more mature in the profession.

Category H-Patients and their families. In this category, the most stressful aspects were being blamed for anything that goes wrong and having to deal with abuse form patients and their families. This result can be largely attributed to the fact that these nursing students practice at a private hospital as they belong to a private nursing education institution and anecdotal evidence suggests that the families of patients in a private hospital are indeed abusive to nurses, more specifically nursing students. In totality, this category proved more stressful for the BC 1 nursing students in comparison to the BC 2 nursing students and again this can be attributed to professional maturity in the bridging programme.

Category F- workload were the next highest source of stress for the nursing students. The results of this category were expected to be high due to the nursing shortage experienced globally.

Category G- uncertainty concerning treatment also returned a high mean score. The highest source of stress in this category for both BC 1 and BC 2 nursing students was item 39 being in charge of inadequate experience. This is very disturbing as the scope of practice R2598 which both these groups of nursing students fall under states that they should work under the direct and indirect supervision of a Registered Nurse and this result reveals that the nursing students are sometimes left to charge of a ward without a registered nurse being present.

Category B- Conflict with physicians. The results of this category are very low in comparison to what the researcher expected to find given the history of the negative relationships between physician and nurse

in South Africa. The largest source of stress in this category is having to organize the doctor's work, this is very alarming as this is not part of the BC nursing student's job description or in their scope of practice and this result can substantiate why the mean score of the category Workload is so high.

Category E- Conflict with supervisors was also ranked as a high source of stress. Being accountable for things which I have no control over returned the highest mean score in this category and this can be attributed to the findings of category G discussed above.

Category D- Problems with peers and Category C- Inadequate preparation were the categories that were the lowest sources of stress for the bridging course student nurses which in comparison to previous studies with previous populations, these two categories were very high sources of stress.

To correlate the findings of the ENSS medium version tool between the two BC groups, Spearman's Rho Correlation Coefficient was carried out on the mean scores obtained by both groups for the different categories. (Altman and Bland, 1983) states that "in statistical terms, correlation is a method of assessing a possible two-way linear association between two continuous variables".

The Spearman's Rho Correlation Coefficient r=0.99 was obtained for the BC1and BC2 nursing students at this private nursing education institution which indicates there is a very high positive correlation between the groups and this is evident from table 3 presented in chapter 4. The table below represents the calculation of Spearman's Rho Correlation Coefficient.

Table 15: Spearman's Rho Correlation Coefficient r=0.99

Number	Category	BC1 n=64	BC2 n=74	d	d^2
1	Death and Dying	3.42	3.29	0.13	0.0169
2	Conflict with Physicians	3.23	3.08	0.15	0.0225
3	Inadequate Preparation	2.86	2.69	0.17	0.0289
4	Problems with Peers	2.88	2.72	0.16	0.0256
5	Problems with Supervisors	3.17	3.12	0.05	0.0025
6	Workload	3.49	3.16	0.33	0.1089
7	Uncertaintity concerning Treatment	3.35	3.21	0.14	0.0196
8	Patients and their Families	3.45	3.24	0.21	0.0441
9	Discrimination	3.61	3.30	0.31	0.0961

Sum of d^2	0.3651
Numerator	2.1906
n	9
n^3	729
Denominator	720
r	0.996958
df	7

$$r_s = 1 - \left[\frac{6\sum D^2}{N^3 - N} \right]$$

The Spearman's Rho Correlation Coefficient r=0.99 was obtained for the BC1and BC2 nursing students at this private nursing education institution which indicates there is a very high positive correlation between the groups.

The analysis of open-ended question one shows that Bridging course nursing students at this private Nursing Education Institution in Gauteng closely relate stress to something that is emotionally taxing, something that leaves them feeling helpless and the causative factor for mental fatigue.

The analysis of open-ended question two, answers research objective three of this study and it shows that Bridging course nursing students at this private Nursing Education Institution in Gauteng would like to be supported in managing their stress through Professional Stress Management, Adequate Staffing when on duty, Emotional Support, Academic Staff Support, Learning opportunities, and Financial Support.

Chapter 5 will conclude this research report with a summary of the main findings, a discussion of the limitations of this study and recommendations made for nursing education, research, and nursing practice.

CHAPTER 5
INTRODUCTION, MAIN FINDINGS, LIMITATIONS, RECOMMENDATIONS AND CONCLUSION.

5.1 Introduction

This chapter of the research report provides the main findings, limitations, and recommendations for nursing education, research, and nursing practice and the conclusion of the study.

5.2 Main Findings

The findings presented in chapter 4 revealed that the setting and population sample used in this study was unique and the findings of the data analysis differ greatly from other studies conducted on nursing students outside of South Africa.

The bridging course nursing students (n=136) at this private nursing education institution are highly stressed which was evident by high mean scores obtained from the data analysis of the ENSS medium version tool used in this study. The mean scores ranged from (3.45 - 2.78) (French et al., 2000). The main findings presented below answers research objective one and two of the study.

The highest sources of their stress are Discrimination, death and dying, patients and their families, workload, conflict with physicians, and conflict with supervisors. This is supported by a study conducted by (Qiao, Li and Hu, 2011), which reported death and dying and workload were the most

common stressors faced by nurses. Roopalekha-Jathanna et al, (2012), also stated that the most frequently stressful areas rated by respondents were ‘patients and their family’ and ‘workload’, whereas ‘inadequate emotional preparation’ and ‘discrimination’ were rated as least stressful situations.

One would expect to see a high level of discrimination in the workplace on the race and ethnicity due to the history of South Africa.
Problems with peers and inadequate preparation scoring being the lowest sources of stress. Qiao, Li and Hu (2011), also reported inadequate preparation as one of the highest stressors faced by nurses.

The study revealed that the BC 1 nursing students are more stressed than the BC 2 nursing students and this is evident from the findings of Table 3 presented in chapter 4, this can be attributed to their level of training in the programme. This also shows us that as the nursing students progress from first to second year, they deal better with stress and this could be due to the exposure that the BC 2 students have to management and the entire month that they have to spend working in management and the compilation of their management portfolio of evidence.

The Spearman’s Rho Correlation Coefficient r=0.99 were obtained for the BC1and BC2 nursing students at this private nursing education institution which indicates there is a very high positive correlation between the two BC groups that answered the questionnaire. The high positive correlation could be because some of the BC 2 nursing students had just progressed from BC 1 into BC 2.

The findings of open-ended question two answers the third research objective of the study. The bridging course nursing students (n=136) at

this private nursing education institution would like to be supported in managing their stress through Professional Stress Management, Adequate Staffing when on duty, Emotional Support and Academic Staff Support.

Although several studies have been conducted on stress among nursing students, no study has been conducted on a similar population and setting to that which was used in this study.

The findings of this study have answered the research question, by providing the current stress levels, sources of stress and what support is required to support the Bridging Course nursing students at the selected Private Nursing Education Institution in Gauteng.

The findings of this study will be made available to the selected Private Nursing Education Institution in Gauteng. The researcher is optimistic that the findings of this study can be used to assist in developing and implementing a stress management programme for nursing students.

5.3. Limitations

Grove et al. (2013) define limitations as constraints that limit a research study which can have an impact on whether findings can be generalized or not.

Only respondents that were registered for the for the Bridging Course 1st year leading to enrolment as a general nurse and 2nd year leading to registration as a general nurse at this private nursing education institution were included in this study. The data could have been richer if the population sample was more diverse.

Access to respondents was a problem on one of the scheduled data collection days as the group had an exam scheduled for later in the day and this was not disclosed when the date was scheduled. The data collection had to be rescheduled in order to prevent undue stress to the nursing students before the exam. If this study is repeated, the researcher needs to ensure that the block programme of the nursing students is reviewed and data collection dates should be scheduled based on dates where no exams and assessments are scheduled.

The word perceive had to be clarified before students completed the questionnaire as it was raised when the nursing students were asked if they had any questions before completing the questionnaire and this could be due to English not being the first language of many of the respondents. Although the ENSS tool is a validated tool and has been used in many studies, the two open-ended questions that were added to it should have been tested for face validity. This was however overcome as the researcher was present during the data collection to explain the meaning of the word.

The research study was a quantitative approach with a cross-sectional design. Although the researcher designed the data capture sheet and analysed the data using Microsoft Excel, there still exists a possibility that the statistical analysis might differ if a statistical package was used instead. The researcher is however of the opinion that the evidence derived from the literature on studies conducted using the ENSS tool, is most consistent with the findings of the study.

The researcher is of the opinion that if the demographic data questionnaire included race/ethnicity, richer data would have emerged

with regards to discrimination given the setting. Should this study be repeated, it may prove beneficial to include the discrimination questions to the relevant categories to identify the exact sources of discrimination.

5.4 Recommendations

5.4.1 Recommendations for Nursing Education

The findings indicated that stress and its impact on nursing students should be viewed in a more serious light. More attention should be focused on stress levels, sources of stress and support structures to manage and deal with stress.

Even though support is offered in the form of an employee wellbeing programme at this private nursing education institution, many nursing students have very little knowledge that the service exists and the students who do have knowledge of the service report that it is not effective.

There is no specific policy on how to deal with a nursing student that is stressed or a dedicated stress management system in place at this private nursing education institution. This should be an area that nursing education should look into in order to effectively identify, support and manage stressed nursing students. Nurse educators should be sensitized to the demands we put on nursing students and the stress that these demands cause.

Di Martino (2002) found that in South Africa, most health care facilities do not have adequate policies in place or do not disseminate these policies to the health care workers of their institution.

Therefore it is important for nursing education to consider the inclusion of stress management in the nursing curriculum will benefit nursing students.

5.4.2 Recommendations for nursing research

The findings indicated that further research on Stress, sources of stress and support structures required to manage the stress of nursing student should be undertaken. From the existing literature, it is evident that the topic of stress has been researched for decades however very little research on the topic has been conducted in the South African context.

Therefore it is important for nursing research to consider repeating this research study within the South African nursing context and the population should be more inclusive of both the private and public sector and across different nursing programmes to see how the stress levels differ. This will provide a greater insight to stress among nursing students.

Given the history of South Africa and the healthcare landscape, further research into stress related to discrimination based on race or ethnicity will provide an eye-opening insight into what nursing students are exposed to.

An intervention study on a stress management system that is professional, readily accessible and designed specifically for nursing students should be developed to support nursing students.
Also a research study on what nursing students perceive as doctors work should be conducted to gain more insight on how this affects workload.

5.4.3 Recommendations for nursing practice

The findings indicated that stressed nursing staff can have very negative impacts on their wellbeing and health and this directly impacts productivity and patient care.

Stress should be managed effectively. Nursing managers should be able to identify the staff at risk and manage them appropriately. They should also be sensitized to the impact of workload on stress.
Therefore it is important for nursing practice that every effort is made to reduce the stress levels of nursing students and nurses as a whole.

Policies and procedures should be put in place to deal with a nursing student or nursing staff that is stressed or a dedicated stress management system in place.

5.5 Conclusion

The bridging course nursing students (n=136) at this private nursing education institution are highly stressed. Stress in the workplace can have a negative effect on the nursing student, make them feel overwhelmed and affect the quality of care delivered to the patient.

The highest sources of their stress are Discrimination, death and dying, patients and their families, workload, conflict with physicians and conflict with supervisors with problems with peers and inadequate preparation scoring being the lowest sources of stress. Discrimination of any kind should not be tolerated given the history of South Africa and the country's constitution which is the fabric of the population's existence.

The health and wellbeing of our nurses are paramount in ensuring continued patient care for the ever growing population. Stress can have very negative effects on health and wellbeing. Excessive stress can lead to sudden cardiac death, tuberculosis and diabetes, psychological diseases like anxiety and depression and behavioural outcomes such as poor academic and work performance.

The Bridging course nursing students at this private nursing education institution perceive stress as Emotionally Taxing and would like to be supported in managing their stress through Professional Stress Management, Adequate Staffing when on duty, Emotional Support, and Academic Staff Support.

In South Africa, we have a shortage of nurses and preserving the few we have is imperative for the preservation of the profession. Armstrong et al (2019).

The findings of this research study have answered the following research questions and objectives:

What are the current stress levels, sources of stress and required support to reduce the stress of Bridging Course nursing students at a Private Nursing Education Institution in Gauteng?

- To describe the stress levels of bridging course nursing students at a Private Nursing Education Institution in Gauteng

- To describe the sources of the stress of bridging course nursing students at a Private Nursing Education Institution in Gauteng

- To describe how the Private Nursing Education can support bridging course nursing students in reducing their stress.

The take-home message from this research study is that nursing students are extremely stressed and have numerous sources of stress. They perceive stress as emotionally taxing and they require above all else professional stress management. These bridging course nursing students are discriminated against due to race and ethnicity and in 2019 it is unacceptable given the history of the country and further research on the exact source of this discrimination is needed.

The researcher as a nurse educator has become more aware of the stressors that nursing students face and has become sensitized to identifying, supporting and managing stressed nursing students.

REFERENCES:

Altman DG, Bland JM. Measurement in Medicine: The Analysis of Method Comparison Studies. The Statistician. 1983:32:307–317.

Apa.org. (2015). [online] Available at: https://www.apa.org/news/press/releases/stress/2014/stress-report.pdf [Accessed 22 November. 2018].

Armstrong, S., Geyer, N. and Bell, C. (2019). Capacity of South African nursing education institutions to meet healthcare demands: A looming disaster?. *International Journal of Africa Nursing Sciences*, 10, pp.92-101.

Bhatia, N. (2010). Occupational Stress Amongst Nurses from Two Tertiary Care Hospitals in Delhi. *Australasian Medical Journal*, pp.731-738.

Bickford M. 2005. Stress in the Workplace: A General Overview of the Causes, the Effects, and the Solutions. Canadian Mental Health Association. Newfoundland and Labrador Division.

Brink, H 2012: Fundamentals of Research Methodology for Health Care Professionals, Third Edition.Cape Town: Juta.

Burns N, Grove S (2009). The Practice of Nursing Research: Conduct, Critique, and Utilization, sixth ed. Elsevier Saunders, St Louis, Missouri

Chuan, O. and Barnett, T. (2012). Student, tutor and staff nurse perceptions of the clinical learning environment. *Nurse Education in Practice*, 12(4), pp.192-197.

Clark, C., Nguyen, D. and Barbosa-Leiker, C. (2014). Student Perceptions of Stress, Coping, Relationships, and Academic Civility. *Nurse Educator*, 39(4), pp.170-174.

Colligan, T. and Higgins, E. (2005). Workplace Stress. *Journal of Workplace Behavioral Health*, 21(2), pp.89-97.

Cooper CL. Introduction In: C.L. Cooper, Editor, Theories of Organizational Stress, Oxford University Press, Oxford. 1998:1-5.

Cronbach, L. (1951). Coefficient alpha and the internal structure of tests. *Psychometrika*, 16(3), pp.297-334.

De Villiers, T., Mayers, P.M., and Khalil, D., 2014. Pre-registration nursing students‟ perceptions and experiences of violence in a nursing education institution in South Africa. Nurse education in practice, 14(6), pp.666-73.

Di Martino, V., 2002. *Workplace Violence in the Health Sector*: Country case studies: Brazil, Bulgaria, Lebanon, Portugal, South Africa, Thailand, and an Additional Australian Study.

Eifried, S. (2003). Bearing witness to suffering: The lived experience of nursing students. Journal of Nursing Education, 42(2), 59-67.

Edgecombe, K, Jennings, M and Bowden, M. 2013. International nursing students and what impacts their clinical learning: a Literature review. Nurse Education Today Volume 33, Issue 2, February 2013, Pages 138–142

Evans-Lacko, Sara and Knapp, Martin (2017) Global patterns of workplace productivity for people with depression: absenteeism and presenteeism costs across eight diverse countries. Social Psychiatry and Psychiatric Epidemiology, 51 (11). pp. 1525-1537. ISSN 0933-7954.

French, S.E., Lenton, R., Walters, V., and Eyles, J. (2000). An Empirical of An Expanded Nursing Stress Scale. Nursing Stress Scale, Journal of Nursing Measurement, 8 (2), 161-78.

Gaberson, K.B. & Oermann, M.H. (2010) Clinical teaching strategies In Nursing. (3rded.).New York: Springer Publishing Company.

Govender P, Mkhabela S, Hlongwane M, Jalim K and Jetha C (2015) OT students experiences of stress and coping. South African Journal of Occupational Therapy, 2015; 45 (3): 34-39.

Gray-Toft P, Anderson J.G. The nursing stress scale: development of an instrument. J. Behavioral Assessment, 1981; 3: 11-23.

Grove, S.K, Burns, N, and Gray, J.R., 2013. The Practice of Nursing Research: Appraisal, Synthesis, and Generation of Evidence. 7th ed. London: Elsevier Saunders.

Grumbach, K. (2006). The Nursing Shortages: Is it really about Image? Journal of Health Care Management.

https://www.iol.co.za/business-report/economy/work-stress-costs-sa-r40bn-2077997. [19 Feb 2019].

https://www.researchgate.net/publication/12103164_An_empirical_evaluation_of_an_Expanded_Nursing_Stress_Scale.[19 Jan2019].

https://hydesmith.com/de-stress/files/StressMgt.pdf Stress & Stress Management. 2010. Klinic Community Health.[19 Feb2019].

http://www.stress.org.uk/maslows-hierarchy-needs-applied-employee-engagement. [19 Feb 2019].

https://www.nursingtimes.net/students/how-to-cope-with-stress-as-a-student-nurse/5028467.article. [19 Feb 2019].

International Council of Nurses. 2012. THE ICN CODE OF ETHICS FOR NURSES. Geneva.

International Labour Office Stress prevention at work checkpoints: Practical improvements for stress prevention in the workplace Geneva, International Labour Office, 2012.

International Labour Organisation, 2016. A collective challenge, World day for safety and health at work, Published 4 April 2016, p.2.

Jones D, Tanigawa T, Weisse S. Stress management and workplace disability in the U.S., Europe, and Japan. Journal of Occupational Health. 2003;45:1-7.

Kerlinger, F.N., Lee, H.B., 2000. Foundations of Behavioral Research, 4th ed. Harcourt College Publishers, Fort Worth, TX.

Khamisa N, Oldenburg B, Peltzer K, and Dragan Ilic Int. J. Environ. Res. Public Health 2015, 12, 652-666)

Kohler, J.M., Munz, D.C. & Grawitch, M.J. (2006) Test of a dynamic stress model for organizational change: do males and females require different models? Applied Psychology: An International Review, 55 (2), 168–191

Laschinger, H.K.S. & Grau, A. (2012). Creating empowering work environments to promote professional nursing practice

Lazarus RS. & Folkman S. Stress, Appraisal, and Coping. New York: Springer Publishing Company Inc., 1984.

Lee I, Wang H.H. Perceived occupationa1 stress and re1ated factors in community nurses. Journal of Nursing Research. 2002; 10(4):253-260.

Levi, L. 1976. “Psychosocial conditions in the work environment: Effects on health and well-being” in Arbetsmiljoutredningens betankande, Bilage, Vol. 2, pp. 87-118.

J. Lim, F. Bogossian, and K. Ahern (2010:22) Stress and coping in Singaporean nurses: a literature review. Nurs Health Sci. 2010 Jun;12 (2):251-8.

Memarian, R., Vanaki, Z. and Baraz, S. (2015). Learning challenges of nursing students in clinical environments: A qualitative study in Iran. *Journal of Education and Health Promotion*, 4(1), p.52.
Merriam-Webster Online Dictionary, Merriam-Webster Online. (2009)

Merriam-Webster.com. Merriam-Webster, n.d. Web. 12 Mar. 2018.

Meyer, G., Nel, E. and Downing, C. (2016). Basic student nurse perceptions about clinical instructor caring. *Health SA Gesondheid*, 21, pp.444-452.

Michie S. Causes and management of stress at work. Occupational and Environmental Medicine 2002; 59: 67-72.

Mohite, Namrata & Shinde, Mahadeo & Gulavani, Apeksha. (2014). Job Satisfaction among Nurses Working at Selected Tertiary Care Hospitals. International Journal of Science and Research (IJSR). 3. 1006-1112.

Monett, D.R., Sullivan, T.J. & De Jong, C.R., (2005). Applied social research: A tool for human services. 6th ed. Australia: Thomson Brooks/Cole

Mosby's Medical Dictionary, 9th Edition. 2009 Elsevier.

Mukaka M. M. (2012). Statistics corner: A guide to appropriate use of correlation coefficient in medical research. *Malawi medical journal: the journal of Medical Association of Malawi*, *24*(3), 69-71.

National Research Centre for the Working Environment. 2007. The Copenhagen Psychosocial Questionnaire II – medium version. (COPSOQ) NRCWE. Copenhagen.

Naylor, N., & O'Sullivan (2006). Sexual Harassment and the Amended Code of Good Practice on the Handling of Sexual Harassment in South Africa. Cape Town: Women's Legal Centre.

Örtqvist, D. and Wincent, J. (2006). Prominent consequences of role stress: A meta-analytic review. *International Journal of Stress Management*, 13(4), pp.399-422.

Oxford English Dictionary, (2012).7th ed. Oxford University Press

Polit, D. and Hungler, B.: Nursing Research: Principle and Method, 6th ed.; Philadelphia: Lippincott Company, (1999), P.P. 416-417

Polit, D.F., & Beck, C.T. (2004). Nursing research: Principles and methods (7th ed.). Philadelphia: Lippincott Williams & Wilkins

P.N., R. J., K.S., L. and Prabhu, S. (2012) 'Occupational Stress and Coping among Nurses in a Super Specialty Hospital', *Journal of Health Management*, 14(4), pp. 467–479.

Pulido-Martos, M., Augusto-Landa, J. and Lopez-Zafra, E. (2012). Sources of stress in nursing students: a systematic review of quantitative studies. *International Nursing Review*, 59(1), pp.15-25.

Posel, D. (2005). Sex, Death and the Fate of the Nation: Reflections on the Politicization of Sexuality in Post-Apartheid South. Africa, 75(02), 125-153.

Qiao, G., Li, S. and Hu, J. (2011) 'Stress, Coping, and Psychological Well-Being Among New Graduate Nurses in China', *Home Health Care Management & Practice*, 23(6), pp. 398–403.

Santamaria, N. (1994). Interpersonal Stress in Nursing: The Development of The Difficult Patient Stress Scale, Australian Association for Research in Education Annual Conference, University of Newcastle.

Satpathy, Ipseeta & Mitra, Bonita. (2015). Stress at Workplaces- An overview. International Research Journal of Commerce and Law. 2. 46-51.

Selye H. 1974. Stress without distress. Philadelphia: J.B. Lippincott Co.

Sharif, F., & Masoumi, S. (2005). A qualitative study of nursing student experiences of clinical practice. BMC Nursing, 4(1), 6.

Sheu, S., Lin, H. and Hwang, S. (2002). Perceived stress and physio-psycho-social status of nursing students during their initial period of clinical practice: the effect of coping behaviors. *International Journal of Nursing Studies*, 39(2), pp.165-175.

Simmons, B. L. & Nelson, D. L. (2007). Eustress at Work: Extending the Holistic Stress Model. In D. Nelson & C.L. Cooper (Ed.), Positive Organizational Behavior: Accentuating the Positive at Work (pp. 40-55).

Susan French, Rhonda Lenton, John Eyles, and Vivienne Walters. "An Empirical Evaluation of an Expanded Nursing Stress Scale". *Journal of Nursing Measurement*, Vol. 8, No. 2, 2000

Sveinsdottir H, Biering P, Ramel A. Occupational stress, job satisfaction, and working environment among Icelandic nurses: A cross-sectional questionnaire survey International Journal of Nursing Studies. 2006 Sept;43(7):875-89

Younas, A. (2016) “Levels of Stress and Coping Strategies Used by Nursing Students in Asian Countries : An Integrated Literature Review,” *The Journal of Middle East and North Africa Sciences*, 2(4), pp. 50–57

ANNEXURE 1

GENERAL INFORMATION

Please complete/circle the following:

Age: _____

Sex: Male/Female

Course for which you are enrolled: _____

Married: Yes/No

Years of experience in nursing: _____

Expanded Nursing Stress Scale

Below is a list of situations that commonly occur in a work setting. For each situation you have encountered in your PRESENT WORK SETTING, would you indicate HOW STRESSFUL it has been for you:

(Enter the number in the right hand column that best applies to you. If you have not encountered the situation, write '0'.)

Never Stressful	Occasionally Stressful	Frequently Stressful	Extremely Stressful	Does Not Apply
1	**2**	**3**	**4**	5

		Answer
1.	Performing procedures that patients experience as painful	
2.	Criticism by a physician	
3.	Feeling inadequately prepared to help with the emotional needs of a patient's family	
4.	Lack of opportunity to talk openly with other personnel about problems in the work setting	
5.	Conflict with a supervisor	
6.	Inadequate information from a physician regarding the medical condition of a patient	
7.	Patients making unreasonable demands	
8.	Being sexually harassed	
9.	Feeling helpless in the case of a patient who fails to improve	
10.	Conflict with a physician	
11.	Being asked a question by a patient for which I do not have a satisfactory answer	
12.	Lack of opportunity to share experiences and feelings with other personnel in the work setting	
13.	Unpredictable staffing and scheduling	
14.	A physician ordering what appears to be inappropriate treatment for a patient	
15.	Patients' families making unreasonable demands	
16.	Experiencing discrimination because of race or ethnicity	
17.	Listening or talking to a patient about his/her approaching death	
18.	Fear of making a mistake in treating a patient	

19.	Feeling inadequately prepared to help with the emotional needs of a patient	
20.	Lack of an opportunity to express to other personnel on the unit my negative feelings towards patients	
21.	Difficulty in working with a particular nurse (or nurses) in my ***immediate*** work setting	
22.	Difficulty in working with a particular nurse (or nurses) **outside** my immediate work setting	
23.	Not enough time to provide emotional support to the patient	
24.	A physician not being present in a medical emergency	
25.	Being blamed for anything that goes wrong	
26.	Experiencing discrimination on the basis of sex	
27.	The death of a patient	
28.	Disagreement concerning the treatment of a patient	
29.	Feeling inadequately trained for what I have to do	
30.	Lack of support of my immediate supervisor	
31.	Criticism by a supervisor	
32.	Not enough time to complete all of my nursing tasks	
33.	Not knowing what a patient or a patient's family ought to be told about the patient's condition and its treatment	
34.	Being the one that has to deal with the patients' families	
35.	Having to deal with violent patients	
36.	Being exposed to health and safety hazards	
37.	The death of a patient with whom you developed a close relationship	
38.	Making a decision concerning a patient when the physician is unavailable	
39.	Being in charge with inadequate experience	
40.	Lack of support by nursing administration	
41.	Too many non-nursing tasks required, such as clerical work	
42.	Not enough staff to adequately cover the unit	
43.	Uncertainty regarding the operation and functioning of specialized equipment	
44.	Having to deal with abusive patients	
45.	Not enough time to respond to the needs of patients' families	
46.	Being held accountable for things over which I have	

	no control	
47.	Physician(s) not being present when a patient dies	
48.	Having to organize doctors' work	
49.	Lack of support from other health care administrators	
50.	Difficulty in working with nurses of the opposite sex	
51.	Demands of patient classification system	
52.	Having to deal with abuse from patients' families	
53.	Watching a patient suffer	
54.	Criticism from nursing administration	
55.	Having to work through breaks	
56.	Not knowing whether patients' families will report you for inadequate care	
57.	Having to make decisions under pressure	

OPEN-ENDED QUESTIONS

How do you perceive stress?

How do you want to be supported in managing your stress?

ANNEXURE 2

Grouping of Items Within Factors in the Expanded Nursing Stress Scale
The # after each item represents the number given to that item on the ENSS

Factor 1: Death and Dying

- Performing procedures that patients experience as painful. (# 1)
- Feeling helpless in the case of a patient who fails to improve. (#9)
- Listening or talking to a patient about his/her approaching death.(#17)
- The death of a patient. (#27)
- The death of a patient with whom you have developed a close relationship. (# 37)
- Physician not being present when a patient dies. (#47)
- Watching a patient suffer. (# 53)

Factor 2: Conflict with Physicians

- Criticism by a physician. (# 2)
- Conflict with a physician. (# 10)
- Disagreement concerning the treatment of a patient. (# 28)
- Making a decision concerning a patient when the physician is unavailable. (# 38)
- Having to organize physicians' work. (# 48)

Factor 3: Inadequate Emotional Preparation

- Feeling inadequately prepared to help with the emotional needs of a patient's family. (# 3)
- Being asked a question by a patient for which I do not have a satisfactory answer. (# 11)
- Feeling inadequately prepared to help with the emotional needs of a patient. (# 19)

Factor 4: Problems Relating to Peers

- Lack of an opportunity to talk openly with other unit personnel about problems in the work setting. (# 4)
- Lack of an opportunity to share experiences and feelings with other personnel in the work setting. (#12)
- Lack of an opportunity to express to other personnel on the unit my negative feelings toward patients.(#20)
- Difficulty in working with a particular nurse (or nurses) outside my immediate work setting. (# 22)
- Difficulty in working with a particular nurse (or nurses) in my immediate work setting. (# 21)
- Difficulty in working with nurses of the opposite sex. (#50)

Factor 5: Problems Relating to Supervisors

- Conflict with a supervisor. (#5)
- Lack of support from my immediate supervisor. (# 30)
- Lack of support by nursing administrators. (#40)
- Lack of support by other health care administrators. (# 49)
- Criticism by a supervisor. (#31)
- Being held accountable for things over which I have no control. (# 46)
- Criticism from nursing administration. (# 54)

Factor 6: Work Load

- Unpredictable staffing and scheduling. (# 13)
- Too many non-nursing tasks required such as clerical work. (#41)
- Not enough time to provide emotional support to a patient. (#23)
- Not enough time to complete all of my nursing tasks. (#32)
- Not enough staff to adequately cover the unit.(#42)
- Not having enough time to respond to the needs of the patients' families. (#45)
- Demands of patient classification system.(#51)
- Having to work through breaks. (#55)
- Having to make decisions under pressure. (# 57)

Factor 7: Uncertainty Concerning Treatment

- Inadequate information from a physician regarding the medical condition of a patient. (# 6)
- A physician ordering what appears to be inappropriate treatment for a patient. (#14)
- Fear of making a mistake in treating a patient. (# 18)
- A physician not being present in a medical emergency. (#24)
- Not knowing what a patient or a patient's family ought to be told about the patient's condition and its treatment. (#33)
- Being exposed to health and safety hazards.(#36)
- Uncertainty regarding the operation and functioning of specialized equipment. (# 43)
- Feeling in adequately trained for what I have to do.(#29)
- Being in charge with inadequate experience (#39)

Factor 8: Patients and their Families

- Patients making unreasonable demands. (#7)
- Patients' families making unreasonable demands. (#15)
- Being blamed for anything that goes wrong.(#25)
- Being the one who has to deal with patients' families. (#34)
- Having to deal with violent patients.(#35)
- Having to deal with abusive patients.(#44)
- Having to deal with abuse from patients' families.(#52)
- Not knowing whether patients' families will report you for inadequate care. (# 56)

Factor 9: Discrimination

- Being sexually harassed. (#8)
- Experiencing discrimination because of race or ethnicity. (#16)
- Experiencing discrimination on the basis of sex. (# 26)
- Instructions for the Scoring of the 57 item ENSS
-
- There are a total of 57 items in the Expanded Nursing Stress Scale. Two items (breakdown of computers and floating to other units/services that are short staffed) that were on the original NSS, under Workload and Conflict with supervisors respectively, did not appear to be related to any of the nine subscales that emerged in the study of Ontario nurses (Susan French, Rhonda Lenton, John Eyles and Vivienne

Walters. "An Empirical Evaluation of an Expanded Nursing Stress Scale". *Journal of Nursing Measurement*, Vol. 8, No. 2, 2000), we deleted them from the scale, but other investigators may wish to retain those items as separate indicators. Subsequent applications would be able to assess whether these two items load on the subscales in any situations or among different populations of nurses. The nine subscales that emerged, and the items in each subscale are as follows:

-
- a) Death and Dying - items 1,9,17,27,37,47 and 53
- b) Conflict with physicians - items 2, 10, 28, 38, 48
- c) Inadequate preparation - items 3, 11, and 19
- d) Problems with peers - items 4, 12, 20, 21, 22, and 50
- e) Problems with supervisors - items 5, 30, 31, 40, 46, 49 and 54
- f) Workload - items 13, 23, 32, 41, 42, 45, 51, 55 and 57
- g) Uncertainty concerning treatment - items 6, 14, 18, 24, 29, 33, 36, 39 and 43,
- h) Patients and their families - items 7, 15, 25, 34, 35, 44, 52 and 56
- i) Discrimination - items 8, 16 and 26
-
-
- In order to compute total stress score, we added together the scores on all 57 items. In order to measure scores on specific subscales, the appropriate items should be added together. In all cases, the category “not applicable” was scored as 0. Addressing missing data depends on the extent of the problem. While several options are available (some more complicated, such as using a regression method to estimate missed scores), we substituted missing values with mean scores for individual items, and proceeded to calculate the subscale score for any individual who had answered the majority of items in any subscale. In the case of the “Death and Dying” subscale, for example, an individual would have to have answered at least 4 of the 7 items that comprise the subscale. Otherwise, the subscale was not constructed, and the individual received was scored “missing” for that specific subscale.
-
- Items were scored so that the higher the score, the greater the frequency of stress on any subscale.
- It would be appreciated if you would forward a copy of your analysis of the ENSS to Dr. Lenton, at York University, and to Dr. Susan French at McGill University, so that we are able to monitor the assessment of the ENSS.
-
- Rhonda Lenton, PhD (Sociology)
- Susan E. French, R.N., PhD e-mail address: susan.french@mcgill.ca

The response to a similar inquiry by the member of our team (R. Lenton) who addressed the statistical analysis for the ENSS may be helpful.

Inquiry: When we administered the ENSS, an unusually large number of respondents reported “does not apply . The pattern was repeated in the second administration a year later to the same group of nurses. Scoring the D/A as 0 and dividing by 57 for an average could give a false low stress score. Two possible options are: score the D/A as a 1 with the rationale that if a situation has not been encountered, it has never been stressful; calculate the average stress level based on the items answered (that the nurse considered applicable to her/him)-dividing by number of questions answered results in a higher stress score when there are as number of items identified as D/A.

Response from Lenton:

1. If you are looking at the total number of indicators contributing to stress, it would make sense to code “D/A” as “1”.
2. Generally, however, you would likely be interested in trying to assess/measure the level of stress rather than the number of indicators contributing to it. As a consequence, I would expect a more accurate outcome to be produced by adding the scores and dividing by the number of factors contributing to it. If you did this for all respondents, each respondent has a level of stress average based on the specific items contributing to that person’s stress.
3. It may also be valuable, however, to assess whether there are any patterns to the “does not apply”-if a large number of respondents are answering “does not apply” to the same question(s) then perhaps the question(s) is/are no longer relevant. If the ‘does not apply” is randomly distributed among respondents then I would recommend 2 above.

ANNEXURE 3

This message originated from outside your organization

Dear Janis

Thank you for your interest in the ENSS. You have permission to use the ENSS. For your information I am attaching files containing a copy of the ENSS, scoring instructions, how the items grouped within the factors when we tested the ENSS and comments made by Lenton in response to questions raised about the scoring.

I wish you every success with your research

Best regards

Susan

Susan E. French, O.C., PhD

Emeritus Professor, McGill U

Sent from Mail for Windows 10

From: Janis Johnson
Sent: November 22, 2018 7:29 AM
To: susan.french@mcgill.ca
Subject: Permission to use the ENSS

Dear Dr French

Good day, I hope that you are well.

My name is Janis Johnson, I am a Nurse Educator at a higher education institution in South Africa.

I write to you in order to request your permission for the use of the ENSS medium version tool in my research study for fulfilment of Masters Degree in Nursing Education.

My research study is titled: Stress and Sources of stress in Bridging course students at a Private Nursing Education institution.

I will ensure that my data analysis is sent to you upon completion.

I thank you in advance.

Kind Regards

Janis Johnson

Education ***the Netcare Way*** for Carers of the Future

Academic Staff Member

Netcare Education; Gauteng South West Campus

Netcare Hospital Management (Pty)Ltd Trading as **Netcare Training Academy**

known as Netcare Education S1407

2 Bunting Road,

Aucklandpark,

Johannesburg,

South Africa

2010

Switchboard: +27(0)11-628-7600

Direct : +27(0) 11 628-7634

Mobile: +27(0)79 9200 460

Email: janis.johnson@netcare.co.za

Fax to email 086 602 7748

Website: www.netcare.co.za

Please consider whether it is necessary to print this email

CONFIDENTIALITY NOTICE: This e-mail may contain confidential information and is intended only for the use of the recipient named above. Should you receive this e-mail in error, please forward it to janis.johnson@netcare.co.za and delete from your inbox. Any disclosure, copying, distribution or action on the contents of this e-mail is strictly prohibited.

DISCLAIMER AND CONFIDENTIALITY NOTICE: NETCARE LIMITED
The information contained in this e-mail communication is confidential. This information is intended solely for the use of the intended recipient named above. If you have received this e-mail communication in error, please notify the sender immediately, forward it to the intended recipient, if you are aware of who the intended recipient is and delete this e-mail from your e-mail system immediately. In the event that you are not the intended recipient, you are hereby notified that any disclosure, distribution, use of, printing, copying or other action on the contents of this e-mail communication is strictly prohibited. This e-mail communication and its contents are not intended to be legally binding on Netcare Limited, its affiliates or the sender hereof nor should the contents hereof be construed to amend any contractual arrangement in place, unless explicitly stated herein. Netcare Limited accepts no liability for any loss or damage, whether direct, indirect, consequential or economic, however caused, which may result directly or indirectly from this e-mail communication or from any files attached hereto. Save for bona fide company matters, Netcare Limited does not accept any responsibility for any material, views or opinions contained in this email. This email is further subject to the provisions of the Protection of Personal Information Act 4 of 2013.

ANNEXURE 4

INFORMATION LETTER AND INVITATION TO PARTICIPATE IN THE STUDY

Good day respondent.

My name is Janis Johnson. I wish to conduct a study on Stress levels and sources of stress among bridging course nursing students at a private nursing education institution in Gauteng. In doing so I want to learn, what are the stress levels, sources of stress and what support is required to reduce stress of bridging course nursing students in this private nursing education institution. An understanding of the above factors can assist in developing and implementing a stress management programme.

Following the presentation on the study should you wish to participate, you can take your questionnaire to the allocated data collection venue to complete it. Your participation is completely voluntary and non-completion of the questionnaire equals non participation. The questionnaire will take about 30 minutes to complete. You can post the completed questionnaire in one of several sealed boxes strategically positioned in the venue.

To ensure confidentiality and anonymity, the questionnaires do not require your name to be filled in. Further the sealed boxes you post your questionnaire into will remain sealed and removed from the venues after each day and replaced the morning after during the data collection period to ensure that the boxes are not tampered with.

In the event that your participation in this study triggers any trauma or emotional distress, please feel free to contact the counsellor (Ms. Agnes Huiskamp 011 488 4237 / Agnes.Huiskamp@wits.ac.za) who will assist you in this regard.

The findings of the study will be made available to you once it is complete.

Thank you for your time and consideration.

Janis Johnson

Human Research Ethics Committee (Medical) contact details:

Chairperson: Professor C Penny
Contact: Clemet.Penny@wits.ac.za / 011 717 2301

Administrators : Ms. Zanele Ndlovu, Ms Mapula Maila and Mr. Rhulani Mkansi
Contact details: Zanele.Ndlovu@wits.ac.za, Mapula.Ramaila@wits.ac.za, Rhulani.Mkansi@wits.ac.za. / 011 717 1234/ 1252/ 2656/ 2700

ANNEXURE 5

This message originated from outside your organization

Dear Ms Johnson

This is to inform you that your revised protocol was approved by the Assessors. However, one of the Assessors suggested the following minor amendment:

- Page 7, Paragraph 1, line 6: indicate that the listed demographic items (age, gender, social and marital status) may predispose bridging course students to stress. Also indicate specific difference (are they generally older, females, married, at a certain social class level?

There is no need to submit a revised version.

Please contact Ms Palesa Khumalo within the next two weeks if you have not yet received your letter of approval.

TO NOTE: This email is to inform the student on the status of their protocol. FINAL ACCEPTANCE OF THE PROTOCOL IS DEPENDENT ON THE FACULTY CHAIR SIGNING OFF ON THE PROTOCOL & A LETTER BEING RECEIVED FROM FACULTY POSTGRADUATE OFFICE.

Kind regards

Irene

Mrs Irene Janse van Noordwyk
Administrative Officer

e-mail : Irene.Jansevannoordwyk@wits.ac.za
tel : +27 (0) 11 717 2063
fax : +27 (0) 11 717 2066
f2e : +27 (0) 86 553 5964
address : 7 York Road, Parktown, 2193

School of Therapeutic Sciences

WITS UNIVERSITY FACULTY OF HEALTH SCIENCES THERAPEUTIC Sciences

This communication is intended for the addressee only. It is confidential. If you have received this communication in error, please notify us immediately and destroy the original message. You may not copy or disseminate this communication without the permission of the University. Only authorised signatories are competent to enter into agreements on behalf of the University and recipients are thus advised that the content of this message may not be legally binding on the University and may contain the personal views and opinions of the author, which are not necessarily the views and opinions of The University of the Witwatersrand, Johannesburg. All agreements between the University and outsiders are subject to South African Law unless the University agrees in writing to the contrary.

ANNEXURE 6

UNIVERSITY OF THE WITWATERSRAND, JOHANNESBURG

R14/49 Mrs Janis Johnson

HUMAN RESEARCH ETHICS COMMITTEE (MEDICAL)

CLEARANCE CERTIFICATE NO. M180438

NAME: (Principal Investigator)	Mrs Janis Johnson
DEPARTMENT:	Nursing Education Netcare Education Gauteng North East Campus
PROJECT TITLE:	Sources of Stress and coping behaviours among bridging course nursing students at a private nursing education institution in Gauteng
DATE CONSIDERED:	04/05/2018
DECISION:	Approved unconditionally
CONDITIONS:	
SUPERVISOR:	Ms Lizelle Crous
APPROVED BY:	Professor CB Penny, Chairperson, HREC (Medical)
DATE OF APPROVAL:	20/08/2018

This clearance certificate is valid for 5 years from date of approval. Extension may be applied for.

DECLARATION OF INVESTIGATORS

To be completed in duplicate and **ONE COPY** returned to the Research Office Secretary on the Third Floor, Faculty of Health Sciences, Phillip Tobias Building, 29 Princess of Wales Terrace, Parktown, 2193, University of the Witwatersrand. I/we fully understand the conditions under which I am/we are authorized to carry out the above-mentioned research and I/we undertake to ensure compliance with these conditions. Should any departure be contemplated, from the research protocol as approved, I/we undertake to resubmit the application to the Committee. **I agree to submit a yearly progress report**. The date for annual re-certification will be one year after the date of convened meeting where the study was initially reviewed. In this case, the study was initially reviewed in April and will therefore be due in the month of April each year. Unreported changes to the application may invalidate the clearance given by the HREC (Medical).

Principal Investigator Signature Date 22/08/2018

PLEASE QUOTE THE PROTOCOL NUMBER IN ALL ENQUIRIES

ANNEXURE 7

RESEARCH OPERATIONS COMMITTEE FINAL APPROVAL OF RESEARCH

Approval number: UNIV-2018-0029

Ms Janis Johnson

E mail: janis.johnson@netcare.co.za

Dear Ms Johnson

RE: STRESS LEVELS AND SOURCES OF STRESS AMONG BRIDGING COURSE NURSING STUDENTS AT A PRIVATE NURSING EDUCATION INSTITUTION IN GAUTENG

The above-mentioned research was reviewed by the Research Operations Committee's delegated members and it is with pleasure that we inform you that your application to conduct this research at Private Nursing Education Institution, has been approved, subject to the following:

i) Research may now commence with this FINAL APPROVAL from the Committee.

ii) All information regarding the Company will be treated as legally privileged and confidential.

iii) The Company's name will not be mentioned without written consent from the Committee.

iv) All legal requirements with regards to participants' rights and confidentiality will be complied with.

v) All data extracted may only be used in an anonymised, aggregated format and for the purposes of this specific study as specified in the proposal. The data may under no circumstances be used for any other purpose whatsoever.

vi) The Company must be furnished with a STATUS REPORT on the progress of the study at least annually on 30th September irrespective of the date of approval from the Committee as well as a FINAL REPORT with reference to intention to publish and probable journals for publication, on completion of the study.

vii) A copy of the research report will be provided to the Committee once it is finally approved by the relevant primary party or tertiary institution, or once complete or if discontinued for any reason whatsoever prior to the expected completion date..

viii) The Company has the right to implement any recommendations from the research.

ix) The Company reserves the right to withdraw the approval for research at any time during the process, should the research prove to be detrimental to the subjects/ Company or should the researcher not comply with the conditions of approval.

x) APPROVAL IS VALID FOR A PERIOD OF 36 MONTHS FROM DATE OF THIS LETTER OR COMPLETION OR DISCONTINUATION OF THE STUDY, WHICHEVER IS THE FIRST.

We wish you success in your research.

Yours faithfully

22/6/18

Prof Dion du Plessis
Full member: Research Operations Committee & Medical Practitioner evaluating research applications as per Management and Governance Policy

Shannon Nell
Chairperson: Research Operations Committee
Date: 18/7/2018

This letter has been anonymised to ensure confidentiality in the research report. The original letter is available with author of research

ANNEXURE 8

LETTER CONFIRMING APPROVAL OF NON-TRIAL RESEARCH TO BE CONDUCTED IN THIS [redacted] FACILITY

Dear Janis Johnson

RE: Stress levels and sources of stress among bridging course nursing students at a private nursing education institution in Gauteng

We hereby confirm knowledge of the above named research application made to the [redacted] Research Operations Committee and agree to the research application for the [redacted] Campus, subject to the following:

1. That the data collection may not commence prior to the receipt of the FINAL APPROVAL from the [redacted] Research Operations committee.

2. A copy of the research report will be provided to the [redacted] Research Operations Committee once finally approved by the tertiary institution or once completed.

3. [redacted] has the right to implement any recommendations from the research

4. That the Campus Management reserves the right to withdraw the approval for the research at any time during the process, should the research prove to be detrimental to the subjects / [redacted] or should the researcher not comply with the conditions of approval.

We wish you every success in your research

Thank you

Your's in Education

_____
Rene Schaefer

ANNEXURE 9

Dear Janis Johnson

I am willing to assist with counselling should the need arise for your students.

Best wishes

Kind regards

From: Janis Johnson [mailto:Janis.Johnson@netcare.co.za]
Sent: 12 June 2018 02:38 PM
To: Agnes Huiskamp
Cc: Lizelle Crous
Subject: Counsellor

Dear Ms Huiskamp

Good afternoon, I hope that you are well.

As discussed yesterday please can I confirm that you will be available to counsel the participants in my study should the need arise and that I can supply your contact details on the student information letter for this purpose.

Thank you once again for your assistance. It is highly appreciated.

Kind Regards

Janis Johnson

Education ***the Netcare Way*** for Carers of the Future

Academic Staff Member

Netcare Education; Gauteng South West Campus

Netcare Hospital Management (Pty)Ltd Trading as **Netcare Training Academy known as Netcare Education S1407**

2 Bunting Road,

Aucklandpark,

Johannesburg,

South Africa

2010

Switchboard: +27(0)11-628-7600

Direct : +27(0) 11 628-7634

Mobile: +27(0)79 9200 460

Email: janis.johnson@netcare.co.za

Fax to email 086 602 7748

Website: www.netcare.co.za

Please consider whether it is necessary to print this email

CONFIDENTIALITY NOTICE: This e-mail may contain confidential information and is intended only for the use of the recipient named above. Should you receive this e-mail in error, please forward it to janis.johnson@netcare.co.za and delete from your inbox. Any disclosure, copying, distribution or action on the contents of this e-mail is strictly prohibited.

DISCLAIMER AND CONFIDENTIALITY NOTICE: NETCARE LIMITED
The information contained in this e-mail communication is confidential. This information is intended solely for the use of the intended recipient named above. If you have received this e-mail communication in error, please notify the sender immediately, forward it to the intended recipient, if you are aware of who the intended recipient is and delete this e-mail from your e-mail system immediately. In the event that you are not the intended recipient, you are hereby notified that any disclosure, distribution, use of, printing, copying or other action on the contents of this e-mail communication is strictly prohibited. This e-mail communication and its contents are not intended to be legally binding on Netcare Limited, its affiliates or the sender hereof nor should the contents hereof be construed to amend any contractual arrangement in place, unless explicitly stated herein. Netcare Limited accepts no liability for any loss or damage, whether direct, indirect, consequential or economic, however caused, which may result directly or indirectly from this e-mail communication or from any files attached hereto. Save for bona fide company matters, Netcare Limited does not accept any responsibility for any material, views or opinions contained in this email. This email is further subject to the provisions of the Protection of Personal Information Act 4 of 2013.

This communication is intended for the addressee only. It is confidential. If you have received this communication in error, please notify us immediately and destroy the original message. You may not copy or disseminate this communication without the permission of the University. Only authorised signatories are competent to enter into agreements on behalf of the University and recipients are thus advised that the content of this message may not be legally binding on the University and may contain the personal views and opinions of the author, which are not necessarily the views and opinions of The University of the Witwatersrand, Johannesburg. All agreements between the University and outsiders are subject to South African Law unless the University agrees in writing to the contrary.

Annexure: 10

CODING AND THEMES

OPEN EDNDED QUESTION 1 CODING AND THEMES

BC 1 Q1

Responses	Code
Very frustrating.	e
A situation that I cannot change, Financial Problems	e
After a shift, feels like I was hit by a bus.	p
I feel like I can sleep forever and never wake up.	p
An emotional breakdown.	e
It kills you silently	h
As a barrier that limits my ability to be the best	e
Being angry, exchanging words	e
Beyond my control. Resigning or death is the only option.	h
By shouting and to be alone	i
Cannot think straight.	m
Making a lot of mistakes	m
Cant cope with family and school demands	h
Dealing with someone's feelings.	e
Dealing with unreasonable people	e
Difficult	m
Difficult to deal with. Saddens you.	e
Disturbing, Cant even cope.	e
Feeling sick and like quitting.	s
Drinking alcohol and crying on my own	h
Eating a lot	e
Emotional feeling, due to work load, school work or financial inability.	e
Emotional feeling. Cannot think straight	e
Emotionally drained. Fail to manage self. So much on your mind	e
Feeling depressed and having suicidal thoughts, quitting the career. Stay at home, cry and think of my worries.	e
Having a lot to deal with. Not having a solution. Interferes with your life.	h
I am emotionally, physically and financially drained. I feel like giving up, I feel I am drowning	h
I cannot handle and live with stress	h

I cry	e
I cry and become sad.	e
I feel helpless. Think negative. Feel emotionally drained and overwhelmed	h
I go home free from work related stress	c
I isolate myself	i
I lose control. Don’t want to work.	h
I prefer to be alone and sleep	i
It puts me under pressure. I am obliged to perform. I cant concentrate. I cannot cope	m
Limits you, make you not think and act properly. Sleepless, tires, frequent mistakes. Cannot cope	i
Loss of esteem, feels tired	e
Low self-esteem, difficult, cant thick straight	H
Make you life stuck. Having chronic condition. Lead to depression	e
Mentally consumed, pressure, expected obligations	m
Mood killer, Kills the drive	m
Needing strong emotional intelligence, seek help where possible	e
No support, over whelming workload, more time at work	p
Not being able to function properly. Having doubt and not believing in your ability.	e
Out of our comfort zone	e
Overload, loss of balance in life.	e
Overloaded with work	p
Panicking and freaking out.	e
Pressure, Emotional,	e
Pressure, I adequacy, feeling helpless	e
Something I had to go through to be strong.	c
Stress can be physical, emotional and psychological.	e
Stress can cause depression, especially when not coping at college or work	e
Stressful, making wrong decisions.	e
Stressful. Some unit managers are painful and stressful.	e
Talk to someone I trust, call my mom. Keep quiet	c
Talking to strangers about my stress. Crying	e
There is always a solution to problems	c
This research has allowed me to show what is stressful.	e
To deal with what is causing it	c

Trying to cope and organise myself better. Really difficult at work when nursing 10 patients	p
Unable to handle a situation. I cry a lot.	e
Understand or manage it by praying for strength everyday.	e
Very draining, Have a negative impact	e
Very frustrating.	e
Went wrong during ,my working hours to relieve my stress.	e
When I try my best but I am not appreciated.	e
being strong, Seeing things on the negative part	e

BC 1 OPEN ENDED Q1 -		
Themes	**Code**	**Count**
Emotionally Taxing	E	33
Physical Fatigue	p	5
Helpless	H	10
Isolated	I	4
Sick	S	1
Mental Fatigue	M	6
Coping	c	5

Proportion	
Emotionally Taxing	55%
Helpless	14%
Mental Fatigue	9%
Coping	7%
Physical Fatigue	7%
Isolated	6%
Sick	1%

BC 2 Q 1

Responses	Code
A part of life	c
A part of life	c
A part of life	c
A situation that is not easy to deal with	e
A task that I have to overcome in order to learn and grow.	c
Affects me emotional.	e
Be aware of who I should stay away from	e
Bridging is stressful. Everything is stressful.	e
Can lead to depression	e
Cause of depression leading to poor job performance and can lead to many health problems	e
Clinical or theory stress in unbearable. I feel emotional detachment. Depression, Insomnia and feeling miserable	e
Deprives you to achieve your goals.	m
During theory and practical exams	m
Eating and sleeping a lot	e
Emotional attack which leaves us helpless when a patient dies.	e
Exercise and Music helps me	c
Facial expression changes.	e
Feel not recognised	e
Feel out of place and confused. Takes my concentration	h
Feel tired and hopeless	h
Feeling tired and hopeless	h
Going out with family	c
Has an effect on my health, family and finance	s
Hate, Sleep, cry, drink alcohol, abuse my husband sexually for the whole night, it is heart breaking	e
Having too many serious problems leads to depression	e
Headache every day.	s
I cry and shout at my family when I get home	e
I eat a lot and push forward	e
I eat a lot when stressed	e
I sleep	p
I sleep a lot	p
I sleep.	p
I struggle to cope.	m
I struggle to control my thoughts.	m

Ignore	m
In the clinical setting I am expected to know so much. Theoretical and clinical stress. Not enough staff in the wards.	m
Incurable disease that eats you slowly.	s
Interrupts emotional stability and well-being	e
Isolating myself, sleep a lot	i
It bring obstacles that can be overcome	c
Its not easy, but all in all I being calm	c
Like a step ladder that has no ending	p
Makes me disorientated and scared	e
Making a noise and becoming frustrated	e
Mind is being disturbed by something you are not happy about	e
More sex, eat a lot. Go out for air	e
Painful experience	e
Physically draining. Make me not to cope. Slows down my immune system.	s
Pray and worship. Ignore	c
Pressure of work on a daily basis	p
Situation with high pressure and lack of support	m
Sleeping a lot, no time management, no focus	m
Sleeping the whole day	p
Something that can be controlled	c
Stress comes from the Surgical nursing text book and PSR	m
Stress make me not to cope	m
Stress occupies one's mind to the point where you cannot function.	m
Stressful no time for kids and husband	p
Talk to friends about problems, listen to chilled music	c
Talk to the unit manger	e
Theoretical and clinical stress.	m
Tired and helpless	h
Incurable disease that eats you slowly.	h
Under pressure. Workload is too much	h
Unhappy, moody , disorganised	h
Very straining in the clinical environment. Deprives you to achieve your goals.	m
Very stressful with school work and have to manage stress with patients	m
Work load is too much, become nervous, heart beats fast	e
Working quietly, don't want to talk, don't want any noise	e
Working under pressure, not enough staff, cant cope	p

Write my problems down. Pray	e

BC 2 OPEN ENDED Q1 - Themes	Code	Count
Emotionally Taxing	E	28
Physical Fatigue	p	10
Helpless	H	8
Isolated	I	1
Sick	S	4
Mental Fatigue	M	14
Coping	c	7

Proportion:	
Emotionally Taxing	39%
Mental Fatigue	21%
Physical Fatigue	12%
Helpless	10%
Coping	10%
Sick	6%
Isolated	1%

OPEN EDNDED QUESTION 2 CODING AND THEMES

BC 1 Q2

Responses	**Code**
Only 1o patients in the ward.	a
A system where students can be addressed appropriately and not give complaints with no response.	p
Campus must come up with strategies to help with lectures, I feel like it is good for them when students fail.	as
Campus to ensure staff maintain confidentiality, don't discuss other learners in class.	as
Counselling be provided.	e
Counselling once a month on the condition of the patient	e
Counselling, emotional support, not to work under pressure.	e
Counselling, emotional support. Life coaching	e
Create a Support system to talk about stress	p
Emotional support	e
Enough staff on duty.	a
Enough staff. Physicians to be addressed on how to treat us.	a
Ensure students get opportunity to learn.	l
Fair allocation in the hospital. More staff allocated on duty	a
Financial support.	f
Get more time for studies and learning opportunities in the hospital.	l
Give a platform for students to talk and someone to listen	p
Give enough time to adapt. Work at own pace	a
Give in-service on how to interact with each other.	l
Given chance to learn and not only nurse patients in clinical facility.	l
Have 3 days a week of school to save money for transport. Be able to always contact my CF.	f
Have a platform for support, professional and emotional support.	p
Have a support group, to discuss stress and express feelings.	p
Have a toll free line to call in times of need.	a
Have enough staff per shift.	a
Have freedom of speech. Fix acuity as work load kills nurses.	a
Having a mentor	l
Having a platform to discuss stress with the MDT	p
Having less work activities at college and hospital	a
How to control, overcome and deal with stress.	e
I doubt anyone can help.	e

I need support from family and colleagues	e
I think I am still coping well. Need to focus on my education.	c
I want less patient. 10 is a lot.	a
Increase salary and support students in the ward.	f
Lecturers and CF's to advocate for us, on abuse and difficulty faced in the clinical setting	as
Lecturers to stick to the study guide when teaching.	as
Less patient allocation	a
Less patients for students	a
Managers to stop being harsh to nurses	e
Mandatory counselling, after death of patient or trauma	p
More staff for student support	as
No stress for coming late to class every day.	e
Not allocated so many patients.	a
Not work under pressure and stress from the unit manager.	e
Nurses right should be catered for.	e
Nursing management should come observe how much work we have.	a
Nursing management to listen. Must pay overtime as transport is expensive.	f
One on one communication with an experienced personnel	p
Professional person to talk to without being judged.	p
Psychologists must be available in the work place.	p
Reasonable working conditions.	a
Reduce work load in the ward	a
Reducing the number of patients.	a
Somebody to talk to.	p
Someone to listen to me and cry without judgement	p
Someone to listen to me. Be supported financially.	p
Someone to talk to in the form of counselling.	p
Stop unfair allocation	a
Strategy of how to deal with doctors that they shout at nurses, even though there is a shift change.	as
Student complaints to be listened to.	p
Students must stop being overworked.	a
Student’s problems should be addressed.	p
Study support, Funding for studies	f
Support	as
Support after death of a patient.	p
Support and teamwork. Reasons for conflict must be identified.	as
Support from my clinical facilitator.	as

Support from unit managers and clinical facilitators.	as
Support group	p
Support group. Reducing our work load.	a
Support.	p
Talk to someone as support for my stress	p
Teach a technique on how not to over-react during stressful situations.	p
Team work.	e
To be supported.	p
Understanding that no one is the same with performance.	p
You decide if you want things to work or not.	c
managing stress, dealing with stress	c

Themes	Codes	Count
Professional Stress Management	P	20
Adequate Staffing	A	18
Emotional Support	E	10
Academic Staff Support	AS	8
Learning opportunities	L	3
Financial Support	F	3
Coping	C	2

Proportion	
Professional Stress Management	29%
Adequate Staffing	25%
Emotional Support	16%
Academic Staff Support	13%
Learning opportunities	6%
Financial Support	6%
Coping	4%

BC2 Q 2

Responses	Code
A shoulder to cry on.	p
Always be surrounded by positive energy	as
Be listened to and get advice.	p
Being given time to go through the stress slowly	p
Coping mechanisms and counselling	p
Educators at campus need to be changed due to attitude, always bragging about qualifications	as
Enough staff and fair allocation of patients.	a
Family and loved ones help managing stress	c
Family members support me	c
Family to be with me. Financial freedom	f
Finance	f
Give me time off	a
Group discussion to find a way of expressing myself	p
How to cope when a patient dies.	p
I am managing my stress by being with loved ones.	c
I deal with my stress by talking to my friends or my sister	c
I don't need support, we have Icas	c
I don't think that I can be helped, I am mentally, emotionally, financially stressed. I have no motivation	p
I get more support from my family	c
I have enough family support.	c
I have enough support from family.	c
I should be heard then solution be discussed.	p
Instant help facility on the unit. Be counselled.	p
Just want to be left alone	p
Less hours of work, finish campus work first then start with hospital.	a
Meeting and interacting with people	p
Money	f
More needs to be done to manage stress	p
Motivate, encourage and understand us	p
Need to be taught how to deal with stress	p
Needs to be heard. Management to show support.	p
Patient allocation must be less than 8	a
Patient problems must be investigated before someone is blamed	e
Professional support from Clinical psychologist	p

Receiving counselling	p
Salary increase, support system, training on bullying for matrons and staff who bully us.	f
Salary increase. Campus to change staff who do not know how to support us, lecture and plan for class	as
Senior staff to understand and be supportive.	as
Separation of theory and practical hours	l
Separation of theory and practical hours	l
Someone who can listen.	p
Speak out about stress. Help me	p
Someone to talk to us about stressors.	p
Stress management mechanisms	p
Stress management strategies	p
Support facilities in the hospital	p
Support from Unit manager. Fair allocation and less workload	a
Support from family	e
Support from family and colleagues to deal with stress	as
Support from management, enough staff	as
Support system from home, work and school	l
Talking about the situation	l
Talking to someone with knowledge and understanding	p
The support systems implemented by Netcare are not followed through correctly to help students	p
Talking to us, understanding us and being there for us	p
Teaching us	l
Teamwork especially with management and the doctors	as
The support systems in place are not followed through properly.	p
To find stress management ways	p
To be given more time to study	l
To be supported and not judged.	p
To have emotional support immediately	e
To talk to someone professional.	p
Understand we are humans and that the pressure of nursing 10 patients is too much.	a
Understand where a person is in life	e
TABLE OF CONTENTS	
We support each other as students	e
Keep calm and deal with stress	c

Themes	Codes	Count
Professional Stress Management	P	33
Adequate Staffing	A	8
Emotional Support	E	5
Academic Staff Support	AS	8
Learning opportunities	L	6
Financial Support	F	4
Coping	C	9

Proportion	
Professional Stress Management	44%
Coping	13%
Academic Staff Support	12%
Adequate Staffing	9%
Learning opportunities	9%
Emotional Support	7%
Financial Support	6%