

THE LIVED EXPERIENCES OF STUDENT NURSES DURING SIMULATION OF
PERINATAL LOSS

by

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Liberty University

A Dissertation Presented in Partial Fulfillment

Of the Requirements for the Degree

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ABSTRACT

The purpose of this phenomenological study was to understand the experiences and perceptions of undergraduate nursing students in providing care following a perinatal loss simulation. The theories that guided this study included Malcolm Knowles' Theory of Andragogy and the National League for Nursing Jeffries Simulation. The selected theories provide structure for adult learners' need to experience situational learning activities that are relevant to their job while building upon the foundation of students' knowledge. Incorporation of Knowles' and Jeffries' theories guides the qualitative study of the simulation of a perinatal loss and the experiences of nursing students in providing care during difficult situations involving death. Perinatal loss is defined as any unintentional loss, from conception to the first 28 days of life, encompassing miscarriage, therapeutic abortion for fetal abnormalities, stillbirths, or neonatal death. The central study question is: What are the experiences of perinatal loss and the impact of the experience on undergraduate student nurses? The data were collected in the university simulation lab and consisted of a three-participant group simulation with a standardized patient who had experienced a perinatal loss. Participants were juniors and seniors enrolled in or had completed their maternal-child health rotation. Audio-recorded interviews were conducted to understand the experiences of the 13 selected participants. The interviews were analyzed through computer software to code, annotate, and identify the emerging themes. Findings revealed a lack of death education, especially perinatal loss. Participants expressed a need for increased training to improve communication skills, human interaction, and confidence. Further research is recommended across the healthcare continuum.

Keywords: perinatal loss, stillbirth, death, simulation, education, experience

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Dedication

This dissertation is dedicated to my father, Dr. Richard Ronald Gowens. Your dedication to obtain your Ph.D. inspired me to follow in your footsteps. Though you are not here to see me finish this journey, you were there to watch me start. I love you, papa.

To sweet baby Josue, who was peacefully born asleep, I will forever remember your perfect face and the time I spent with you, building forever memories for your family.

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Table of Contents

ABSTRACT 3

Copyright Page 4

Dedication..... 5

Acknowledgments 6

List of Tables 10

List of Figures..... 11

List of Abbreviations 12

CHAPTER ONE: INTRODUCTION 13

 Overview 13

 Background..... 14

 Problem Statement..... 17

 Purpose Statement 19

 Significance of the Study..... 19

 Research Question 21

 Definitions 22

 Summary..... 23

CHAPTER TWO: LITERATURE REVIEW 24

 Overview 24

 Theoretical Framework 25

 Related Literature 28

 Summary..... 52

CHAPTER THREE: METHODS..... 54

Overview	54
Design.....	54
Research Question	55
Setting.....	55
Participants	56
Researcher Positionality	58
Researcher's Role.....	59
Procedures	60
Data Collection.....	64
Interviews	65
Data Analysis.....	68
Trustworthiness	69
Credibility	69
Transferability	70
Dependability	70
Ethical Considerations.....	71
Summary.....	72
CHAPTER FOUR: FINDINGS	73
Overview	73
Participants	73
Results	74
Summary.....	99
CHAPTER FIVE: CONCLUSION	101

Overview	101
Summary of Findings	101
Discussion.....	104
Conclusion.....	124
REFERENCES	128
APPENDICES.....	145

List of Tables

Table 1: Encounters with Family Experiencing Perinatal Loss	34
Table 2: Demographics of Participants	74
Table 3: Themes, Subthemes, and Codes	75

List of Figures

Figure 1: Baby Josue	127
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List of Abbreviations

American Association of Collegiate Nursing (AACN)

End-of-Life Nursing Education Consortium (ELNEC)

High-Fidelity Simulation (HFS)

Institutional Review Board (IRB)

International Nursing Association for Clinical Simulation and Learning (INASCL)

Intrauterine Fetal Demise (IUFD)

National League of Nursing (NLN)

CHAPTER ONE: INTRODUCTION

Overview

Conversations about death can lead to feelings of discomfort and unease for some individuals. Unconscious forces prevent individuals from thinking about death (Frye, 2019). Society has created forms of cultural adaptation meant to keep people from becoming conscious of their mortality (Frye, 2019). Discussing death in nursing education and nursing practice is necessary because nurses encounter the death of patients throughout their nursing careers. These death-related experiences can be challenging, especially for novice nurses. For the purpose of this study, perinatal loss refers to any unintentional loss, from conception to the first 28 days of life, encompassing miscarriage, therapeutic abortion for fetal abnormalities, stillbirths, or neonatal death (Qian et al., 2021). Although providing care for a dying patient is anticipated in nursing, providing nursing care to a patient experiencing perinatal loss can be more challenging due to the emotional factors and limited training for undergraduate student nurses.

Undergraduate student nurses' perceptions and experiences in providing nursing care following a patient's perinatal loss, specifically that of a stillbirth or intrauterine fetal demise (IUFD), through simulation provide insightful opportunities for improving student and patient outcomes to loss. The purpose of this hermeneutic phenomenological study was to understand the perceptions and experiences of undergraduate nursing students in simulation education involving perinatal loss, specifically that of a stillbirth or intrauterine fetal demise (IUFD). This chapter addresses the background, problem statement, purpose statement, and significance of the study.

Background

The importance of the historical, social, and theoretical context of perinatal loss demonstrates the effects of perinatal loss on the population and nursing community. Perinatal loss occurs in 20% to 30% of worldwide pregnancies (Fernandez-Bastanta et al., 2019), yet the percentage is greater when incorporating the amount of losses that occur outside of the hospital and are not recorded (Shen et al., 2022). A low percentage of students feel their curriculum prepared them to cope with death (Heise et al., 2018). Understanding the effects of perinatal loss can guide educators to provide increased training to nursing students and allow for the nursing students to care for the patients while emotionally caring for themselves.

Historical Context

Perinatal loss refers to any unintentional loss, from conception to the first 28 days of life, encompassing miscarriage, therapeutic abortion for fetal abnormalities, stillbirths, or neonatal deaths (Qian et al., 2021). Scientific advancements and improved healthcare quality for pregnant women have decreased the rate of stillbirths by 3% since 2010 (Saleem et al., 2018). Although advancements in pregnancy healthcare have improved, 20% to 30% of worldwide pregnancies end in miscarriage (Fernandez-Bastanta et al., 2019), 2.6 million in stillbirths, and 2.7 million in neonatal death (Shen et al., 2022). Total perinatal mortality could be even higher if miscarriages and therapeutic abortions failed to be recorded in hospitals (Shen et al., 2022). Of the worldwide stillbirths, 98% occur in low-income and middle-income countries (Gandino et al., 2019). Each year, India has the highest number of stillbirths in the world (Sarkar et al., 2022). In the United States alone, approximately 2.4 million fetal and neonatal deaths occur each year (Berry, 2022). The rate of stillbirths in the U.S. greatly exceeds the rates of many other industrialized countries (Ford et al., 2018).

Fetal anomalies are the leading cause of infant death and pregnancy termination (Guclu et al., 2021). It is estimated that 47% to 90% of all anomalous pregnancies end in termination (Zwerling et al., 2021). Most women deliver stillbirths at hospitals due to seeking medical attention when it was too late to save the fetus or the hospital lacked adequate equipment along with essential healthcare services (Saleem et al., 2018). Sarkar et al. (2022) found among their research participants that 60.7% of IUFDs were detected on the first ultrasound and stillbirth deliveries occurred within one week of demise. Women experiencing an IUFD may prefer an imminent delivery through labor induction, surgical termination through dilation and evacuation, or a delayed delivery in which 80% to 90% of women will experience spontaneous labor within one to two weeks of diagnosis (Chakhtoura et al., 2015). Labor inductions for IUFDs or second-trimester abortions occur in the inpatient setting (Zwerling et al., 2021). Surgical termination includes dilation and evacuation, which is generally utilized for women undergoing termination of pregnancy between 14 to 24 weeks of gestation (Chakhtoura et al., 2015). However, Salgado et al. (2021) found women who choose to be induced and experience labor and vaginal birth will experience better physical conditions to hold the baby, have a farewell moment, participate in rituals, and get pregnant again sooner.

Social Context

High stillbirth rates in low-middle-income countries could be contributed to factors that include advanced or young maternal age, lack of education and awareness of danger signs, lack of prenatal care, low socioeconomic status, and the inability to make timely decisions about seeking medical care (Saleem et al., 2018). Education of women's sociocultural barriers to seeking prenatal care and childbirth may aid in early intervention and further decrease the rate of stillbirths (Saleem et al., 2018). Many parents avoid certain situations to deal with their loss and

avoid reliving the pain (Fernandez-Bastante et al., 2019). Culturally, some parents avoid expressing their grief due to a lack of social acceptance and the prohibition of expressions of mourning (Fernandez-Bastante et al., 2019). Adequate emotional support from nurses and partners can significantly lower depression levels and aid in coping with stress after a stillbirth (Sarkar et al., 2022).

Nurses provide support to the family of a stillbirth through a patient-centered approach, which responds to the sociocultural context and unique needs of the parents (Sarkar et al., 2022). Although a patient-centered approach can help parents, nurses report not having sufficient skills in grief counseling (Fernandez-Ferez et al., 2021). To address perinatal death appropriately, it is necessary to train nurses to feel safe and well-trained to face these circumstances with compassion and confidence (Fernandez-Ferez et al., 2021). Deep professional knowledge with emotional management is a valuable asset for healthcare professionals caring for bereaving parents (Gandino et al., 2019).

Early education in the undergraduate setting provides student nurses with enhanced skills to manage unexpected grief in the obstetric clinical setting (Knight et al., 2015). Students who experienced the simulation of a fetal demise expressed increased comfort in showing their emotions, communicating, and being present for a grieving family (Knight et al., 2015). The ability of nursing students to process their emotions and grief in a safe environment before experiencing it in the clinical setting allows the student to be present and communicate more effectively with grieving families (Bailey & Bishop, 2017).

Theoretical Context

Nationally, 41% of nursing students reported being present at a patient's death, but only 17% felt their curriculum prepared them to cope with the death of a patient (Heise et al., 2018).

Similar to Knight et al. (2015), Bishop and Bailey (2017) found fetal demise simulation in undergraduate nursing education was beneficial to provide students with the skills necessary in providing care to bereaving families. To further extend and refine the existing knowledge of simulation in undergraduate nursing education, Malcolm Knowles' theory of andragogy and Jeffries' simulation theory guide the simulation of a 40-week stillbirth to address areas in the curricular gap of death education in the obstetric setting. Undergraduate student nurses' perceptions and experiences in providing care following a patient's perinatal loss, specifically that of a stillbirth or IUFD, through simulation provides insightful opportunities for improving student and patient outcomes to loss.

Problem Statement

Perinatal loss, which includes miscarriage, therapeutic abortion, stillbirth, or neonatal death occurring a few days after delivery is a painful event that is largely overlooked in the healthcare system (Gandino et al., 2019). This overlook in the healthcare systems stems from the lack of vocational training on academic knowledge in dealing with healthcare professionals' emotional needs and delivering appropriate care to bereaved parents (Gandino et al., 2019). The lack of knowledge of handling an IUFD leaves nurses experiencing distress (Zwerling et al., 2021). Along with feelings of distress, the problem in caring for a patient who has experienced a perinatal loss can leave nurses feeling a mix of emotions and inadequacy in providing care (Zwerling et al., 2021).

The Institute of Medicine (IOM), the American Nurses Association (ANA), and Hospice and Palliative Nurses Association (HPNA) recommend all clinicians should be competent in providing end-of-life care and palliative care to patients, yet only 25% of nursing schools across the nation incorporate these topics. Several studies, including Byrne et al. (2020), Mohammad

(2020), Stokman et al., (2021), and Smith et al. (2018) reviewed the inclusion of death and end-of-life care in undergraduate nursing curricula; however, limited research evaluated the integration of perinatal loss into undergraduate nursing curricula. The American Association of Colleges of Nursing (AACN) emphasizes the importance of life and death in the nursing education process for students to recognize death as a natural process (Thane, 2020). The large gap between education and practice can leave students feeling emotional distress and inadequacy in communicating with patients and patients' families (Cheon & You, 2022). Nurses express a high level of distress and no knowledge of handling an IUFD before choosing labor and delivery (Zwerling et al., 2021).

A low percentage of students feel their curriculum prepared them to cope with death (Heise et al., 2018). Not incorporating death education into the curriculum may leave students feeling a lack the skills and knowledge to offer compassionate and quality care (Okein, 2021). There is a broader need for end-of-life care education but universities are challenged with curricula that are already extensive (Stockman et al., 2021). Curriculum integration of simulation of a perinatal loss in undergraduate nursing education can help fill a gap to improve students' perceptions and experiences in handling situations involving death.

The problem is death education is limited in undergraduate nursing programs. The gap in curricular education may leave nursing students feeling a lack of skills and knowledge in providing care in difficult situations involving death, especially that of a stillbirth. Along with a sense of lacking skills, nurses feel high levels of distress in handling IUFDs. The preparation of undergraduate nursing students handling death situations in the clinical setting is challenging and can affect patient care, experiences, and outcomes.

Purpose Statement

The purpose of this hermeneutic phenomenological study is to understand the perceptions and experiences in simulation education involving perinatal loss, specifically that of a stillbirth or intrauterine fetal demise (IUFD), for 13 undergraduate nursing students at a small, private university in the southeastern U.S. At this stage in the research, the lived experience will be generally defined as involvement in simulation education of a stillbirth. Lived experiences, through the hermeneutic phenomenological approach, provide a deeper understanding of specific aspects to understand experiences and phenomena (Mulli et al., 2022).

The theories that guided this study include Malcolm Knowles' theory of andragogy and the National League for Nursing (NLN) Jeffries simulation theory. Knowles' theory conceptually identifies the relationship of adult learning, and identifies an individual's growing need for experiences as a rich resource for learning (Loeng, 2018). Knowles' theory incorporation in simulation involving death allows adult students to experience through learning, shift to a performance-centeredness perspective, and develop an internal readiness to learn. Jeffries' theory emphasizes a collaborative interaction between the facilitator and student to provide learner-centered education in a safe and judgment-free setting (Stephen et al., 2020). Jeffries' theory provides simulation structure to promote active learning and self-confidence to enhance specific undergraduate nursing competencies (Khasawneh et al., 2021). Both theories guided the simulation of a perinatal loss to allow adult learners to shift their perspectives in learning, and experience situations that may be encountered in their professional careers.

Significance of the Study

Nurses are the largest group of healthcare professionals responsible for providing care in situations involving death, and simulation can support making situations real (Hagelin et al.,

2021). Simulation in nursing education can provide insight into undergraduate student nurses' thoughts and perceptions of caring for patients experiencing perinatal loss. Death simulation learning can help students recognize the importance of empathy for others and acknowledge respectful care (Stockman et al., 2021). Nursing is not solely caring for the patient, but involving the family in the care plan as well. This study's goal was to expose nursing students to the experience of caring for a patient with a perinatal loss. The perceptions, skills, and education have the potential of impacting nursing practice. Many curricula lack teachings on emotionally and mentally preparing students to handle death and/or care for dying patients. The incorporation of simulation can provide an effective education strategy to facilitate nurses in coping with death and dying (Sorce & Chamberlain, 2019). Undergraduate nursing students can improve their attitudes and extend care to family, which can translate to enhanced holistic care for future nursing practice (Rattani et al., 2020).

Significance to Nursing Education

To encourage positive attitudes toward death and dying, specific education involving death needs to be provided in nursing education (Petrongolo & Toothaker, 2021). Simulation has been shown to increase confidence and knowledge in various disciplines and aids in the learning retention achieved by the participants (Crowe et al., 2018). Clinical experience and academic levels provide positive indicators that may enhance attitudes toward caring during situations involving death (Petrolongo & Toothaker, 2021). Malcolm Knowles' theory concerns readiness to learn: as a person matures, his or her readiness to learn becomes oriented to developmental tasks of his or her roles, whereas child-learners are told what they have to do to learn (Machynska & Boiko, 2020). Incorporating Knowles' theory of andragogy allows adult learners to develop a need for experiences and internally become motivated to learn (Loeng, 2018). By

evaluating factors that affect undergraduate student nurses during simulation of a perinatal loss, educators can gain a deeper understanding of the lived experience of nursing students.

Significance to Nursing Practice

Perinatal bereavement care knowledge can improve clinical skills and psychological support for nurses in their interactions with parents experiencing perinatal loss (Qian et al., 2021). Simulation education can decrease anxiety during situations involving death because students have more time to reflect on the situation (Alexander, 2019). Jeffries' mid-range simulation theory is comprised of five components: context, background, design, simulation experience, and outcome (Bowden et al., 2022). Through NLN Jeffries' simulation theory, adults gain the ability to practice and learn by doing, thus allowing practices that draw from life experiences involving a more realistic situation (Crowe et al., 2018). The potential impact of this study can help nursing students reflect and have greater mental and emotional awareness throughout their professional practice to situations involving patient death.

Research Question

The research question should facilitate an understanding of the research topic, and provide a preview of the study meant to address the problem posed by the research question (Barroga & Matanguihan, 2022). The phenomenological approach in this study was used to answer the following central question: What are the experiences of perinatal loss and the impact of the experiences on undergraduate student nurses? The sub-questions are:

SQ1: What are the perceptions of spiritual beliefs impacting undergraduate nursing students' experience of perinatal loss?

SQ2: What are the perceptions of simulation impacting undergraduate nursing students' experience of perinatal loss?

Definitions

1. *Perinatal loss (Death)* – Perinatal death is the death of a baby between 22 weeks of gestation and seven days after birth (Camacho-Avila et al., 2019).
2. *Miscarriage* – A spontaneous loss of pregnancy before 24 weeks gestation or a fetal weight of less than 500 grams (Smorti et al., 2021).
3. *Therapeutic abortion* – An induced abortion following a diagnosis of medical necessity in order to avoid the risk of substantial harm to the mother or for fetal unviability (Di Giacomo et al., 2021).
4. *Stillbirth* – Fetal death at or greater than 20 weeks of gestation (DeSisto et al., 2022).
5. *Intrauterine fetal demise* – A dead fetus in uterus weighing 500 grams that often occurs in the 20th week or more of the pregnancy (Sinaga et al., 2020).
6. *Death* – The loss of the self-renewal ability of the living organism, and the complete loss of function in one or a few of the vital organs (Cetintas et al., 2021).
7. *Simulation* – An alternative teaching modality for practice that mimics reality (Labrague et al., 2019).
8. *High-fidelity simulation* - High-fidelity simulation (HFS) integrates multiple physiological variables for realistic clinical scenarios with life-size mannequins that provide simulators with personality and enables users to identify themselves with the same realism as real life (Alconero-Camarero et al., 2021).
9. *Standardized patient* – Standardized patients are often used interchangeably and refer to a person trained to portray a patient in realistic and repeatable ways (Sarikoc et al., 2018).
10. *Andragogy* – The art and science of helping adults learn (St. Clair & Kapplinger, 2021).

11. *Coping* – The process through which individuals orient their thoughts and behaviors to solve the origins of stress and manage emotional reactions (Wang, 2021).

Summary

Stillbirths in the U.S. exceed the rates of many other industrialized countries (Ford et al., 2018), with most occurring in the hospital setting (Saleem et al., 2018). Nurses are largely the support providers to families experiencing a stillbirth (Sarkar et al., 2022), which emphasizes the need to adequately train nurses to handle perinatal death appropriately for the patient's needs and provide compassionate care with confidence (Fernandez-Ferez et al., 2021). Nurses who provide care during an IUFD express emotional distress in the lack of knowledge for handling the difficult situation (Zwerling et al., 2021), affecting their emotional management in caring for bereaving parents (Gandino et al., 2019). The curricular gap between death education and practice can leave students feeling emotional distress and inadequacy in handling patients and families (Cheon & You, 2022). Early education in the undergraduate setting can provide student nurses with the enhanced skills to handle unexpected grief in the obstetric clinical setting (Knight et al., 2015), skills necessary to demonstrate empathic and respectful care (Stockman et al., 2021), and decrease the sense of lacking skills and knowledge in offering compassionate and quality care (Okein, 2021). Fetal demise simulation is a beneficial educational tool in providing students with skills necessary to care for bereaving families (Bishop & Bailey, 2017), and can improve clinical skills and psychological support for those interacting with parents experiencing a perinatal loss (Qian et al., 2021).

CHAPTER TWO: LITERATURE REVIEW

Overview

Nurses are at the forefront of patient care and spend more time with dying patients than any other discipline (Hillier et al., 2021). This emotional stress can lead to feelings of anxiety, fatigue (Zheng et al., 2020), anguish, and dread, all of which compromise quality patient care (Wang, 2021). Nursing students must be adequately trained to identify their own ethical, spiritual, and cultural values to help cope with suffering and compassion fatigue (Wang, 2021). Perinatal losses, specifically that of a stillborn or fetal demise, are one of the most challenging bereavement experiences (Alvarenga et al., 2021) that contribute to the emotional distress and high rate of secondary trauma and emotional and physical exhaustion in nurses with little to no understanding in handling deceased babies (Zwerling et al., 2021). The lack of clinical experiences in maternal-newborn specialty areas (Reid et al., 2020) can leave nursing students feeling stressed and helpless (Sook & Kim, 2022). The importance of death education in undergraduate nursing preparation must be emphasized to fill a longstanding gap between theory and clinical practice of death and dying in the nursing curriculum (Hillier et al., 2021). To bridge the gap, simulation may be utilized to prepare students for situations involving perinatal losses (Akalın & Sahin, 2020), practice a highly emotional situation before experiencing it with patients (Bailey & Bishop, 2017), therapeutically communicate with standardized patients (Escribano et al., 2021), and improve students' self-awareness, confidence, anxiety, and attitudes towards death for greater positive outcomes (Ayed et al., 2021). The incorporation of Knowles' theory of andragogy and NLN Jeffries simulation theory guided the purpose of this study to bridge the longstanding gap in undergraduate death education, specifically for perinatal loss.

Theoretical Framework

Malcolm Knowles' theoretical framework and the National League for Nursing (NLN) Jeffries simulation theory guide the research study of incorporating simulation for adult nursing students' needs that may be encountered in their nursing career. Several literature articles, including Alexander (2019), Bailey and Bishop (2017), and Smith et al. (2018) support the benefits of incorporating simulation in nursing curricula to allow students to face situations involving death to improve their thoughts, emotions, skills, and experiences. These improvements prepare students to provide adequate care to a grieving family while acknowledging their thoughts, beliefs, and spiritual values.

Malcolm Knowles' Theory of Andragogy

Malcolm Knowles' theory of andragogy addresses the science of adult learning, targeting the need for adults to experience situational learning activities and learn through problem-centered situations immediately relevant to their job or personal life (New England Institute of Technology, 2021). Knowles' journey began with a central focus to change the field of education in the hopes that andragogy could add coherence and unity to the practice of adult education (St. Clair & Kapplinger, 2021). Knowles intended to create a unifying theory for adult education that could provide assumptions about the nature of adulthood, implicitly model human development, and create a philosophy of relationship and learning (St. Clair & Kapplinger, 2021). Knowles' assumptions include experience, readiness to learn, orientation to learning, the need to know, and motivation (St. Clair & Kapplinger, 2021). As individuals mature, their self-concept moves toward being more self-directed, a growing need for experience becomes a rich resource for learning, their readiness to learn leans toward tasks of their social roles, perspectives shift from subject-centeredness to performance-centeredness, and the motivation to learn becomes internal

(Loeng, 2018).

Students in tertiary institutions are generally considered adults who are still developing their adult learner behavior to seek new knowledge, apply acquired knowledge immediately, and utilize prior experiences as a source for new learning (Spies & Botma, 2020). These adult learners have the need, ability, and desire to control their learning (Dolan et al., 2021).

Undergraduate nursing students may have an understanding of death but require training to handle these delicate patient care situations. To improve education, Knowles' theory allows for adult learners to take part in their learning.

Incorporating Knowles' theory for perinatal loss simulation can provide structure for undergraduate nursing students to practice performance-centeredness learning to become better prepared for tasks in their nursing roles. Simulation of a perinatal loss can help students build upon their knowledge of death and evaluate their thoughts, emotions, and perceptions in these situations. The use of simulation can also provide students the ability to utilize effective communication. Furthermore, the methodological approach to understanding factors that affect undergraduate student nurses' thoughts, perceptions, and experiences of simulations involving perinatal loss can provide deeper knowledge of students' experiences and needs.

National League for Nursing Jeffries Simulation Theory

Jeffries developed the NLN Jeffries simulation theory to provide structure for simulation in nursing education with core concepts incorporating context, background, design, education practice, simulation experience, and outcomes (Dolan et al., 2021). The NLN Jeffries simulation theory emphasizes the collaborative interaction between the facilitator and student to provide learner-centered education grounded in trust, allowing students an environment that is safe to learn and take chances without fear of embarrassment or retribution (Stephen et al., 2020). This

theory incorporates education practices that promote active learning to improve self-confidence and satisfaction (Khasawneh et al., 2021). Khasawneh et al., expressed the need for standardized and structured simulation scenarios that encompass simulation designs to enhance specific undergraduate nursing competencies.

Allowing students to practice by doing incorporates constructivism learning with individuals constructing their knowledge and understanding through experiences and reflecting on those experiences (Dolan et al., 2021). Through a variety of situations, adults gain the ability to learn from each other and implement educational strategies that integrate concepts relevant to practice and learning by doing (Crowe et al., 2018). Practices that draw from life experiences involve a more realistic situation that promotes self-direction and problem-solving in a safe environment for the learner (Crowe et al., 2018). The use of simulation involving perinatal loss builds upon the foundation of students' knowledge of death and helps them to build new experiences that are unique to their learning.

Knowles' andragogy theory guided the framework of the study by providing student learners with a situational learning activity immediately relevant to their job, while NLN Jeffries simulation theory provided simulation to guide students to practice and learn by doing. Student learners developed a fundamental understanding and deeper interest in their learning through simulation that provided them guidance in their future career experiences. Utilizing these theories in conjunction provided an understanding of factors that affect student learning and necessary training for undergraduate nursing students working in situations involving perinatal loss. These findings proved to be beneficial for undergraduate nursing students, health care providers in obstetrics, and health care providers in situations with an unexpected or traumatic loss.

Related Literature

For nurses, the ability to care for dying patients is a professional skill utilized for the rest of their careers (Smith et al., 2018). Healthcare professionals are expected to use effective communication techniques to minimize negative effects on patients and families when hearing bad news such as having a life-threatening disease or condition (Sarikov et al., 2018). Along with communication skills, healthcare providers must be able to identify psychological and spiritual problems, understand and respond to the emotions of patients and families, and help patients cope with loss, hopelessness, and grief (Sarikov et al., 2018). Due to limited clinical availability in nursing education for palliative and end-of-life care, newly licensed nurses or novice nurses must develop palliative and end-of-life care competencies on the job, which is not ideal and can be anxiety-provoking (Smith et al., 2018). Nurses who have cared for patients experiencing a perinatal loss discuss the lack of formal education in these situations, leaving them anxious and fearful (Willis, 2019).

Nurse educators have revealed the longstanding gaps in theory and clinical practice on death and dying in the nursing curricula (Hillier et al., 2021). There has been limited research focusing on undergraduate nursing students' perceptions and experiences regarding simulation of a perinatal loss. Nursing students' death perceptions and experiences in clinical practice can impact them professionally and personally and influence their experience with patients and families (Gillan et al., 2021). Ill preparation for this traumatic experience may be contributed to a lack of relevant knowledge, skills, counseling, and communication skills (Qian et al., 2021). The AACN recommends nursing students be trained to identify their own ethical, cultural, and spiritual values about death in order to cope with suffering and compassion fatigue and to effectively treat patients physically, psychologically, and spiritually with evidence-based practice

(Wang, 2021). For healthcare professionals to offer assistance to bereaved parents, they must be emotionally and technically trained and equipped (Salgado et al., 2021).

Perinatal Loss

The phenomenon of pregnancy loss has often been discussed in medicine as a medical event, rather than a death to be mourned (Kurz, 2020). Perinatal loss/deaths can occur as a result of maternal elevated blood pressure, diabetes, congenital anomalies, placental conditions, uterine malformation, asphyxia during delivery, and other unclear conditions (Fernandez-Ferez et al., 2021). Patients experiencing these losses have experienced anxiety, disruptions in self-identity, and chronic pain and fatigue (Kurz, 2020). After experiencing a severe traumatic event, hyper-arousal may also occur and lead to a compulsive tendency to repeat the experience to understand the emotional pain, traumatic perceptions, and incoherence of the memories (Guclu et al., 2021).

Early Pregnancy Loss

Early pregnancy loss is described as fetal death before the 14th week of gestation (Levent et al., 2022). Miscarriage and spontaneous abortion are other terms used to describe early pregnancy loss (Nash et al., 2018). The physical symptoms of a miscarriage, including the passing of blood clots, fragments of tissues, and sometimes intact fetuses, can make it difficult for women to cope, leading the mother to depersonalize from their loss and refer to the baby as a fetus or embryo (Nash et al., 2018). Early pregnancy loss can have a wide-range and long-lasting impact on women and their family's mental health (Yang et al., 2022). Often, women and their partners avoid telling family and friends about the pregnancy until after the first trimester, leaving those who suffer a miscarriage during this stage to mourn their loss in silence (Kurz, 2020).

Stillbirth

Stillbirth is one of the most challenging bereavement experiences, with life-long psychological, social, and financial impacts on parents (Alvarenga et al., 2021). Stillbirth, or fetal demise, is associated with severe grief and a complex mourning process (Abiola et al., 2022). Many people consider the loss of a child to be one of the most unnatural losses, and mothers who experience stillbirth are four times more likely to be depressed and seven times more likely to have post-traumatic stress disorder (Arocha & Range, 2021). Parents who experience stillbirth have an increased pain of the loss of the physical labor pain of giving birth to a stillborn baby (Camacho-Avila et al., 2019). For many parents, the devastating loss of a newborn baby is no less than that of an older child (Mirlashari et al., 2022).

Zwerling et al. (2021) discussed the high rates of secondary trauma in nurses leading to emotional and physical exhaustion. This experience can potentially result in a high level of emotional distress because nurses anticipate positive birthing experiences and had little to no understanding of handling deceased babies (Zwerling et al., 2021). To handle the emotional burden of care for an IUFD or a stillborn, some nurses emotionally distance themselves and focus on providing a positive impact to help balance the emotionally difficult work in clinical care (Zwerling et al., 2021). Registered nurses who perceive themselves to lack competence in their practice with perinatal loss may avoid working with students, which can result in missed opportunities in these clinical situations (Martin et al., 2016).

Lin et al. (2021) found nurses' emotional labor in caring for stillbirth promotes self-caring and compassionate nursing care. To help deal with negative outcomes in maternity wards and offer better assistance, nurses and other professionals must receive training, debriefing, and professional support (Salgado et al., 2021).

Stillbirth, in nursing education, receives less attention than other situations involving death and dying. Bishop and Bailey (2017) and Knight et al. (2015) discussed the use of simulation for undergraduate nursing students to experience perinatal loss. Knight et al. noted that in a simulation of a fetal demise, undergraduate nursing students felt the simulation provided them with enhanced skills to manage unexpected grief in the clinical setting, and that it was acceptable for them to show their emotions. Nursing students expressed gratitude in practicing a highly emotional situation before experiencing it in the hospital setting (Bailey & Bishop, 2017). Although some studies can be found, literature is sparse concerning simulation to teach care of the family with a fetal demise (Bailey & Bishop, 2017).

Nursing education regarding stillbirth is more evident in midwifery school rather than in undergraduate nursing. Little attention regarding perinatal loss and the management of bereavement for families is provided to healthcare professionals (Shen et al., 2022), and it is important to teach the delivery of bereavement care to women and families (Martin et al., 2016). Student midwives express the importance of being equipped with experience in a loss, but there are limited opportunities due to a protective approach, leaving new midwives less confident to face the inevitable (Martin et al., 2016). Perinatal bereavement care for families experiencing a loss is a stressful situation that can leave those who are frequently exposed to the environment of fetal death feeling profound sadness and self-doubt (Shen et al., 2022). Midwifery students who were present in environments involving fetal death often suppressed their feelings of pain and seldom talked about their grief, worrying that they would be criticized by their clinical instructors or peers (Shen et al., 2022). Midwives need adequate exposure in the clinical setting to strengthen their bereavement support skills and be involved in postmortem care (Shen et al., 2022).

Challenges Following Stillbirth

The majority of healthcare centers across low to middle-income countries have little or no bereavement counseling for parents who experience a stillbirth (Sarkar et al., 2022). The death of a baby is further complicated for bereaved mothers who experience physiological lactation and engorged breasts when there is no baby to feed and especially during the baby's funeral or wake period (McGuinness et al., 2014). For some women, the donation of breastmilk helped cope with the loss of their babies (Salgado et al., 2021). Muin et al. (2021) discussed the difficulty parents face in choosing to have an autopsy performed on their baby. Autopsies can help bereaved parents in their grieving process, estimate the risk in future pregnancies, and serve as mortality statistics to reduce the number of perinatal losses within the community (Muin et al., 2021).

Mothers emphasize the intense need for closeness and physical contact with their baby, which reflects the major psychological issue of maternal-infant attachment beginning well before birth (Redshaw et al., 2021). Seeing and holding a stillborn baby is a normal parental response, just as holding a live baby right after birth (Salgado et al., 2021). Parents have expressed wanting to spend time with their child, and current grief practices allow many countries to understand the value and potential benefits of doing so (Hackett et al., 2022). Contact with the baby after stillbirth remains a controversial and negative aspect of care because some mothers may have a higher likelihood of anxiety and post-traumatic stress disorder (Redshaw et al., 2016). For this reason, it is important to develop perinatal bereavement guidelines due to the limited evidence available and the highly sensitive and emotional content (Boyle et al., 2020). Assistance guidelines in perinatal bereavement are grounded on empathy and efficacy and can provide

women and their family comfort and assistance in the birth and care procedures, which may contribute to the woman's well-being and quality of life (Salgado et al., 2021).

It is important to understand that within the context of stillbirths are macerated stillbirths. Macerated stillbirths are assumed to occur at least 12 hours before delivery and show signs of soft tissue changes that include skin discoloration, redness, sloughing of the skin, and overriding cranial sutures (Saleem et al., 2018). Given this technological knowledge, the use of cooling facilities or cool cots is used to cool the body to prevent further deterioration (Hackett et al., 2022). Cold bedrooms and cold cots facilitate the process of accepting loss and allow families more time with their baby (Smith et al., 2020). These innovations extend the period of time parents have with their babies from a few hours to five or seven days (Hackett et al., 2022). Preservation of the body with a cooling facility or cold cot allowed staff to support bereaved parents in spending more time with their baby (Hackett et al., 2020).

Along with providing parents a cooling area, current best practice in stillbirth bereavement care recommends helping parents to create memories by holding and seeing their baby, taking hand and footprints, cutting a lock of hair, taking photographs, and offering a memory box to the parents (Smith et al., 2020). Creating these positive memories that are associated with the baby and its death can be challenging and complex (Salgado et al., 2021). Supporting parents in having an active role in making decisions and providing after-death or post-mortem care can confirm their role in a fundamental way (Redshaw et al., 2021), and provide a personalized approach that can lessen the anxiety and uncertainties (Salgado et al., 2021).

Along with the task of making meaningful memories and providing postpartum care, nurses must provide care in many other ways. Nurses must build trust through communication

and help families make decisions based on unique cultural or individual identities, encourage healthy bonding for parents meeting their baby for the first time, facilitate rituals such as contacting the chaplain or performing a spiritual blessing, and contact professional bereavement photographers (Sousou & Smart, 2015). Understanding the many tasks nurses face when caring for a patient experiencing a loss, it is plausible to say that nurses perform the role of many team members, as noted in Table 1.

Table 1

Encounters with Family Experiencing Perinatal Loss

Emergency Department Nurse	Caring for a woman having a miscarriage at 16 weeks.
Social Worker	Assisting the family in planning the baby's funeral.
Nursing Assistant	Caring for a woman whose baby just died.
Lactation Consultant	Helping a woman figure out what to do with her milk when she no longer has a baby to feed.
Unit Clerk	Greeting families every day when they arrive to visit the surviving twin.
Obstetric Resident	Has not experienced how to talk to a family about death.

Note. This table, summarized from the writings of Hopkins et al. (2023), demonstrates the many ways team members may encounter situations with parents experiencing perinatal loss.

The role of a nurse following a stillbirth can be challenging. In a note to parents of a stillborn child, Butt (2019) shared the viewpoint of a labor and delivery nurse:

To the parents of a stillborn child...before this, you thought of the labor and delivery ward as the happiest place on earth. I did too... The ultrasound machine would show us a still heart. You cried, and you didn't see me but I cried too. I stepped out of the room and hung a picture of a fallen leaf on your door. It was our way of communicating what was happening, and letting our staff know what kind of delivery room they were walking into...I made sure you had the same doctor, the same anesthesiologist, and the same nurse. You needed to feel comfortable. I administered pain medications and antibiotics. Your body needed to heal. I ordered you food and made sure you ate. I asked you what your child's name is, and I encouraged you to hold him. I sat and cried with you as we examined every feature on his body. I didn't stop [taking his footprints] until I got the perfect copy. You were scared when his nose started to bleed, but I calmed you down and explained how you could help him by adjusting his position. I helped his dad give him his first bath. I called a local photographer, and asked them to donate their time and work for you to have pictures of your child. On my lunch break I filled out mountains of paperwork. I made a bracelet with his name on it. I talked on the phone to the chaplain...he sat and prayed with me. He understood that I was grieving your child too. Just as you were starting to get to know your child, you had to say goodbye. We discussed funeral homes. We discussed your discharge, and how your body was going to change. You cried when I explained that your milk would still come in. You left the hospital with empty hands. It was unfair. I gave you a box, with his outfit, hospital

bracelet, and footprints in it. My 12-hour shift turned into 15 hours...I stayed to make sure your son was taken care of after you left. I took an extra moment to say goodbye to him. It is unfair that he was born sleeping...

Butt's letter to the parents of stillborn babies emphasizes the difficult tasks nurses have in caring for the baby and family while handling their own emotions and physical duties.

Bereaved Parents and Families' Needs

The grief and related health challenges immediately surrounding the time of a loss can be the most critical, which emphasizes the importance of healthcare professionals understanding the devastating experience and providing quality bereavement care to the mother and family (Abdel Razeq & Al-Gamal, 2018). An enormous psychological and social toll is placed on mothers, fathers, and families following a stillbirth (Boyle et al., 2020). Both men and women describe a perinatal loss experience as an acute phase of emotional trauma that could be decreased with healthcare professionals who are aware of bereavement and show kindness toward the deceased fetus or neonate and facilitate memory-making (Berry, 2022).

Healthcare professionals must recognize the trauma of perinatal loss to address parents' needs throughout the perinatal loss experience (Berry, 2022). Communication is a core concept in nursing to ensure parents are provided with adequate care to meet their needs during the bereavement process (Salgado et al., 2021). Mothers who have experienced an IUFD want their healthcare professionals to acknowledge and understand the nature of perinatal grief, which can affect the immediate and long-term well-being of the parents (Sarkar et al., 2022). The support of the medical team, especially nurses, is highly needed by mothers to provide hope, attention, and enthusiasm to help them pass through the normal grieving process (Sinaga et al., 2019). Helps et

al. (2023) discussed the importance of acknowledging the deceased baby as an individual to aid parents in their bereavement process.

The culture of openness and compassionate bereavement care is essential for sensitive interactions for the parents' emotional and bereavement needs (Helps et al., 2023). Compassion is a notable core concept in nursing that not only entails understanding the relationship between oneself and others, but also developing the ability to be sensitive, nonjudgmental, and respectful (Lin et al., 2021). The ability to work with patients requires compassion and understanding by their caregivers (Hovland et al., 2021). Nurses must listen to the mothers' voices in a culturally sensitive manner to achieve the highest professional standards of family-centered bereavement (Abdel Razeq & Al-Gamal, 2018).

Death and Nursing

Nurses are taught the responsibility of keeping their patients alive, and facing a situation involving death may result in negative thoughts, emotions, despair, anxiety, and inadequacy about death (Baykara et al., 2020). Nurses spend more time with dying patients than any other discipline (Hillier et al., 2021). Caring for dying patients is stressful and new graduates lack the experience to meet the physical, emotional, and spiritual needs of the dying patient (Zheng et al., 2020). Ill preparation in these situations can compromise the quality-of-care patients and families receive and may lead nurses to experience internal struggles and uncertainty about the care they provide (Hillier et al., 2021). These feelings may lead to symptoms of death anxiety, high turnover, low job satisfaction, burnout, and fatigue (Zheng et al., 2020).

Nursing students need the knowledge and skills to examine their feelings to prevent sadness from distracting them from connecting with patients and offering compassionate and quality end-of-life care (Okcin, 2021). Nursing students who experience their first encounter

with death in a clinical environment can experience negative feelings such as fear, sadness, and despair (Gul et al., 2022). The age of the deceased patient can also influence nursing students (Zhou et al., 2022). Many nursing students are at the beginning of their professional career and are inexperienced in managing situations involving death, which exemplifies the need for effective role models who can encourage nursing students to reflect upon death, the dying process, and their mortality to improve the quality of care (Uzar et al., 2021). There is considerable evidence that nurses who are unprepared for dying patients reveal anxiety, anguish, and dread, which compromises quality patient care (Wang, 2021). The more EOL experience a nursing student obtains during clinical, the more prepared the student will be for future death experiences (Petrolongo & Toothaker, 2021).

Grief

Grief is a universal human reaction to the loss of a loved one, but social and cultural beliefs can influence the way one grieves (Fernandez-Basanta et al., 2019). Grief associated with miscarriage, stillbirth, or neonatal death can be difficult due to the unexpected nature of the event and the expectations that are typically associated with birth (Knight et al., 2015). Of women who suffer a stillbirth, an estimated 60-70% will experience grief-related depression one year after their baby's death (Boyle et al., 2020). Perinatal grief can be associated with adverse biopsychosocial outcomes such as hypertension, diabetes, obesity, depression, anxiety, suicidal ideation, and posttraumatic stress disorder (Berry, 2022). Along with the grief of bereaved parents, healthcare professionals are personally and individually affected, and their mechanisms to deal with grief must be considered in these situations (Salgado et al., 2021).

Early grief frameworks of Freud, Bowlby, and Kubler-Ross, emphasized severing a relationship with the deceased, and women were prevented from seeing their stillborn baby with

the belief that the viewing would increase pathological grief (Kurz, 2020). Current grief models recognize the complexity of grief and focus on working through the maternal perinatal bereavement process (Kurz, 2020). Grief following a loss often lessens within six months but can persist for at least two years due to complicated factors such as unexpected loss, the event not being socially supported, and feelings of guilt or self-blame (Kurz, 2020). Embodied grief in bereaved parents can result in rocking motions, physical tension, and experiencing and or perceiving their maternal body as different (Kurz, 2020).

Nurses are one of the main sources of support during parental grief of those who have suffered a perinatal death (Fernandez-Ferez et al., 2021). The absence of care protocols or opposition to farewell rituals can contribute to parents' frustration and disenfranchised grief (Camacho-Avila et al., 2019). Nurses can help bereaved parents cope with and overcome their grief by taking measures to allow the parents to hold the baby, taking photographs, providing a memory box, and providing support group information (Fernandez-Ferez et al., 2021). Helping honor the memory of the baby, and giving the deceased infant an identity as a family member can help parents through the grieving and bereavement process (Camacho-Avila, 2019).

Coping Strategies

Coping mechanisms are necessary to successfully deal with the emotional response that occurs in death and dying situations (Petrolongo & Toothaker, 2021). Nursing students need to be aware of their own emotions about death to develop effective coping mechanisms to provide dying patients and their families with high-quality care (Gurdogan et al., 2019). Simulation-based education with death and dying can help students gain confidence in their abilities and develop active coping strategies (Wang, 2021). Reflection allows students to explore experiences

with patient death and identify coping strategies with support from faculty (Petrolongo & Toothaker, 2021).

Given new nurses are often younger and have less experience with death, situations involving death and loss can be more uncomfortable for them (Zheng et al., 2020). Significant predictors of graduate nurses' ability to cope with death include anxiety and emotional stress (Zheng et al., 2020). Nurses should first be trained in death and dying to enable them to develop effective coping mechanisms and skills to effectively care for dying patients and their families (Tuzer et al., 2020). The ability for nursing students to cope with death and dying can be improved through enhanced education (Wang, 2021).

One aspect of coping with death is the nurse's ability to manage his or her death anxiety, which is the emotional reaction provoked by the anticipation and perception of death (Zheng et al., 2020). Training on caring for dying patients and the frequencies of patient deaths can improve nurses' ability to cope with death (Zheng et al., 2020). Understanding terror management theory, which describes people's need to form a positive worldview to accept their inevitable demise, nurses must accept death to positively influence their emotions and behaviors in caring for dying patients (Povedano-Jimenez et al., 2021).

Affective Factors

One's views toward death can be influenced by cultural beliefs, age, and level of development (Cetintas et al., 2021). Providers who provide care based on their personal beliefs and opinions can affect the empathetic communication provided to bereaved parents (Sharma et al., 2022). Nursing students acknowledge awareness of one's values, perceptions, and state of mind can influence the outcomes in caring situations (Martensson et al., 2022). Through

enhanced education, nurse educators can improve students' abilities to cope with dying and death (Wang, 2021).

Culture

Cultural upbringings play a role in one's teachings and beliefs of death and dying. In Chinese culture, it is viewed as taboo to speak of death and people rarely use words related to death and dying (Zhou et al., 2022). Stillbirth is a neglected issue in India with no defined standards for providing bereavement care, which emphasizes the importance of bridging the gap between professional training and patient care (Sharma et al., 2022). In some cultures, femininity is synonymous with motherhood and a woman may be deprived of her gender identity and become socially isolated following a pregnancy loss (Fernandez-Basanta et al., 2019). In Spain, perinatal death is not recognized as the death of a baby, and families suffering from perinatal grief are not provided with standardized care to aid in the grieving process (Camacho-Avila, 2019). Considering the cultural and personal uniqueness of individuals, caring for women who suffer a loss can pose an immense challenge (Salgado et al., 2021).

Spirituality and Religion

Spirituality is a more personal experience associated with religion but is becoming increasingly viewed as being more independent and having no association with an organized institution (Murgia et al., 2020). Spirituality expands beyond a religious doctrine, and can often be used in reference to a search for meaning or purpose through connectedness to others, nature, nonphysical entities, and gods (Wright, 2020). It is a vital force to help individuals overcome crises and give meaning to life and death (Murgia et al., 2020). In healthcare, spirituality may be defined as the essence of the human being searching for transcendental meaning, purpose, and happiness (Murgia et al., 2020).

Different religions and spiritual beliefs may influence how individuals interpret death and dying. Monistic beliefs view human beings as material, whereas dualistic beliefs view human beings as being composed of body and soul, in which the soul can continue on and roam freely after human death (Zhou et al., 2022). Naturalists reject the spiritual realm, as it is considered vague and useless for describing the experiences and activities that give an individual meaning (Murgia et al., 2020). Within the context of Islamic society, spirituality and religion are inseparable because religion is necessary for spiritual improvement (Murgia et al., 2020). Because Islam is the dominant religion in Iran, nurses have to restrict the presence of men in settings where women are unveiled, resulting in fathers not being treated equally or receiving adequate emotional and social support (Mirlashari et al., 2022). Mourning rituals should be respected to allow mothers and fathers to act according to their beliefs (Camacho-Avila et al., 2019). To make the process of stillbirth more bearable, Christian families value baptizing babies and deciding how to proceed with the corpse in choosing a final resting place (Camacho-Avila et al., 2019).

A positive correlation exists between spirituality and the nurses' attitudes toward patient death and dying (Petrolongo & Toothaker, 2021). Spirituality in nursing allows for holistic care to assist patients with their physical, social, and spiritual needs (Murgia et al., 2020). Nurses need to recognize ethnic, cultural, and religious diversity in spirituality to build interdisciplinary dialogue and implement holistic patient care (Murgia et al., 2020). It is also essential for nurses to consider spirituality as an integral part of the human experience of illnesses and health (Tuzer et al., 2020). Nursing students are the healthcare professionals of the future, and they should have sufficient knowledge and awareness of spirituality to improve their attitudes toward death,

provide higher-quality care to dying patients, and address the needs of patients and families in a holistic way (Tuzer et al., 2020).

Attitudes

Attitudes are formed as a result of a favorable or unfavorable evaluation of a particular situation (Wang, 2021). Nursing students have reported feeling anxious, unprepared, and helpless when caring for dying patients, especially when the death is unexpected (Alexander, 2019). Negative attitudes toward death and dying can lead to stress, anxiety, depression, exhaustion, helplessness, and reduced quality of care toward the dying patient (Cetintas et al., 2021). Exposure to dying patients and feeling useless and unable to help dying patients and their families can lead to negative attitudes (Wang, 2021). Students who avoid death have fewer positive attitudes toward caring for the dying (Petrolongo & Toothaker, 2021).

Nurses with death anxiety or fear may exhibit negative attitudes such as remaining distant from the patient, having a dull expression, not giving full information, and avoiding time with family which may cause nurses to have anxiety, sadness, depression, and anger, and prevent them from providing high-quality holistic care (Tuzer et al., 2020). With more experience, attitudes are expected to change over time (Wang, 2021). A change in the death attitude of the nurse aids in preparation for future encounters with patients and families in death and dying (Petrolongo & Toothaker, 2021). Attitudes of healthcare providers play a large role in the immediate and long-term effect on bereaved parents (Sharma et al., 2022).

Self-Confidence

According to the NLN Jeffries Simulation Framework, self-confidence is one of the learning outcomes achieved through simulation and is associated with the development of clinical reasoning, critical thinking, and required competencies in education for improved health

care (Silva et al., 2022). Nursing students who participated in end-of-life simulation experienced positive learning outcomes that improved their attitudes, confidence, communication, and knowledge (Edwards et al., 2020). Acquisition of self-confidence has been identified as an important outcome in obstetric simulation (Akalin & Sahin, 2020). HFS is an effective teaching tool that can enhance confidence among nursing students (Labrauge et al., 2019). Many novice nurses feel unprepared to provide care during death experiences and may feel frustrated due to the lack of knowledge and skills required to handle these situations (Edwards et al., 2020).

Self-Efficacy

Self-efficacy relates to an individual's belief in his or her ability to act according to certain performance attainments and reflects the individual's confidence and ability to demonstrate control of their behavior, motivation, and social environment (Edwards et al., 2020). The theory of self-efficacy postulates that people will attempt things they believe they can do and avoid things they believe they cannot do (Brennan, 2022). Bandura's self-efficacy model suggests people's beliefs of their efficacy are developed through emotional/physiological states, mastery experiences, vicarious experiences, and verbal persuasion (Al Gharibi et al., 2021).

Simulation-based learning experiences have shown increases in self-efficacy, which can promote independence and confidence and improve outcomes and performance among nursing students (Brennan, 2022). High-fidelity simulation (HFS) education significantly increases students' critical thinking and self-efficacy skills in obstetric training with the potential to decrease anxiety (Akalin & Sahin, 2020). Repeated simulation has been shown to increase undergraduate nursing students' self-efficacy and competency in confidently managing clinical situations (Al Gharibi et al., 2021).

Self-Awareness

Self-awareness is an essential factor in being present in caring encounters because it combines feelings with knowledge and experience (Martensson et al., 2022). Self-transcendence is a person's ability to become highly aware of the self to expand personal boundaries beyond oneself and find the meaning of one's existence, which can occur during a moment of crisis or mourning of a death (Murgia et al., 2020). When nursing students can identify their attitudes toward death and dying, they can recognize these thoughts during their nursing practice and provide effective care to dying patients (Cetintas et al., 2021). Effective perception of self-awareness improves empathy that enables an individual to feel, understand, and recognize another's emotions to cultivate understanding, respect, and appreciation for patient concerns that ultimately improve patient health plans and outcomes (Ayed et al., 2021). Empathy is a learned essential quality in a provider-patient relationship and is necessary to lower the grief of bereaved mothers (Sharma et al., 2022). Through the incorporation of self-awareness and self-transcendence, a nurse can potentially increase positive interactions between the nurse and the patient to support the healing process (Murgia et al., 2020).

Simulation

Simulation is a pedagogical strategy incorporating active learning to promote the development of knowledge and skills in a safe environment (Silva et al., 2022). Simulation typically involves mimicking real-world scenarios through the use of manikins, standardized patients, computer programs, virtual reality, or hybrid simulation (Smith et al., 2018). The use of simulation allows for education to be student-centered and guides healthcare students to connect theories they learn in the classroom to potential encounters in the clinical environment (Mohammad, 2020). Simulation allows for flexibility to practice based on the student's schedule,

improves student instruction, and can serve as an effective competency check for undergraduates and nurses on orientation (Al Gharibi et al., 2021).

National guidelines recommend the substitution of up to 50% of in-person clinical time to be provided through simulation (Dolan et al., 2021). Simulation has been increasingly recognized as an essential component in nursing education (Labrague et al., 2019), and is a promising educational tool to allow students to practice in a safe and controlled environment (Mohammad, 2020). “Simulation can help close a gap between theory and practice as well as promote critical thinking in nursing students” (Fielding et al., 2022, p. 65). The adoption of simulation-based activities enhances nursing students’ preparation for professional nursing and allows them to critically think, communicate effectively, and enhance their ethical reasoning, decision-making skills, and cultural competencies (Labrague et al., 2019). Edwards et al. (2022) discussed the benefits of simulation in helping novice nurses learn safety, communication, and skill acquisition to increase confidence and self-efficacy. Evidence-based best practices in simulation ensure high-quality learning opportunities for students (Reid et al., 2020).

The NLN supports the integration of simulation in the nursing curriculum to better prepare nurses for the complexity of health care (Labrague et al., 2019). In addition to theoretical undergraduate nursing classes regarding death, the incorporation of simulation exercises allows students to practice communication and participate in skill development programs under the supervision of an educator (Uzar et al., 2021). Those who participate in simulation education improve their verbal and nonverbal communication skills, and can work more therapeutically by learning appropriate phrases and words, incorporating therapeutic touch, understanding the importance of facial expressions, and practicing key gestures (Byrne et al., 2020).

Research has shown that simulation can help decrease students' anxiety in preparing them for new experiences (Alexander, 2019). Simulation can improve nursing students' self-awareness, attitude, and empathic behaviors, which could lead to greater positive outcomes (Ayed et al., 2021). Improvement in empathy is linked to open communication and positive patient outcomes, which is positively associated with better adherence to self-management, higher levels of satisfaction, and lower anxiety levels in patients (Ayed et al., 2021). In end-of-life simulations, nursing students feel more comfortable recognizing impending death, assisting family members through the grieving process, and being present with dying patients (Edwards et al., 2020). The use of simulation is an effective strategy in preparing students for situations involving death and it helps prepare them for new experiences, which can decrease anxiety levels and help them feel more prepared in providing care (Alexander, 2019). Fielding et al. (2022) found EOL simulation in nursing education to focus mainly on adults and little on children or pediatric patients. Compared to conventional teaching strategies, simulation has been more effective in reducing anxiety before and during an activity, providing the student with greater confidence to perform interventions (Silva et al., 2022).

Although there is little research on simulations involving perinatal loss, studies similar to those of Alexander (2019), Bailey and Bishop (2017), and Smith et al. (2018) showed the benefits of simulation in education, especially for situations involving end-of-life care, caring for a dying patient, and death. "Simulation has the potential to bridge gaps in undergraduate obstetric nursing education and prepare students for their future professional roles" (Akalin & Sahin, 2020, p. 370). Students who participated in stillbirth simulations had an overwhelmingly positive reaction and expressed gratitude for having the ability to practice a highly emotional simulation before experiencing a similar simulation with patients (Bailey & Bishop, 2017).

Clinical simulation is an innovative strategy that can help nursing students practice safe and effective methods in the experience and practice of communication skills in challenging situations (Ratislavova et al., 2019).

Simulation scenarios involving a perinatal loss offer opportunities for undergraduate nursing students to process their thoughts, feelings, and emotions when interacting with a standardized patient. The use of standardized patients allows students to experience care for an individual who has experienced a perinatal loss and therapeutically communicate with the patient. Escribano et al. (2021) found simulation programs using standardized patients expose nursing students to simulations that can improve communication skills and self-efficacy. The strategy to allow students to have interactions with standardized patients can help them mentally and emotionally care for patients during traumatic events involving death.

High-Fidelity Simulation

HFS, such as human patient simulators and standardized patients (Labrague et al., 2019), provides realistic teaching to boost knowledge (Alconero-Camarero et al., 2021). Evidence has identified HFS as an effective teaching strategy to translate theory into practice (Labrague et al., 2019). Although high-fidelity simulation has been shown to improve knowledge and skills, Alconero-Camaero et al. (2021) found students who participated in medium-fidelity simulation (MFS) experienced greater satisfaction than in HFS, which could be attributed to higher achievement with simpler competencies as opposed to the higher complexity with HFS. Other studies noted that participants expressed their simulation-based activity as a meaningful aid in facilitating better development in their knowledge, skills, and self-confidence to deal more effectively when caring for patients (Labrauge et al., 2019). The use of standardized patients in nursing education invokes a more genuine sense of responsibility in students providing care in

caring and compassionate environments (Martensson et al., 2022). Participating in high-quality simulation experiences aids student achievement in clinical judgment and educational outcomes (Reid et al., 2020).

Standardized Patients

The use of standardized patients in education provides an effective way for students to develop their cognitive, affective, communication, and clinical skills (Kucukkelepce et al., 2020). Standardized patients participate in difficult scenarios and simulations focus on clinical skills in healthcare professionals' education (Sarikov et al., 2018), which can increase nursing students' confidence and positive attitudes in caring for dying patients and their families (Byrne et al., 2020). Realistic training experiences can improve the skills of students in ethical issues arising in the clinical setting when interacting with real patients and builds solutions to ethical problems that require cooperation between healthcare professionals and patients and families (Kucukkelepce et al., 2020). The learning experience of simulation with standardized patients facilitates undergraduate nursing students' compassionate and competent caring behavior and allows students to be mindfully present in patient encounters (Martensson et al., 2022).

Barriers to Clinical Experience

Clinical experiences in specialty areas such as pediatrics, maternal-newborn, and mental health are scarce (Reid et al., 2020). There are limited opportunities for nursing students to be educated and trained for situations involving perinatal loss, which can result in feelings of stress and helplessness (Sook & Kim, 2022). The limit in educational resources for nurses who care for women experiencing a perinatal loss is partly due to the situation being an interactive process rather than a situation for solely providing health information or providing nursing skills (Sook & Kim, 2022). With the increase in the complexity of healthcare along with the rise in nursing

students, limited placements, and lack of qualified nursing faculty, it is critical for nurse educators to utilize alternate methods for nursing students to achieve clinical learning outcomes (Labrague et al., 2019). Difficulties in clinical education opportunities may also be contributed to burnt-out nurses, hospital vaccination requirements (Dolan et al., 2021), the litigious nature of maternal-newborn units, the increasing number of men in nursing, and the reports of gender bias (Reid et al., 2020). Although students may have limited experiences at clinical sites, HFS is one of the most effective methods for improving students' experiences to analyze themselves and increase their confidence in handling similar situations in the clinical setting (Labrague et al., 2019).

Curriculum Incorporation

EOL education should begin early in the undergraduate degree before clinical placement, since nursing students express a significant concern in experiencing death for the first time (Gillan et al., 2021). Education about death and palliative care can improve students' attitudes and preparedness in situations involving death and dying patients (Hagelin et al., 2021). Studies show a significant need to incorporate subjects regarding death into nursing curricula to positively influence students' attitudes, perceptions, and experiences toward dying patients (Baykara et al., 2020). Attention to death education in clinical settings can improve students' skills, attitudes, and professional growth (Zhou et al., 2022).

Heise et al. (2018) found only 17% of nursing students felt their curriculum prepared them to cope with the death of a patient. The majority of students felt they were not prepared to deal with issues surrounding communication with dying patients, family members, or members of the healthcare team (Heise et al., 2018). Literature shows undergraduate nursing students are unprepared to provide end-of-life care to dying patients due to the limited opportunities to gain

experience in clinical placement and the minimal and inconsistent presence of death and dying in undergraduate nursing curricula (Gillan et al., 2021).

Nationally, 41% of nursing students reported being present at a patient's death, which highlights the importance of death education in the nursing curricula (Heise et al., 2018). There is a need for curriculum incorporation of end-of-life care, and the death of a patient can help students with emotions and coping strategies (Alexander, 2019). End-of-life education may minimize feelings of loss, fear, and grief associated with caring for dying patients, and help equip future nurses to provide quality EOL care (Lin et al., 2018). Zhou et al. (2022) expressed the need for training in clinical practice to help students overcome death anxiety that may be related to their roles in caring for or handling a dead body. Life and death courses should be provided to nursing students to help them deal better with death incidents during their training and even later in work (Zhou et al., 2022). There is an overall lack of consistent death education for nursing students across the nation, leaving students unprepared to enter the workforce with a sense of confidence in their nursing knowledge and skills (Stokman et al., 2021).

To prepare students to effectively cope with death, death education and approaches toward dying patients must be incorporated into nursing curricula (Gul et al., 2020). The End-of-Life Nursing Education Consortium (ELNEC) was created in 1997 by the American Association of Colleges of Nursing to begin educating nursing faculty and implement palliative care education resulting in increased integration of ELNEC into baccalaureate nursing curricula (Lin et al., 2018). ELNEC provides competencies that address hospice, palliative care, grief loss, bereavement, and communication, all of which are essential for undergraduate nursing students to achieve in order to provide quality care to the dying and support for families grieving loved ones (Byrne et al., 2020). Understanding the benefits that EOL education can provide to

undergraduate nursing students, the same could be applied to perinatal loss care to prepare nursing students for those devastating and sometimes unforeseen events.

Perinatal bereavement education can be effective in improving student knowledge, providing comfort during EOL care, and producing awareness of the emotional care needs of bereaved families (Ratislavova et al., 2019). Adequate curriculum attention should be given in undergraduate education to guide students to meet competencies for family members who experience stillbirth, neonatal death, congenital condition, and post-abortion care (Ratislavova et al., 2019). Early death education can reduce the risk of secondary traumatic stress that results in intrusive thoughts, nightmares involving the patients' trauma, fatigue, irritability, and anger (Gandino et al., 2019).

Summary

Little attention is focused on training for perinatal loss and bereavement (Shen et al., 2022). The AACN has expressed the importance of nursing students being trained in death situations to help them identify their own ethical, cultural, and spiritual values in dealing with death (Wang, 2021). Nursing students who experience their first death in a clinical environment can experience higher feelings of fear, sadness, despair (Gul et al., 2022), anxiety, burnout, and fatigue (Zheng et al., 2020). Healthcare professionals must be emotionally and technically trained in order to offer assistance to bereaved parents (Salgado et al., 2021), reduce the risk of emotional and physical exhaustion related to secondary trauma (Zwerling et al., 2021), and develop effective coping mechanisms to provide care to patients and families during death situations (Tuzer et al., 2020). Early death education in the undergraduate curriculum can improve students' skills, attitudes, and professional growth (Zhou et al., 2022), allowing for safe practice and effective methods of patient care during challenging situations (Ratislavova et al.,

2019), and decreasing nursing students' anxiety while preparing them for new experiences (Alexander, 2019). Simulation has been an effective strategy in preparing students for situations involving death (Alexander, 2019), and serves as a catalyst in bridging the gap in undergraduate obstetric nursing education in preparation for students' professional roles (Akalin & Sahin, 2020) in order to achieve the highest professional standards of family-centered bereavement care (Abdel Razeq & Al-Gamal, 2018). The theoretical frameworks of Knowles' theory and Jeffries guide the education to help fill this longstanding educational gap.

CHAPTER THREE: METHODS

Overview

The purpose of this phenomenological study is to understand the perceptions and experiences of undergraduate nursing students in simulation education involving perinatal loss, specifically that of a stillbirth or intrauterine fetal demise (IUFD). At this stage in the research, the lived experience is defined as involvement in simulation education of a stillbirth. The theories that guided this study included Malcolm Knowles' theory of andragogy, as it explains the relationship in which adult students learn and how it can relate to the simulation education involving death, and NLN Jeffries Simulation, which provides learner-centered education that is grounded in trust, allowing students an environment that is safe to learn and take chances. This chapter discusses the design, setting, participants, procedures, data collection, and data analysis of the research study.

Design

A qualitative research design was appropriate for studying the experiences and perceptions of nursing students involved in a perinatal loss simulation. The hermeneutic phenomenological approach guided the study of undergraduate nursing students' perceptions of high-fidelity simulation involving perinatal loss, specifically a full-term 40-week stillbirth. Notably, the hermeneutic phenomenological approach requires researchers to acknowledge their own past experiences and knowledge and uncover the meaning and essence of the participant's lived experience in a way to illuminate the conditions in which understanding, perception, and knowing take place (Alsaigh & Coyne, 2021). A phenomenological design allows individuals to experience the phenomenon and describe their perceptions. The Consolidated Criteria for Reporting Qualitative Research (COREQ) Checklist (Appendix H) was utilized to ensure the

quality of the research. COREQ promotes comprehensive reporting of qualitative interview studies to indirectly improve the rigor, comprehensiveness, and credibility of research (Buus & Perron, 2020). A strength of qualitative interviewing is that it allows the researcher to establish rapport with the participant, and allows the participant to offer an uncensored view of their opinions, experiences, and behaviors (Jimenez & Orozco, 2021). For the phenomenological approach, three student groups of three and two student groups of two engaged in the simulation experience with a trained standardized patient. Following the simulation, a quick debrief was conducted and student nurses were interviewed individually via Zoom conferencing software.

Research Question

The phenomenological approach in this study was used to answer the following central question: What are the experiences of perinatal loss and the impact of the experience on undergraduate student nurses? The sub-questions were:

SQ1: What are the perceptions of spiritual beliefs impacting undergraduate nursing students' experience of perinatal loss?

SQ2: What are the perceptions of simulation impacting undergraduate nursing students' experience of perinatal loss?

Setting

Located in the southeastern U.S. in one of the top 20-largest metropolitan areas in the United States lies the small-sized private university that offers more than 200 academic programs for approximately 10,566 national and international students. Through typical purposeful sampling, this site was chosen to best understand the central phenomenon. The university is accredited by the Southern Association of Colleges and Schools Commission on Colleges (SACSCOC) for their baccalaureate, masters, and doctoral degrees. The baccalaureate and

masters degrees in nursing and the post-graduate Advanced Practice Registered Nurse (APRN) are accredited by the Commission on Collegiate Nursing Education (CCNE).

The Four-College Model organizational structure, consisting of the College of Arts and Letters, College of Business, College of Natural and Health Sciences, and College of Social Sciences, Mathematics and Education, help the University retain its small-school ambiance and allows each academic area to have a greater sense of identity to support students and faculty in their experience of a scholarly community. The university keeps its students at the center of its work and aims to educate the whole person through student-focused learning by emphasizing student engagement, internships, service learning, and research. Collaborative meetings with the nursing program's dean, simulation instructors, and maternal-child health instructor will occur in order to access fourth-year students in their maternal-child health course in the College of Natural and Health Sciences.

The specific study location was chosen due to the researcher's affiliation with the university. The research occurred in the simulation lab located inside the College of Natural and Health Sciences. The instructor for the simulation lab met the researcher before the simulation to provide access to the simulation, observation, and conference rooms. Prebrief and debrief sessions took place in a private room adjacent to the simulation patient room. The simulation patient room was set to resemble a hospital room that consists of a one-patient bed, one vitals monitor, a bedside table, a counter with a sink, and a one-way window allowing for observation from the adjacent simulation computer room.

Participants

Participants were recruited and selected through purposeful sampling to represent undergraduate student nurses. Purposeful sampling allows the researcher to use his or her own

expertise to select a sample that may represent a target population (Stratton, 2023). Participants consisted of undergraduate nursing students enrolled in or who had completed their maternal-child health rotation. This included four juniors in their second semester and nine seniors in their fourth semester. The university's population is 60% White, 15% Hispanic/Latino, 10% Black or African American, 5% two or more races, 2.5 % Asian, Native Hawaiian or other Pacific Islanders, and 2.5% American Indian or Alaska Native. 59% of the students are women and 41% are men. The College of Nursing program population consists of 60% White or Caucasian, 14% Hispanic or Latino, 10.22% unknown, 9.14% Black or African American, 4.3% Asian, 1.61% two or more races, and 0% American Indian or Alaska Native. Of the population, 89% are female and 10% are male.

The enrolled maternal-child course population generally consists of 40 undergraduate nursing students, and an estimated 120 students who have completed the course. Students enrolled in semesters two through five have had at least six months of nursing clinical at local hospital sites and experience in the school simulation lab. The researcher sent e-mails, to instructors teaching junior and senior nursing students, requesting permission to present the research study to the students. Six classes were presented with the research study, and given an information sheet with a QR code. Participants voluntarily completed a screening questionnaire by scanning the QR code that automatically took them to the consent (Appendix B), counseling services information sheet, and 11-question survey (Appendix C) regarding enrollment in the nursing program, age, gender, religion, pregnancy history, and/or any personal or close experience with perinatal loss. The screening questionnaire ensured the target audience was appropriate for the study, including diversity among the participants. By electronically signing the consent viaDocuSign, the participants agreed to participate in the study. Of the 120 sampling

pool, 14 completed the screening questionnaire, and only 13 met the criteria. Bekele and Ago (2022) indicated that 10 to 20 key research participants are enough to understand the major issues in lived experiences studies.

Face and content validity were identified through a pilot review of the interview questions. A pilot review of interview questions ensured the questions were suitable and appropriate in measuring and capturing young adult nursing students' experiences with the simulation of a stillbirth. Three individuals with clinical practice and expertise in obstetrics conducted the review to identify questions and thematic areas that provided useful in-depth, one-on-one interviews. By performing these steps, the researcher attested to the internal validity of the research study.

Researcher Positionality

Throughout my years of nursing, I have experienced many patient deaths. Several of these occurred during my time in the emergency room and trauma-surgery unit. Death did not bother me. I was accustomed to tagging and bagging patient bodies, cleaning the patient room, and preparing for my next admission. I had become in a sense "immune" to death and the emotional factors in providing postmortem care.

The difficulty arose when I transferred to labor and delivery and experienced my first full-term fetal demise. It was at that moment I realized I was never adequately trained to handle and cope with patient deaths, and my previous experiences had only added to the wall of disconnect during those challenging situations. I realized there was a significant gap in the training and education of undergraduate nursing students to develop the skills necessary to adequately cope with dying patients, specifically a fetal demise, and provide effective communication and compassionate care to a bereaving family.

The purpose of this phenomenological study was to identify the philosophical ontological, epistemological, and axiological assumptions related to death experiences through a constructivist paradigm lens. Through in-depth interviews, epistemological interpretivism assumptions provided further insight into the needs of undergraduate nursing students in preparation for unexpected events in the obstetric setting. The qualitative approach of the study allowed me to speak with undergraduate nursing students and understand their experience in a simulation involving a stillbirth. The axiological assumptions were influenced by the researchers' situation to self, personal experiences, and worldview.

Researcher's Role

The role of the researcher was to attempt to understand the perceptions and experiences of study participants who had a shared experience in a high-fidelity simulation involving perinatal loss. The researcher articulated her research worldview and acknowledged any biases or assumptions. The researcher served as a "human instrument" in conducting participant consent, data collection, and data analysis. The researcher researched objectives, identified research methods, data collection techniques, and analysis methods; monitored the project to make sure it followed standards, collected, recorded, and analyzed data; and interpreted data and reported findings and recommendations to be used to present findings in journals and conferences.

The researcher sought IRB approval to conduct the study at a local university. The Dean of the nursing program was made aware of the purpose of the study. Following approval, the researcher presented the study to students who were currently enrolled in or had completed their Maternal-Child Health rotation. Students were fully informed of the purpose of the study, voluntary participation, and compensation for participating. After reviewing the screening

questionnaires with signed consent, the researcher notified eligible participants. Participants were notified once more of the group simulation with a standardized patient and the audio-recorded one-on-one interview.

After the researcher successfully conducted the simulation and the interview, she then analyzed and coded the data using the computer software ATLAS.ti. Participants were given flower pseudonyms to maintain confidentiality. The information was coded into sub-categories and themes to describe the factors affecting undergraduate nursing students' perceptions of a high-fidelity simulation of a perinatal loss.

Once the researcher completed data collection and analysis, it is anticipated that the findings will be reported to the participants. Along with reporting the findings to the participants, findings will be shared with a nursing journal. The researcher disclosed any conflicts of interest and provided recommendations for future researchers. Throughout the entire study, the researcher maintained honesty, integrity, trust, and transparency.

Procedures

Before beginning the research, Institutional Review Board (IRB) approval was obtained through Liberty University and the university at which the study took place (Appendix I). Following IRB approval, the researcher conducted a pilot interview to seek feedback on the interview instrument and its clarity of questions and appropriateness in answering the research question. Three qualified individuals who have clinical practice and expertise in the obstetrical setting and obstetrical education reviewed the interview questions. The first individual had eight years of experience as a labor and delivery nurse, and two years as an obstetrical instructor in the lab, clinical, and didactic setting. The second individual was a certified nurse midwife (CNM) who had 12 years of experience as a labor and delivery nurse, and four years as a CNM. The

final expert had more than 20 years of experience in labor and delivery, and five years as a nurse manager in a labor and delivery unit. Once the content and feedback of the expertise group was returned, the researcher continued with the research process.

Following IRB approval and the professional review of the interview questions, preparatory information was disseminated, via email to the undergraduate nursing program's dean, simulation instructors, and instructors teaching junior and senior undergraduate nursing students to cover the basis and proposal of the research study. With the Dean's and faculty's approval (See Appendix J), the researcher visited six course rooms of eligible participants to discuss the purpose of the study. The presentation was conducted before class started in order to minimize disruptions. A script (Appendix A) with the QR code to the screening questionnaire (Appendix C), counseling services information (Appendix F), and consent (Appendix B) were provided to undergraduate nursing students who were currently enrolled in or had completed their maternal-child health rotation. The script included the purpose of the study seeking voluntary participation in a simulation and interviews, along with the compensation notice of a \$25 participation gift card after completion of the study.

The QR code, generated through the website SurveyMonkey, allowed students to scan and immediately be directed to the online consent, counseling services information sheet, and screening questionnaire consisting of 11 questions regarding age, gender, leveled-year of undergraduate school, spirituality, and any personal experience with perinatal loss. When the students scanned the QR code, they were immediately directed to the consent. In the consent was a link to sign virtually via DocuSign. After completing the electronic signature, participants were redirected to the survey, where they had the counseling information sheet followed by the screening questionnaire. The questionnaire was used to ensure the participant met the criteria of

the study. Due to the sensitivity of the study, individuals who were currently or previously pregnant, had children, and/or have personally experienced or have someone near to them experience a fetal demise/stillbirth/miscarriage, were excluded from participating.

Thirteen participants were selected through typical purposeful sampling and contacted by the researcher within a week to participate in a 20-minute two- or three-person group simulation with a trained standardized patient who had recently experienced a 40-week stillbirth. The researcher emailed the participants and provided a date and time to arrive at the simulation lab for a prebrief, the simulation, and debrief. The researcher printed out the participants' signed consents and had them ready for the participants' arrival to the simulation lab. The consents were placed in a manila folder, along with the counseling services information sheet.

Before any participant interactions with the standardized patient, the researcher had a personalized Zoom meeting with the standardized patient, Rachael, to ensure she understood the purpose of the study, and was a good candidate to portray the real-life event. The simulation lab instructor and the instructor in charge of personally contacting standardized patients participated in the Zoom meeting as well. Meeting with Rachael beforehand ensured she understood and was willing and able to perform accordingly. The meeting between the researcher and Rachael ensured the participants were given a rich experience.

Once the individual groups of participants arrived for their time slot, they were provided with a copy of their signed consent, along with the counseling services form. A prebrief, lasting no more than 10 minutes, was conducted to orient participants to the simulation room and review the task sheet and patient history (See Appendix D). Prebriefing the participants aligned with the Healthcare Simulation Standards of Best Practice as outlined by the International Nursing Association for Clinical Simulation and Learning (INASCL), which ensures that simulation

learners are prepared for the education content and are aware of the ground rules for the simulation experience (INACSL Standards Committee, 2021). The task sheet contained information in which they were to conduct a postpartum assessment while utilizing therapeutic communication with Rachael who followed a script (Appendix E). The postpartum assessment utilized the acronym Bubble-He, which stands for breasts, uterus, bladder, bowels, lochia, episiotomy and perineum, hemorrhoids, and emotions (Hello Postpartum, 2021).

The simulation immediately followed the prebrief in the adjacent room. In groups, the participants entered the simulation room where Rachael was in the patient bed awaiting them. The participants went through their task sheet with assigned roles, while Rachael followed the script. The researcher was behind a one-way mirror to collect observational data and write field notes. The researcher was able to observe through the one-way mirror and listen to the interactions through a headset device.

Upon completion of the simulation, the group briefly met in a private room to debrief. The researcher reminded participants of the counseling information in their packet in case they experienced psychological despair due to the sensitive nature of the study. Participants were given a sign-up sheet to choose a designated time slot for their Zoom interview. The researcher conducted in-depth audio-recorded one-on-one participant interviews within 48 hours of the study via Zoom to discuss the simulation experience. The researcher used an open-ended interview guide and provided detail and clarification when needed. Semi-structured interviews allow the interviewer to follow a guide while following trajectories in the conversation that may stray from the guide (Ricci et al., 2019). Real-time member checking was reviewed with the participants to ensure comments and key factors were accurate. Each recorded interview session was then transcribed verbatim and analyzed using ATLAS.ti. Each transcription was signed with

the participants' personal identifier. The transcriptions were uploaded into ATLAS.ti software. Interview statements were analyzed, coded, and categorized into different themes.

Data Collection

Data collection incorporates different methods to obtain information. Data triangulation uses multiple data sources, theories, or research methods to increase the validity, reliability, credibility, dependability, confirmability, and transferability of the findings in a research study (Moon, 2019). Different data collection methods were utilized for the research study. Data triangulation is utilized and maintained throughout the research study.

Initial Data Collection

Initial data collection began by providing participants with a detailed script regarding the purpose of the study and voluntary participation in the simulation and individual interviews. Screening questions and consent signature were obtained from the QR code on the recruitment script. The selected individuals then participated in a 20-minute simulation with a trained standardized patient who had recently experienced a perinatal loss. The students experienced the simulation, in groups of two or three, and conducted a postpartum assessment of the standardized patient. Following the simulation, each group separately participated in a quick debrief. All participants were reminded of the counseling services sheet, in the event they experience psychological despair with the simulation.

Interview Process

Individual one-on-one interviews were conducted within 48 hours via Zoom video conferencing software. One-on-one interviews consisted of an open-ended, semi-structured interview guide that had been peer-reviewed by three individuals with clinical practice and expertise in the obstetric care and education. Participant confidentiality and voluntary consent to

the audio recording were discussed before the interview. The interview covered the topics of professional trajectories, caring for a patient experiencing a perinatal loss, and education regarding perinatal loss. The researcher followed the interview guide and provided detail and clarification when needed. Real-time member checking followed the interview to ensure the researcher accurately identified the comments and key factors.

Observational Field Notes

During the simulation, the researcher observed through a one-way glass. This allowed the researcher to incorporate extra observations and audio that may not have been expressed during the Zoom interview. The observation field notes form (Appendix G) was utilized to guide the researcher in making notes during the simulation and interview that provided richness to each individual participant's experience. The collection of field notes is essential to aid in the construction of thick and rich descriptions of the study context and interview (Phillippi & Lauderdale, 2017).

Privacy and Confidentiality

During data collection, disruptions were minimized and the allotted time to conduct the study was respected. Participants were made aware that the researcher would be observing through a one-way glass. The audio recordings, during the interviews, were transcribed and uploaded to ATLAS.ti. The ATLAS.ti, audio recordings are securely stored in a password-encrypted computer and to be stored in a folder for five years.

Interviews

Interviews were conducted within 48 hours of completing the simulation. The researcher emailed participants with their requested time frame for one-on-one interviews via Zoom video conferencing software. Participants had the ability to participate in the interview in a comfortable

and psychologically safe area. Ensuring participants' privacy and well-being is essential in collecting interview data because it enables the participant to disclose their experiences (Arundell et al., 2021).

1. Please introduce yourself to me, as if we just met one another.
2. Please tell me what level in your nursing program you are enrolled in.
3. Tell me about any death experience, aside from the simulation, that you have experienced.
4. How would you define perinatal loss?
5. Describe what you saw when you entered the room of the mother who had just experienced a stillbirth.
6. Taking into account your simulation, how would you describe your experience with the mother about her child?
7. What senses, that you were aware of, did you experience during the simulation experience?
8. What are your perceptions about perinatal loss following the simulation scenario? What comes to mind?
9. In what way, if any, has your perception changed of a perinatal loss by stillbirth?
10. In what way, do you perceive cultural beliefs impact mothers and/or families experiencing perinatal loss?
11. In what way, has this experience impacted your spiritual beliefs and/or experience with perinatal loss?
12. Having experienced this simulation, what recommendation do you have for maternal and child instructors?

13. What value, if any, will or has the experience impacted your nursing practice?
14. What questions or comments, if any, did you want to say to the patient but did not get the opportunity to do so?

Questions one and two are background/demographic questions. Background and demographic questions include their name and program level. Scholars recommend helping participants warm-up to interview questions by asking general questions about their background and other basic information (Jimenez & Orozco, 2021). Rapport, trust, and respect must be developed within the interview in order to create a safe place for participants to share insights and experiences (Roberts, 2020).

Siedlecki (2022) suggests broad open-ended questions to facilitate the sharing of stories by the participant. “Tell me about” questions are described as grand storytelling questions that reveal information the participant feels is important and relevant (Siedlecki, 2022). Past experiences and knowledge provide the participants the opportunity to think more deeply about what occurred and clarify, justify, and rationalize their experience (Roberts, 2020). Question three is an experience question designed for this purpose.

Question four invites the participant to reflect on and describe their perception. “How” questions evaluate inner-states and perception formation (Jimenez & Orozco, 2021). The benefit of asking how one would describe a certain topic allows the respondent to offer their view and offer new and surprising data (Jimenez & Orozco, 2021). Main questions should introduce the theme or focus of the study and closely align with the research question for consistency within the structure of the interview (Roberts, 2020).

Qualitative research questions encourage self-reflection and can give participants new perspectives on their experiences that can provide them with a positive change (Arundell et al.,

2021). Questions five through seven are sensory questions. These sensory questions review the participants' emotions, perceptions, and senses. Asking participants for a detailed description of what happened allows the researcher to probe further into the behavioral, cognitive, and emotional aspects of the experience for a more holistic view of the event, experience, or phenomenon (Roberts, 2020).

Recommendations suggest identifying concepts related to the research question and developing a series of questions that tap into that concept (Jimenez & Orozco, 2021). Comparing states prompts the participant's perceptions of cause and effect related to a change (Jimenez & Orozco, 2021). Questions eight through 14 ask participants to consider an individualized thought experiment, which takes the condition or event and asks the respondent to imagine what life would be like under a different condition or absence of an event (Jimenez & Orozco, 2021). Extensive probing, in interview questions, can collect more prevalent and salient ideas (Weller et al., 2018). Follow-up questions focus on highlighting words that stand out and get the participant to dig deeper for the researcher to acquire a more detailed response (Roberts, 2020).

Data Analysis

Data analysis consisted of a thematic analysis, using ATLAS.ti. ATLAS.ti allows for easy coding and recoding, and creates networks showing how codes and themes interact, thereby facilitating the interpretation process (Adelowotan, 2021). Interviews and observational data was used to aid in coding and theme development. The observation form (Appendix G) was utilized to observed participant actions and take notes of pertinent audio during the simulation. Observations provided the researcher with a deeper description of participant actions throughout the simulation. Through ATLAS.ti, the researcher had the ability to code, annotate, and compare different parts of information. During thematic analysis, meanings were identified into different

themes. The main themes were identified with patterns linked to the themes. This process resulted in categorizing specific categories and subcategories. The analysis of data continued until no new themes emerged. Flower pseudonyms were used to maintain participant confidentiality. The data is stored for five years through ATLAS.ti's sub-folder of data storage that can only be accessed by entering the full path name.

Data Synthesis

Participant interviews and observational field notes were synthesized into a coherent set of findings to develop the themes, subthemes, and codes for data analysis. Observational field notes correlated with participant responses. This correlation aided in the development of the major themes. Along with participant responses, researcher observations generated codes that were in conjunction with responses.

Trustworthiness

To ensure the trustworthiness and rigor of the study, the researcher maintained purposeful sampling. Along with purposeful sampling, the researcher avoided leading questions in the interviews. Extensive time, during data collection and analysis, was utilized while working with the data management software. In addition, the researcher made a conscious effort to set aside personal experiences to allow for the analysis of data to be less influenced by personal beliefs.

Credibility

Real-time member checks were utilized to ensure the credibility of the study. The researcher shared their understanding of the comments and key concepts to check for confirmation from the participant on the accuracy of their statements. Feedback solicited of the findings from the participants interviewed ensured the findings were adequately interpreted. The researcher also ensured that prolonged engagement and observation was utilized during the

research study. In-depth reading, analyzing, and theorizing of data was maintained. Utilization of reflexivity, through a reflexive journal, reflected and explained any biases, dispositions, and assumptions of the research. Reflexivity highlights the importance of researchers to be self-critical and flexible to adapt the interview process to enhance the quality of data collected (Arundell et al., 2021).

Transferability

A thick description of factors affecting undergraduate student nurses' perceptions and experiences of simulation education involving perinatal loss was utilized. This allows for the findings to be transferred to other contexts or settings, which can potentially improve the understanding and the training in other areas. The researcher provided enough detailed descriptions of the study to enable readers to compare if the findings apply to their situations. Careful selection of participants was maintained through purposeful sampling, allowing for results to be generalized or transferred to other contexts or settings.

Dependability

The researcher took great measures to ensure leading questions were avoided during the interviews. Sufficient detail of the study is provided. The sufficiency in data allows for another researcher to repeat the work. Precise methods of data collection, analysis, and interpretation are provided with adequate information about each piece.

Confirmability

Confirmability shows findings based on the participants' interview responses and not on the researcher's biases. All findings were derived from the data from the interviews and not from the researcher. An audit trail was used to provide a transparent and complete set of notes. These

notes include information regarding decisions, meetings, reflecting thoughts, sampling, use of research materials, and data collection and management.

Ethical Considerations

Approval from the Institutional Review Board (IRB) was obtained before the study commenced. Written permission from the university and informed consent from all participants was obtained. The research purpose and participants' voluntary right to participate and or withdraw from the study was fully disclosed. The expected risks from participation in this study included psychological and emotional distress. The research involved simulation, discussion, and questions of sensitive nature that could pose psychological or emotional risks (e.g. fear, stress, guilt, triggering of past emotions, etc.). To reduce risk, participants were debriefed with the researcher, and were provided with referral information to an on-campus counselor. Disruptions in the institution were minimal and individuals were given an incentive for participation. The researcher stuck to the questions in the interview guide, and utilized probing questions for additional clarity and information. Participants were allowed to review the outcomes of the research.

The researcher as completed the CITI certification in preparation for meeting the IRB researcher roles and responsibilities. Data held securely protects against the risk of breaches of confidentiality. In the case of data entered into computer files, electronic access will be subject to reasonable controls, which include a password, encryption, and file access. Reasonable steps detecting and preventing unauthorized access are taken. There are regular backups to ensure important data cannot be lost as the result of malfunctions of a single machine. Advice on the recommended retention periods for the data will follow Liberty University IRB recommendations. Data reported in aggregate format protects the identity of the subjects. Upon

completion of the data collection, analysis, and study completion, collected data information will be disposed of within the time frame and by the institution shredding methods, burning, and or file deletion. All reported data is honest and unbiased.

Summary

Nursing education and practice are continuously evolving and the use of simulation aids in the growth of knowledge, skills, confidence, and delivery of care. Innovative ways of teaching help nursing students grasp nursing practice in more life-like scenarios and scenes, thus aiding in retention and application of this knowledge for future use. Simulation interventions and teachings provide students with the skills and confidence to provide holistic care. Similarly, therapeutic communication ultimately improves patient care and experiences during difficult times.

A qualitative research design provides appropriateness to develop a simulation for undergraduate nursing students to experience a perinatal loss. Purposeful sampling allowed the researcher to understand the lived experiences of the sample pool. Understanding the lived experiences of the research pool contributed to the larger population pool and the needs of undergraduate nursing students in perinatal loss education through simulation. Interviews and observational notes provide rich data for understanding lived experiences, through coding and thematic analysis for data analysis and synthesis.

CHAPTER FOUR: FINDINGS

Overview

The purpose of this phenomenological study is to understand the perceptions and experiences of undergraduate nursing students in simulation education involving perinatal loss, specifically that of a stillbirth or intrauterine fetal demise (IUFD). The study was conducted at a private university located in the southeastern United States. Participants in the study included undergraduate Junior and Senior nursing students enrolled at the university. This chapter presents the findings of the data analysis, which remained consistent with phenomenological methodology. Presented first are descriptive factors regarding the sample program level, personal experiences of death, personal perceptions of perinatal loss, sensory factors during the simulation, experience influences, and personal impact from the simulation. Following the descriptive factors, the findings of the research study are presented to examine the research questions delineated in Chapter Three.

Participants

The sampling pool for this study consisted of undergraduate nursing students currently enrolled in or had completed their Maternal-Child Health rotation. A total of six classes were invited to participate in the study. Thirteen participants indicated their interest by scanning the QR code provided to them on the recruitment letter and/or recruitment flyer, which led them to complete the online consent and screening tool. These 13 participants voluntarily participated in the in-person simulation followed by a Zoom interview from a location comfortable for them.

Demographically, all of the 13 participants were female, with most ages ranging from 18-22 years and one participant in the 23-27 years range. Four participants (Juniors) were currently enrolled in their Maternal-Child Health rotation, while the remaining nine participants (Seniors)

had completed the course the year before. Eight of the 13 participants expressed religious practice. All but one participant recalled participating in a simulation while enrolled in the nursing program. See Table 2 for a summary of the participants' demographics.

Table 2

Demographics of Participants

Participant	Age Range	Gender	Program Level	Religious Practice	Simulation Experience
Azalea	18-22	Female	Senior	None	Yes
Marigold	18-22	Female	Senior	Catholicism	Yes
Sage	18-22	Female	Junior	Christianity	Yes
Daisy	18-22	Female	Senior	Non-denominational	Yes
Lily	18-22	Female	Senior	None	Yes
Dahlia	18-22	Female	Senior	Catholicism	Yes
Rose	18-22	Female	Senior	None	Yes
Gardenia	18-22	Female	Junior	Catholicism	Yes
Blossom	18-22	Female	Junior	None	Yes
Iris	18-22	Female	Senior	None	No
Amaryllis	23-27	Female	Senior	Catholicism	Yes
Tulip	18-22	Female	Senior	Catholicism	Yes
Jasmine	18-22	Female	Junior	Catholicism	Yes

Note. To protect participant confidentiality, pseudonyms have been provided.

Results

The results of the study discuss the three major themes: lack of experience/exposure to death, lack of engagement and communication, and greater awareness of empathy and

spirituality. Three subthemes emerged from the major themes. These subthemes included need for increased training, therapeutic communication, and regret. The development of the themes, subthemes, and codes incorporated participant interviews and simulation observational data.

Theme Development

Within 48 hours following the simulation, all 13 participants were interviewed via Zoom. Within those 48 hours, participants chose the time in which the interview would be held. From the interviews, several codes were developed, using the software Atlas.ti. Simulation observation notes were also utilized to determine codes for the research study. Among these codes, three common themes and three subthemes were developed (See table 3).

Table 3

Themes, Subthemes, and Codes

Themes	Subthemes										
<p>1) Lack of Experience/Exposure to Death</p> <table border="1" data-bbox="134 1108 800 1224"> <tr> <td>Codes</td> </tr> <tr> <td>Knowledge Gap/Lack of Awareness</td> </tr> <tr> <td>Knowledge Seeking</td> </tr> </table>	Codes	Knowledge Gap/Lack of Awareness	Knowledge Seeking	<p>1) Need for Increased Training</p> <table border="1" data-bbox="860 1108 1419 1262"> <tr> <td>Codes</td> </tr> <tr> <td>Lack of Understanding the Dying Process</td> </tr> <tr> <td>Personal Growth</td> </tr> </table>	Codes	Lack of Understanding the Dying Process	Personal Growth				
Codes											
Knowledge Gap/Lack of Awareness											
Knowledge Seeking											
Codes											
Lack of Understanding the Dying Process											
Personal Growth											
<p>2) Lack of Engagement and Communication</p> <table border="1" data-bbox="134 1335 800 1451"> <tr> <td>Codes</td> </tr> <tr> <td>Uncertainty</td> </tr> <tr> <td>Discomfort</td> </tr> </table>	Codes	Uncertainty	Discomfort	<p>2a) Therapeutic Communication</p> <table border="1" data-bbox="860 1335 1419 1562"> <tr> <td>Codes</td> </tr> <tr> <td>Human Connection/Interaction</td> </tr> <tr> <td>Active Listening</td> </tr> <tr> <td>Touch</td> </tr> <tr> <td>Lack of Training in Engaging and Communicating with Patients</td> </tr> </table> <p>2b) Regret</p> <table border="1" data-bbox="860 1598 1419 1677"> <tr> <td>Codes</td> </tr> <tr> <td>Missed Opportunity</td> </tr> </table>	Codes	Human Connection/Interaction	Active Listening	Touch	Lack of Training in Engaging and Communicating with Patients	Codes	Missed Opportunity
Codes											
Uncertainty											
Discomfort											
Codes											
Human Connection/Interaction											
Active Listening											
Touch											
Lack of Training in Engaging and Communicating with Patients											
Codes											
Missed Opportunity											
<p>3) Greater Awareness of Empathy and Spirituality</p> <table border="1" data-bbox="134 1751 800 1900"> <tr> <td>Codes</td> </tr> <tr> <td>Emotional Impact/Understanding</td> </tr> <tr> <td>Spiritual Influence</td> </tr> <tr> <td>Self-Reflection and Application</td> </tr> </table>	Codes	Emotional Impact/Understanding	Spiritual Influence	Self-Reflection and Application							
Codes											
Emotional Impact/Understanding											
Spiritual Influence											
Self-Reflection and Application											

Note: The table was developed to display the major themes, subthemes, and codes.

Theme 1: Lack of Experience/Exposure to Death

Several factors contributed to the first theme of lack of experience/exposure to death. Students expressed death had seldom been taught in their nursing education. Several students had not experienced any sort of death in the clinical setting. The lack of exposure led to a lack of understanding of the dying process; including the patient's bodily changes and the nurse's next actions following a patient's death.

Lack of Awareness/Knowledge Gap. Lack of awareness/knowledge gap are terms used in this study to define and describe the limited amount of exposure and training related to death that participants had received. Most participants mentioned that death education had only been briefly discussed within their nursing course preparation. Nine out of the 13 participants had some experience with death, yet only three of the participants had experienced a death in the clinical setting. Azalea stated, "I hadn't experienced any sort of death...especially in nursing, and it's kind of weird to think you see a baby [fetal demise], and you would assume they're alive. I didn't really know what to do besides be there for her." Daisy, who had experienced a clinical death during her time as a nurse tech, mentioned:

I felt very unprepared because I had never dealt with that [death] before in the clinical experience or first-hand. The only experience I can really think of seeing someone actively die is when I was working as a tech and we ran a code. Unfortunately, the patient didn't make it. It made it [death experience] a little easier on me because he wasn't my patient and I didn't have a connection to him. It wasn't as hard as I would imagine it would be if I had a connection with the patient.

One participant, Gardenia, had recently observed a postpartum assessment for a mother who had experienced a perinatal loss. Gardenia's patient interaction was brief; however, it was enough time for her to realize her lack of knowledge surrounding situations involving perinatal loss. Her clinical experience revealed to her the difficulty in providing care following a perinatal loss. Gardenia expressed how the clinical interaction brought to light the lack of awareness and knowledge gap she experienced:

Last week, I had a very similar situation happen that we recreated in sim [simulation], which is why I wanted to do this. And because I realized that, so far in nursing school, I haven't really learned a lot about death and how to deal with a patient that has gone through death. I was only with my patient for about 20 minutes or so. After the little interaction I had with her, I realized that I wanted to do more and I kind of felt a little helpless in the situation because I didn't really know what to say or what to do. I realized how little I know about the subject.

Gardenia's clinical experience made her aware of the limited amount of knowledge she had regarding perinatal loss. Her realization highlights her lack of training and the importance of perinatal loss education. Unsure of what to say or do in a situation involving perinatal loss led Gardenia to feel helpless. Her lack of clinical experience and knowledge guided Gardenia to pursue further exposure and training.

Lack of Understanding of the Dying Process. For the purpose of this study, lack of understanding of the dying process is defined as the challenges that increase when applying the physical experiences and their relation to textbook knowledge when one attempts to find purpose and meaning to a body that is in one's presence but no longer has signs of life. Participants expressed emotions of sadness and confusion during the simulation and in previous experiences

with death during clinical patient care. Lily had experienced a death in the clinical setting during her clinical rotation at hospice a week before the simulation, stating, “It was strange because I’ve never seen that [death] before. To know he was not with us on this planet...knowing there was nothing still beating in him. It was strange lifting his arms, and the hospice nurse acted like it’s normal...they [hospice nurses] didn’t really react, and I was trying to take it all in.” Other participants, such as Blossom, expressed a lack of understanding when viewing a mother hold and care for a baby that has no signs of life:

Perinatal loss is a hard experience. It’s so difficult to deal with for not only the person but also the nurse. When I first walked into the room, I knew she had a miscarriage, but it was really hard to see her because I didn’t realize that she was also going to be holding the baby...it was really disheartening to see her holding a dead baby. I didn’t know what to say or how long to give her with the baby.

Participants expressed little knowledge of the physical, mental, and emotional process experience when witnessing the dying process. Perinatal losses are one of the most challenging bereavement experiences (Alvarenga et al., 2021). Perinatal losses contribute to the emotional distress and physical exhaustion in nurses handling deceased babies (Zwerling et al., 2021). Wang (2021) also noted that nursing students must be adequately trained to help cope with suffering.

Subtheme 1: Need for Increased Training. For the purpose of this study, the need for increased training is defined as participants expressing the need for proper training in undergraduate nursing related to death education and perinatal loss. The lack of experience/death exposure led participants to express a desire for increased knowledge to aid in personal growth. Although it was mentioned that death/dying is briefly discussed in the nursing curriculum, a

majority of the participants noted that the education and training were not enough. In order to provide better care for the patient, participants expressed that increased training through simulation or additional educational materials would greatly enhance students' knowledge and skills related to perinatal loss.

Knowledge Seeking. For the purpose of this study, knowledge seeking is defined as the desire for increased nursing knowledge in death education. This knowledge assists healthcare providers, specifically nurses, in recognizing the emotional challenges present in death situations and to improve patient care and experiences. Tulip noted the need for training and experiences for improved emotional interventions. Tulip expressed how the simulation provided her with the knowledge and ability to be more emotionally aware during challenging death situations:

I think it [death] should be talked about more. We talk about it in lecture for a little bit, but nothing too extreme, and I think it does scare a lot of people. It can be emotionally challenging, so talking through how hard it can be would definitely be beneficial for a lot of nursing students, especially if you want to go into L and D (labor and delivery), postpartum, or mother-baby. It [death] can be emotionally challenging, and I think this experience gave me a leg up in the sense that it challenged my emotions and helped me to keep them 'in check'.

Tulip's experience was similar to other participants'. Sage also expressed a desire for increased knowledge. She mentioned the importance of stillbirth simulations to help provide students with a path to address these types of issues in a certain manner, and to help them handle these situations:

I wish I was more knowledgeable about what to do in that situation because I haven't learned about it yet. Because I wasn't experienced enough, I felt like I wasn't able to

assist her [Rachael] the best...I'm sure at the time that the first stillbirth occurs, everyone will be upset and won't know what to do, but as days go on and hours go by, we still have to go forward with all of our work and what we need to do to make sure mom's okay.

Participants expressed the need for simulation training to prepare nursing students to handle difficult situations and provide therapeutic communication. Daisy noted the need for simulation, expressing, "In real life, I don't want to walk into a room completely unprepared to not know what to do." The lack of training led to the sense of an inability to properly care for the patient. Participants expressed that early educational training and exposure to death can provide understanding for emotional awareness and therapeutic communication. Having greater awareness and training allows for improved patient assistance and care during challenging situations.

Personal Growth. For the purpose of this study, personal growth is defined as the process of individuals with the skills and ability to provide better patient care through improved practice and communication. All participants expressed how the simulation provided them with personal growth and how this growth would be applied to their nursing practice; however, they also mentioned the lack of training for a death situation in their nursing education and the need for improved training through simulation and course teachings. Gardenia stated:

In OB [obstetrics] class, we barely touched the subject of stillbirth. We talked about grief and maternal losses like spontaneous abortions and what miscarriages might look like, but we didn't really talk about ways to handle these situations. I may understand the medical terminology of what's happening, but I think professors should go into nursing

interventions that aren't medical. This situation has taught me to have sensitivity and respect for all patients.

Daisy expressed how the simulation aided her personal growth for improved patient care, and how the subject of death should be discussed more often in nursing education to ultimately improve patient care:

Seeing the emotional aspect of this has helped me for when I get into practice. Having empathy and the ability to use empathic communication is something I'll take into my nursing practice. This [perinatal loss] is briefly touched on in class, and I think it's [perinatal loss] more common than what we might think. I think we definitely need to touch more on it in class and have a simulation or practice because, in real life, I don't want to walk into a room completely unprepared and not know what to do. If we touched on it more in school, it would help us feel better prepared for when we get into the real hospital setting.

The simulation experienced provided the participants with personal growth in perinatal loss knowledge, emotional awareness, and empathy. The personal growth that occurred as a result of the simulation experience prepared the participants to handle clinical scenarios similar to that of a perinatal loss. Daisy's suggestion of touching more on the subject in school aligns with previous studies, such as Bailey and Bishop (2017), who examined the benefits of practicing in a highly emotional situation before actually experiencing it with patients.

Theme 2: Lack of Engagement and Communication

For the purpose of this study, lack of engagement and communication results from the uncertainty and discomfort experienced during perinatal loss . The discomfort in engagement and communication ultimately affected human interaction with the patient. Participants expressed the

desire to engage more with the patient. The inability to fully engage and communicate with the patient as participants desired led to many of the participants feeling regret for not having done more.

Uncertainty. For the purpose of this study, uncertainty is defined as personal dilemma experiences that arise when one encounters a challenge in the choice of actions to take or words to say in situations involving perinatal loss. Throughout the simulation, several participants expressed to Rachael that the loss was not her fault and there was nothing she could have done to prevent the death of her baby. Following the common phrase, “I’m sorry for your loss,” it was observed that the majority of participants moved toward the task sheet and focused on the patient assessment rather than on personal interaction with the patient. Azalea expressed the uncertainty she encountered upon entering the simulation experience:

I thought I was going to be okay, and then I walked in and I didn’t know what to say.

Normally, when I see a patient is having a hard time, I can be like ‘Oh, it’s going to be okay’, and you can say the same thing to her [Rachael] but it’s a completely different scenario...the fact that she lost her infant...I guess I was shocked and at a loss for words.

A sense of uncertainty was commonly expressed among the participants. They desired to interact and console the patient, but worried about saying the wrong thing. During the simulation, Blossom carried her task sheet with her and focused on taking Rachael’s vitals. She offered to move the baby to the bassinet to allow for Rachael’s blood pressure to be taken, followed by telling Rachael, “I’m sorry for all of this. We’re all here to help you.” Blossom expressed her dilemma when faced with the decision to console Rachael:

I didn’t want to say anything wrong, and when she [Rachael] started crying, it was really hard because I wanted to tell her everything’s going to be okay, but you’re not supposed

to say that. I wanted to find the right words to say without saying anything wrong...I felt like I was more quiet because I was scared to say something that may have offended her or made her feel worse. I felt like quiet was safer.

Others expressed levels of uncertainty when applying communication regarding the patient's baby. In observation, a few participants asked Rachael if she would like a memory box, in which they would take pictures, footprints, clips of hair, etc. Dahlia mentioned:

I could see she was still attached to the baby and holding the baby, which was kind of hard to see. I felt bad for her, and I was unsure of what to say. I think the fact that I don't remember being taught what to do in a situation like that, I didn't know if I should ask her the baby's name. As a nursing student, I don't really know exactly what the next step is.

Similar to Dahlia, Gardenia expressed uncertainty with communication and appropriateness of words in a situation involving perinatal loss:

I tried going into the room really thinking about communication with the mom and trying to console her and tell her that it's a normal process that a lot of mothers unfortunately go through. So, having that in the back of my mind, I think when I walked in, I got a little thrown off, and I wish that I said more. I was nervous about my wording and I wanted to sound like I cared for her, but I didn't want to sound insensitive. I think that was what I was focused on.

Sage was observed to be rushing during the simulation and spoke minimally with Rachael. Sage expressed her uncertainty in actions and words:

I felt like my hands were tied because I didn't know what to do. I felt like I was not able to help her as much. I obviously wanted to give the patient as much time to process

everything and still perform skin-to-skin so she didn't feel like something was being taken away from her. I refrained from asking the patient about a support system because not all patients have support systems...and you don't want to say something and trigger them [the patient] if it's too early. I feel like giving her space would be the best thing.

Uncertainty in appropriate communication prevented many of the participants from further engagement and communication with the standardized patient. The lack of communication not only consisted of verbal communication, but nonverbal communication as well. The uncertainty caused hesitation in communicating, which ultimately resulted in silent interaction.

Discomfort. For the purpose of this study, discomfort is defined as the feeling of uneasiness and stress in difficult patient care situations. Similar to uncertainty, discomfort poses a challenge in communication and interaction with patients due to the fear of miscommunication. Several participants expressed a sense of discomfort when caring for Rachael as she mourned the loss of her child. Marigold mentioned how the experience gave her a sense of discomfort:

It was slightly uncomfortable because you don't really know. I wanted to ask how old [baby] but I knew it wasn't going to go well. It's an extremely stressful situation because the mother has been wanting the baby for nine months. So, it's a stressful and sad situation. It's just like you just don't know what should be talked about in that situation.

In the simulation, Daisy was observed communicating well with Rachael, and even expressed to Rachael that if she felt the assessment was too much, the group could step out. Although Daisy took the lead as the charge nurse, she expressed discomfort during the simulation:

It was very hard and almost uncomfortable to figure out what would be appropriate or not in that situation. I've never seen a mother grieving from the loss of her infant, so I didn't know what would be the right things to say or do because I think every mother in that situation would be different. It's figuring out what maybe would trigger her or what would be therapeutic to say at that time.

Jasmine acknowledged the challenges in empathy stating, "I can't tell her that I understand how she's feeling, because I don't. There are certain ways in providing an emotional assessment and I think, for this situation, there needs to be a more systematic assessment."

The discomfort and challenge in communicating with Rachael posed a challenge for the participants. The discomfort in communicating led to decreased engagement with Rachael. Methods of therapeutic communication were affected. The effect of therapeutic communication was due to the uncertainty and discomfort the participants expressed.

Subtheme 2: Therapeutic Communication. For the purpose of this study, therapeutic communication is defined as a form of communication, either verbal or nonverbal, that provides emotional patient care. Therapeutic communication, which includes active listening and touch, posed a challenge to the participants due to the uncertainty and discomfort they experienced in communicating with the patient. Unsure of what to say or do limited the potential for human connection and interaction with the patient. Although the participants expressed uncertainty in communication, their silence did provide the patient with the positive effects of therapeutic communication through active listening and allowing the patient to talk through thoughts and feelings with minimal interruption.

Human Connection/Interaction. For the purpose of this study, human connection/interaction is defined as conversation, nonverbal or verbal, between two individuals

to provide physical and emotional care. Human connection and interaction portray areas of therapeutic communication that allow individuals to talk with patients in ways that are expressed verbally or physically, ultimately encompassing holistic care that will improve the patient's experience and outcome. All participants expressed, in some way, the difficulty in finding the right words to say or the best actions to take. Amaryllis noted the difficulty in finding how to care for the mother without being intrusive:

I felt like I was intruding, and I didn't want to interrupt. I could tell that she [Rachael] already bonded like the relationship was definitely there. So, I didn't want to ask her during the assessment to take the baby because I felt like that was kind of robbing her from something she was really cherishing.

Amaryllis' actions demonstrated an interaction that considered the mother's needs, while providing medical and emotional care. During the simulation, Amaryllis provided therapeutic communication through her actions and words. While assessing Rachael, she spoke to her and asked how she was doing, while expressing that all of Rachael's emotions were valid and everything she was feeling was okay to feel. Although Amaryllis demonstrated ease in interacting and communicating, she expressed the challenge she faced in providing therapeutic communication in a perinatal loss situation:

It's one thing to talk about it [therapeutic communication] in class, and it's another thing to actually have the simulation where you are interacting with someone grieving. It's a totally different situation when you're actually the nurse and they're [patients] relying on you and looking at you for answers. You want to be able to provide that.

Amaryllis demonstrated ease in interacting with Rachael; however, other participants found it more challenging to interact with Rachael. For example, Azalea entered the room and

stood closer to the door rather than standing by the patient. Having the other participants interact and communicate with Rachael, Azalea kept at a distance from the patient and did not communicate during the simulation. Azalea discussed her reactions, which she stated were a result of uncertainty about acceptable things to say and overall discomfort in the situation:

I kind of took a back seat when it came to the simulation. I was kind of shocked like I didn't know what to say. Just being more comfortable and talking to her regularly...I feel like that would have been better than not saying much. I just hadn't experienced any sort of death, so I didn't know how to handle that situation. Being more comfortable or exposed would have helped me to not freeze up.

As expressed by the participants, the limited amount of human connection and interaction with the standardized patient stemmed from uncertainty in what to say. Similar to uncertainty, participants expressed the discomfort of “intruding” during a highly emotional situation for the patient. Increased exposure to difficult patient care scenarios enables one to feel more comfortable, as noted by Azalea. This aligns with the findings of Shen et al. (2022), who concluded that adequate exposure is needed to strengthen bereavement support skills.

Active Listening. For the purpose of this study, active listening is defined as communication between two or more individuals where the individual speaking is allowed to talk without interruptions. Silence, while interacting and communicating with others, allows others to express emotions, thoughts, and feelings without interruption. Upon walking into the simulation room, it was observed that Iris stood further back from the patient and engaged in little conversation. In response to her awareness of senses, Iris stated:

There was a little bit of a pit in my stomach when she started to cry. It was hard to come up with something on the spot when she [Rachael] would say stuff like ‘It’s my fault’.

You have to act quickly so you're not creating that silence and making them [patients] even more uncomfortable. Dealing with death, you might freeze up on what to say, but you have to try to comfort the parents and work around what they want.

Although Iris experienced challenges in communicating with the patient, her ability to stand and listen to the patient provided therapeutic communication through active listening. Allowing the patient to express her thoughts, without interference, allowed the patient to help herself walk through the scenario and slowly piece it together. Similar to Iris, Dahlia stated she didn't know what the next step was. When Rachael cried, Dahlia walked closer to Rachael, placed her hand on her shoulder, and stood silently while Rachael spoke. Dahlia's silence gave Rachael time to speak and express herself. Dahlia stated:

In that situation, I don't know what she does now that she lost her baby. She [Rachael] was holding the baby and she seemed very upset, which was kind of hard to see. It's tragic, and it [experience] changed how I could support them. It was good to see how I would act if I was put in that situation.

Although Dalia was uncertain of ways to support the patient during the experience, it provided her with the awareness to change ways in which she could support a patient during a challenging time. Although active listening could be interpreted as avoidance, it provides the patient with an environment to express thoughts and feelings to piece together a situation. Active listening provides a form of therapeutic communication that allows expression of thoughts, feelings, and emotions without interruption.

Touch. For the purpose of this study, touch is defined as appropriate physical touch between the nurse and patient. In the five scenarios, Rachael cried during the interactions with the participants. The researcher made note during the observations that Tulip and Dahlia had an

immediate change in their facial expressions and approached the patient, placing their hands on Rachael's shoulder. Tulip stated:

I felt overwhelmed when the patient was saying 'I don't know what to do.' In that case, I don't really know what to say back. I was getting a little overwhelmed in my head like, 'Oh shoot, what do you say?' I placed my hand on her shoulder...I thought that it could be a good coping or emotional intervention to use.

Physical touch provides a form of therapeutic communication and human interaction.

Tulip found it challenging to choose words, yet her form of physical touch with the patient provided an emotional awareness, letting the patient know that her nurse was there. Nurses must build trust through communication (Sousou & Smart, 2015). Tulip's use of touch provided a form of communication to the patient. In situations where difficulty in verbal communication is posed, utilizing another form of communication, such as touch, allows for silent communication. Appropriate physical touch with a patient provides nonverbal communication and aids in patient trust.

Lack of Training in Engaging and Communicating with Patients. For the purpose of this study, lack of training in engaging and communicating with patients is defined as minimal education and practice in effectively communicating, verbally or physically.

Effective communication was limited during the simulation. Participants expressed that this resulted from a lack of training in engaging and communication with patients. This theme poses a challenge in emotional interactions, discussions, and implementing interventions when providing patient care during a challenging situation. Jasmine noted:

It [simulation] gives you a better perspective of patient care and quality. It [experience] definitely addresses the emotional need that the mother is going to need after the fact. It's

different from other assessments because we go in and take vitals and make sure the patient is stable, but something like this, you really need to focus on the emotional aspect of it. In order to be there for the mother emotionally, there needs to be a more systematic assessment. Being taught how to comfort other people in a healthcare setting is something I haven't experienced much. You talk about therapeutic communication and all, but when it's right there in front of you, you're kind of taken aback like 'How do I react to this?'

Gardenia mentioned the little she knew about the subject and how it could affect a person's emotional and mental state, stating:

It's kind of overlooked...we talk about how important communication is, but in topics like this, we don't really focus on it and we just have a broad subject to communicate with your patients, but they [instructors] don't really teach us how to. We had PowerPoints with definitions of different types of miscarriages and the medical assessments you have to do, but it wasn't really human-to-human interactions like communication, and I feel that's almost just as important as understanding medically what's going on.

Similar to Gardenia, Tulip discussed the limited experience with emotional interventions during patient care:

I don't think we have much experience with emotional interventions...I think this [simulation] should be something that all students go through, because we don't get to see this in the clinical setting, and in simulation with a real person you get more of their emotions and how you care for them, without doing any harm.

The lack of training in engaging and communicating with patients made participants more aware of the importance of communication and emotional interventions that nurses can provide to patients. As communication is a core concept in nursing to ensure patients are provided with adequate care during the bereavement process (Salgado et al., 2021), training to effectively engage and communicate with patients is also essential in nursing education. The need for increased training in communication, as expressed by the participants, is needed to improve emotional patient comfort and care.

Subtheme 3: Regret. For the purpose of this study, regret is defined as a wish or desire to have taken different actions during a past event. Regret manifested itself after the participants completed the simulation experience. The participants expressed a wish to have communicated or acted differently with Rachael. As several participants mentioned, they wished they had communicated and spent more time with Rachael.

Missed Opportunity. For the purpose of this study, missed opportunity is defined as failing to interact as one desires. During a certain situation, failing or avoiding to communicate or act leads to missed opportunities that causes a sense of regret and desire to have acted differently. Nine of the participants mentioned that the regret they experienced stemmed from their lack of communication. For example, Azalea stated, “I think I would have liked to communicate more with her. Just being more comfortable and talking to her regularly...I feel that would be better than not saying much.”

Jasmine discussed the missed opportunity in providing emotional care to Rachel:

As the nurse, I could have done so much more for her emotionally instead of just physical care. At the time, I was going to ask her if she would want one of us to wait with her so she wasn't alone in the room...I wish I offered that.

Gardenia reflected greatly on the experience in respect to group simulation and the challenges she faced with interacting and communicating more with the patient:

Right when I walked out the door, I wish I did more. A thing I keep playing over in my head is when we were leaving and she [Rachael] started to show her physical emotion and started to cry. I offered her a glass of water and we all kind of said ‘Okay, we’ll be here if you need anything.’ Seeing other people finish up, everyone gravitated to the door like we were done. I think if I was alone or if I had more confidence on how to deal with these situations, I could have taken point a little more...I wish I stayed with her in the room and even taken a seat with her. Just something to show her she isn’t alone in the process. I wish I had said more comforting things rather than talk about what I was going to assess. I was caught in what I can and can’t say, and then I realized that in real life, whatever you say is going to help the patient.

The missed opportunity of communicating more with Rachael and/or spending greater time with her resulted in participants feeling regret, and wishing they had done more. As many participants expressed, the challenge in being comfortable communicating with Rachael was partially due to the uncertainty about wording choices. For Gardenia, her regret in not spending more time with Rachael contributed to the group simulation and following the other participants as they exited the room. As Escribano et al. (2021) found, simulations with standardized patients improve communication skills and self-efficacy amongst nursing students.

Theme 3: Greater Awareness of Empathy and Spirituality

For the purpose of this study, greater awareness of empathy and spirituality is defined as one’s ability to self-reflect upon a situation and view events from a different perspective, while strengthening one’s own spirituality that guides one through life events. The simulation

experience allowed the participants to gain a greater understanding for what parents experience during or after a perinatal loss. The awareness and increased empathy, as expressed by Blossom, was not only felt for parents of a perinatal loss, but for all people. While some participants expressed their increase in empathy, others discussed hope that their spirituality would shine light on the situation from a patient's and nurse's standpoint.

Emotional Impact/Understanding. For the purpose of this study, emotional impact/understanding is defined as awareness of one's self and others' actions based on experiences. Exposure to challenging patient care scenarios provides individuals with emotional awareness for themselves and others, while creating a deeper understanding of the challenges faced and the spirituality that guides one through it. While observing the participants, a large portion of the participants walked in focused on completing the task sheet and experienced a switch in focus when the patient began to cry. Blossom noted:

It's so difficult to deal with, for not only the person but also the nurse. It's awful to see someone lose their baby they developed a connection to. My heart goes out to people that go through this, and my empathy for people has grown.

Lilly acknowledged that the experience created awareness of perinatal loss, stating: It's given me more light on what to expect if I were to see the situation again; how I would reach in during an unexpected and terrible situation. So much respect for the mothers because no one will really understand what they're going through unless they go through [it] or have somewhat experienced the situation themselves. If I were to go through this, I would really hope that my spiritual beliefs would lead me to recover from it.

Sharma et al. (2022) found that empathy is a learned quality in provider-patient

relationships and is necessary to lower bereaved mothers' grief. The emotional impact of empathy that the participants experienced aided in their understanding of perinatal loss and how it can affect a patient, family, and nurse. The experience helped participants understand the emotions and challenges patients, families, and nurses may encounter.

Spiritual Influence. For the purpose of this study, spiritual influence is defined as one's belief in a higher or greater good, guiding one's actions on earth. Spiritual influence ties one's existing spirituality to challenging situations, strengthening one's spirituality and situational enduring effect as guidance in patient care. Although many of the participants responded that the experience did not impact their spiritual beliefs, a portion of them did feel it reinforced their faith and/or spirituality. For example, Sage stated that she looked at the simulation through her point of view and God's purpose:

Going through that, I kind of looked at it in my point of view like if this had happened to me, why would God have done that to me? Why would that have occurred? Why am I the one that got chosen to go through this experience? I feel different cultural groups can perceive and go through stillbirths differently, and in terms of religion or Christianity, it might be looked at like it happened for a reason and it wouldn't have happened if God didn't want it to happen.

Although at the moment Amaryllis was not impacted spiritually, she did acknowledge her religion as comforting in nursing care, stating:

I'm very religious, but I don't know if the simulation necessarily impacted my spirituality in that moment. For me, it's comforting to have religion as a caregiver, especially with what we see in the hospital and in helping a mother through perinatal loss.

Reflecting on the simulation experience, Iris expressed the importance of incorporating spiritual and cultural beliefs, and what she believed may prevent healthcare providers from doing so:

I think as nursing students, we're more led to focus on the health problem. We do learn a little bit about cultural and spiritual aspects of it, but when we're actually treating the patient, we focus on the health portion because we think it's more urgent. Their [patients] cultural and spiritual beliefs can also be just as urgent and we just don't see it that way, especially in the American culture. Incorporating spiritual and cultural aspects into the patient's care would help them feel more comfortable and safe. We get so focused on their health that we forget to ask if they have any other preferences or beliefs.

Spirituality allowed the participants to reflect on their beliefs and spirituality. This reflection helped them to see how their beliefs and spirituality would help guide them through challenging nursing-care situations. The participants similarly expressed how their spirituality would help them through a perinatal loss. While the participants explored their own spirituality, being aware of the patient's spiritual beliefs or preferences was discussed as equally as important as understanding the patient's physical health.

Self-reflection and Application. For the purpose of this study, self-reflection and application is defined as one's ability to reflect and evaluate one's thoughts, feelings, emotions, and actions during an experience, and utilize those senses to improve future situations and similar experiences. Awareness of self-reflection and application allowed the participants to think about what they did and what they could have done better. This reflection helps prepare them for future situations similar to their initial experience. Marigold felt the experience made her more aware and empathetic by showing her how a patient may feel in that type of situation:

I already knew that it [perinatal loss] could be sad and hard to deal with, but it [experience] changed how I feel. Just knowing how sad it is actually being in the situation where the patient is experiencing it. It made me be more aware and empathetic. I'll definitely be more supportive of the patients that go through that [perinatal loss] and dig more into their cultural beliefs and what they feel at ease in these situations; how they cope with stress and sad situations.

Gardenia applied much of her clinical experience to the simulation experience, stating:

I realized how little I know about the subject and I never really thought about someone's emotional and mental state...how someone would go through this then have to want to try for another child. It really affected me personally when she [Rachael] kept saying how sad she was about her baby and how she has to have a funeral for her, and I think that hit me because I never would have thought that would have even taken place. Physical touch and showing her [Rachael] that I was there is something that stuck to me because when I think of nurses, I think of medicine...but seeing that you can just be a human and say, 'I wish things were different' and 'I'm here for you' really stuck out to me. I feel like it's [perinatal loss] kind of overlooked, and I never really thought about it that much, but this [experience] has made me want to research it further. Respect every patient that walks in the hospital because you never really know what someone's going through. I feel like having that sensitivity to all patients is something I will always have now.

As Gardenia mentioned, perinatal loss is a topic that tends to be overlooked. The experience of the simulation allowed Gardenia and several other participants to reflect and understand how the situation affected their thoughts, feelings, and emotions. Similarly,

understanding their own senses, participants expressed a greater understanding of perinatal loss and increased empathy for not only patients, but for all people.

Research Question Responses

CQ: What are the experiences of perinatal loss and the impact of the experience on undergraduate student nurses?

The primary research question, what are the experiences of perinatal loss and the impact of the experience on undergraduate student nurses, focused on understanding the experiences of perinatal loss and the impact of the experience on undergraduate student nurses. The experience made many participants aware of the lack of training and education involving death. The limited training in death situations inhibited the participants' ability to confidently provide medical care while incorporating therapeutic communication and touch to a patient. As Daisy explained the experience:

I felt very unprepared because I had never dealt with that [perinatal loss] before. I had never, in a clinical setting or first-hand experience, seen a mother grieving from the loss of her infant, so I didn't know what would be the right things to say or do because every mother in that situation would be different. It's kind of figuring out what maybe would trigger her and make her more upset or what would be therapeutic for her. That was very hard for me and uncomfortable to try to figure out what would be appropriate or not in that situation. There's not a one-size-fits-all for how to treat mothers emotionally. It's very sad, but we [nurses] still have to take care of the mother physically as well as emotionally. This situation was a learning experience for how I would react emotionally if I came across it in a clinical setting.

Following the primary research question were two subquestions:

SQ1: What are the perceptions of spiritual beliefs impacting undergraduate nursing students' experience of perinatal loss?

Although the experience did not affect participants' spiritual beliefs, it did reinforce their comfort in having their spirituality or religion guide them in nursing practice in providing care during these challenging situations. The participants expressed that their perceptions and empathy grew and they became more aware of how difficult death situations, specifically that of a perinatal loss, can be for nurses. Marigold stated:

When it comes to spirituality, I don't think there was much on my end. It was mostly feeling. It [experience] has made me more aware because I've never been around a patient that has gone through perinatal loss. It does portray more sadness and shows how sad the situation can be and how hard it is.

Amaryllis found the experience reinforced her religious and spiritual beliefs in that they provided her with comfort during difficult patient care scenarios.

SQ2: What are the perceptions of simulation impacting undergraduate nursing students' experience of perinatal loss?

The simulation experience impacted the participants' experience by increasing empathy in patient care, and by improving confidence and understanding if presented with this situation again. As Azalea mentioned:

Doing the simulation than just reading it [perinatal loss] in a textbook, there are definitely more emotions now attached to it. This [simulation] is a good instance where therapeutic communication can help you with knowing what to say when the scenario comes up.

Another participant, Tulip, shared:

This helped my perception and made me more educated on how to go through it [perinatal loss] because, in a real-life clinical setting, you don't get much experience with that [perinatal loss]. In simulation with a real person, you get more of their emotions and how you care for it without doing any harm.

The participants' experiences provided insight to answering the primary research question and subquestions. The experience resulted in participants feeling unprepared due to a lack of training and exposure to death. Through the simulation, participants were able to incorporate their spirituality into the patient care scenario. The incorporation of spirituality allowed the participants to evaluate their needs and the needs of their patients in situations involving perinatal loss.

Summary

As noted by the participants, death and perinatal loss are briefly discussed in undergraduate nursing education. The lack of experience, exposure, and education contributed to confusion and uncertainty in providing care in these types of situations. Communication, among all, is one of the biggest challenges nursing students face when providing care during perinatal loss. Although the standard reply, "I'm sorry for your loss," is among the first therapeutic communication phrases, the challenge arises when engaging in further communication and compassionate care.

The experience of a perinatal loss simulation provided greater awareness of the challenges and needs faced when caring for a patient experiencing perinatal loss. The participants have become more aware of the challenges faced during perinatal loss. Along with awareness of the challenges, the participants have developed a greater sense of empathy and compassion in patient care. Experiencing a simulation with a standardized patient allowed the

participants to engage in therapeutic communication and question why these challenging situations are not taught more within the curriculum.

Simulation promotes active learning and self-confidence to enhance specific undergraduate nursing competencies (Khasawneh et al., 2021). The participants expressed that simulation education with a standardized patient allows for practicing therapeutic communication and patient care in a safe environment without causing harm. Death simulation learning can help students recognize the importance of empathy for others and acknowledge respectful care (Stockman et al., 2021). Participants expressed that an experience similar to a clinical experience increases preparedness and acknowledgment of personal needs to provide improved patient care and experiences. Simulation has been shown to increase confidence and knowledge in various disciplines and aids in the learning retention achieved by the participants (Crowe et al., 2018). In providing a path of guidance to sensitive patient care scenarios, nursing students can feel a greater sense of confidence and preparedness when these difficult patient care scenarios arise in the clinical setting.

CHAPTER FIVE: CONCLUSION

Overview

The purpose of this phenomenological study was to understand the experiences and perceptions of undergraduate nursing students in providing care following a perinatal loss simulation. The research study findings identified three main themes and three subthemes of the perceptions of 13 undergraduate student nurses' experiences during a perinatal loss. This chapter includes a summary of the findings - a discussion of undergraduate nursing students' experiences with stillbirth simulation education. In addition, the theoretical, empirical, and practical applications and implications of the findings of the study are presented, which provide valuable information for nursing educators, nursing curricula writers, and future researchers. The delimitations and limitations are also discussed.

Summary of Findings

Three research questions, a central question and two sub questions, guided this phenomenological study:

CQ: What are the experiences of perinatal loss and the impact of the experience on undergraduate student nurses?

SQ1: What are the perceptions of spiritual beliefs impacting undergraduate nursing students' experience of perinatal loss?

SQ2: What are the perceptions of simulation impacting undergraduate nursing students' experience of perinatal loss?

CQ: What are the experiences of perinatal loss and the impact of the experience on undergraduate student nurses?

The purpose of Research Question 1 was to explore the lived experiences of undergraduate student nurses following a simulation involving perinatal loss. To understand their lived experiences, the researcher asked the participants to recount their experience and interactions with the standardized patient. Three main themes were identified: lack of experience/exposure to death, lack of engagement and communication, and greater awareness of empathy and spirituality. Within the three main themes, three subthemes were identified: need for increased training, therapeutic communication, and regret.

Participants expressed the limited training they had for situations involving death, especially that of a perinatal loss, noting that terms and signs of miscarriage/loss are discussed in their classes, but further in-depth training on therapeutic communication or emotional awareness needs to be included in educational training. Several participants discussed the discomfort and sense of being overwhelmed when needing to communicate and interact with the patient. As many participants expressed, and as it was observed, there was a hesitation in what to do or what to say to the standardized patient. Although a few participants had experienced a death previously in a clinical setting, the experience in the role of the nurse posed a greater challenge for them.

Reflecting upon the experience, although many participants felt at a loss for words and found it challenging to take certain measures or actions to help the patient, most participants felt the experience provided them with greater empathy, personal growth, and brought awareness to the emotional needs for the patient and for themselves. Many participants expressed that the experience ultimately helped them to understand how they would handle a similar future

situation when encountered in the clinical setting and improve their ability to therapeutically communicate and interact with patients. One participant expressed her desire to understand and research perinatal loss.

SQ1: What are the perceptions of spiritual beliefs impacting undergraduate nursing students' experience of perinatal loss?

This subquestion explored the participants' perceptions of spiritual beliefs impacting their experience of perinatal loss. The majority of participants expressed their spiritual beliefs were not impacted; however, those with spirituality/religion felt the experience reinforced their beliefs. One participant mentioned how her religion/faith gave her comfort, while providing patient care especially in the clinical setting where nurses often see unfortunate situations.

In the aspect of spirituality and cultural beliefs, a few participants noted the importance of incorporating a patient's cultural and/or spiritual beliefs in patient care. Participants expressed that incorporation of spirituality and cultural beliefs leads to improved patient experience and outcome. One participant mentioned her perceptions as to why some healthcare providers fail to incorporate spiritual and cultural beliefs. This participant expressed the lack of spiritual and cultural incorporation may be related to the greater focus on the patient's health and medical care, and less focus on their spiritual and cultural beliefs.

RQ2: What are the perceptions of simulation impacting undergraduate nursing students' experience of perinatal loss?

The second subquestion sought to explore how simulation impacts undergraduate nursing students' experience of a perinatal loss. The majority of the participants expressed the greater need for education involving simulation, as it gave them the opportunity to practice communication and human interaction in an environment where they could do no harm. The

experience provided participants with a greater sense of awareness and empathy, especially for patients experiencing a perinatal loss; understanding the challenges and emotional impact a perinatal loss can have on a patient, family, and nurse. Participants felt the experience provided them with a better perception regarding how they would handle a difficult situation when encountered in the clinical setting.

The impact of participating in a simulation with a standardized patient provided a majority of the participants with improved therapeutic communication. Along with improved therapeutic communication, several expressed the discovery of their personal need for improvement in situations involving perinatal loss. Practicing with a standardized patient allowed the participants to explore ways of interaction. The patient/nurse interaction includes improved communication skills, human interaction, and personal confidence.

Discussion

The purpose of this phenomenological study was to understand the experiences and perceptions of undergraduate nursing students in simulation education involving perinatal loss. The results of this research study are supported by the literature and reinforced by the theoretical and empirical frameworks that guided the research. The following sections discuss how the findings correlate to the theoretical and empirical literature, providing clarity and clarification to the research findings. Additionally, the subsequent sections will discuss how the study confirms and corroborates with previous research, how it extends the previous research, and how it contributes to nursing education.

Interpretation of Findings

The interpretation of the findings was used to answer the central research question: “What are the experiences of perinatal loss and the impact of the experience on undergraduate

student nurses?” and the two subquestions: “What are the perceptions of spiritual beliefs impacting undergraduate nursing students’ experience of perinatal loss?” and, “What are the perceptions of simulation impacting undergraduate nursing students’ experience of perinatal loss?” The summary of the thematic findings highlights the three themes and three subthemes. The themes include lack of experience/death exposure, lack of engagement and communication, and greater awareness of empathy and spirituality. The subthemes include need for increased training, therapeutic communication, and regret.

Summary of Thematic Findings

Three themes and three subthemes emerged and aided in answering the central research question and two subquestions of the research study. The three themes included lack of experience/death exposure, lack of engagement and communication, and greater awareness of empathy and spirituality. The three Subthemes included need for increased training, therapeutic communication, and regret. The findings of the research study showed participants felt there was a lack of training in death education, especially for perinatal loss. The lack of training and exposure to death led to uncertainty and discomfort during the experience. Participants expressed they were “unsure” of what to say, and also felt as though they were “intruding” during a special bonding time between the mother and infant. The uncertainty and discomfort ultimately led to a decrease in communication and interaction with the standardized patient, leaving participants with a regret in wishing they had done more.

Participants expressed gratitude for the experience, mentioning that the simulation experience increased their empathy and brought awareness to their actions during difficult patient care situations. Similarly, participants expressed how the experience brought to light their spirituality and how it would guide them during perinatal loss and other patient care situations.

As expressed by a majority of the participants, there is a need for increased death education to help nursing students with their thoughts, feelings, emotions, confidence, and communication style.

Theme 1: Lack of Experience and Death Exposure. The lack of experience and death exposure in nursing poses a challenge for nursing students. Nursing students caring for patients, when death is unexpected, have reported feeling, “anxious, unprepared, and helpless” (Alexander, 2019). Upon reflecting on a clinical situation, Gardenia stated, “I kind of felt a little helpless in the situation because I didn’t really know what to say or what to do. I realized how little I know about the subject.” Gardenia’s experience of feeling helpless in a situation involving perinatal loss contributes to previous research findings. The lack of clinical experiences in maternal-newborn specialty areas (Reid et al., 2020) can leave nursing students feeling stressed and helpless (Sook & Kim, 2022).

As Ockin (2021) noted, “Nursing students need the knowledge and skills to examine their feelings to prevent sadness from distracting them” (p. 750). The lack of knowledge and skills about death can lead to a feeling of frustration and unpreparedness to provide care in death situations (Edwards et al., 2020). The findings of the current study confirmed that participants felt unprepared to provide therapeutic communication and emotional care to a mother experiencing a stillbirth. Similarly, participants expressed how they felt helpless in not knowing what to say to the patient or having the knowledge and ability to do more for the patient.

Blossom stated:

It is so difficult to deal with for not only the person but also the nurse...it was disheartening to see her holding a dead baby. I didn’t know what to say or how long to give her with the baby.

Zhou et al. (2022) discussed the need for training in clinical practice to help students overcome death anxiety that may be related to their roles in caring for or handling a dead body. Lily's clinical experience with an adult patient correlates with the findings of Zhou et al.. Lily stated, "It was strange...to know he was not with us on this planet...knowing there was nothing still beating in him." The knowledge gap in death education expressed by some participants made them "freeze" during the experience in order to gather their thoughts. Jasmine mentioned hesitation in finding the next step, stating, "After I got those words, I was like, okay, what do I do now? There needs to be a more systematic assessment to provide an emotional assessment."

Several participants expressed uncertainty and hesitation regarding the next steps to take. A majority of the participants mentioned the need for increased training to help decrease the uncertainty, discomfort, and hesitation they experienced. Participants also mentioned the need for increased training to aid in their personal growth and their ability to assist patients during challenging times. Additionally, increased training through simulation was expressed.

Subtheme: Need for Increased Training. The subtheme "need for increased training" emerged, as participants expressed not being adequately taught on how to handle these situations. Although some participants mentioned that the topic of death was briefly discussed in their training, several noted it was not enough. Sage expressed the need for increased death education training, stating, "I wish I was more knowledgeable about what to do in that situation. Because I wasn't experienced enough, I felt like I wasn't able to assist her [Rachael] the best."

Participants expressed the need for increased training to help decrease their uncertainty, discomfort, and hesitation. These needs correlate with the findings of Alexander (2019), who noted that students desired increased training to decrease discomfort and uncertainty. Alexander also stressed that simulation education can prepare students for situations involving death,

helping them feel more prepared in providing care. Daisy noted, “In real life, I don’t want to walk into a room completely unprepared to not know what to do.”

The limited amount of death education training that participants expressed supports the findings of Heise et al. (2018), where only 17% of nursing students felt their curriculum prepared them to cope with the death of a patient. The overall lack of death education for nursing students leaves them unprepared to enter the workforce with a sense of confidence in their nursing knowledge and skills (Stokman et al., 2021). These previous research studies, along with the recommendations of the participants from the current study, suggest the need for increased death education in nursing curricula to help nursing students feel prepared to handle death in the clinical setting.

Theme 2: Lack of Engagement and Communication. A multitude of reasons contributed to the participants’ lack of engagement and communication with the patient. Sarikov et al., (2018) mentioned that effective communication is expected to help patients cope with loss, hopelessness, and grief when hearing bad news. Some participants were challenged in demonstrating self-efficacy skills, therapeutic communication and interaction related to their uncertainty, discomfort, and lack of training in perinatal loss situations. The theory of self-efficacy postulates people will attempt things they believe they can do and avoid things they believe they cannot do (Brennan, 2022). The findings of this research study correlate with Brennan’s findings, in that a majority of participants refrained from communicating with the patient for fear of saying the wrong thing. As expressed by Blossom, “I didn’t want to say anything wrong. I wanted to find the right words to say without saying anything wrong.” Similar to Blossom, Gardenia mentioned, “I was nervous about my wording and I wanted to sound like I cared for her, but I didn’t want to sound insensitive.”

The lack of communication and engagement stemmed from uncertainty and discomfort, resulting in a challenge to provide therapeutic communication. Communication, whether verbal or nonverbal, posed a challenge for the participants to effectively interact with Rachael. Although the hesitation in communication led to silence, it provided therapeutic communication through active listening. The participants expressed their difficulty in communicating throughout the experience.

Subtheme: Therapeutic Communication. Therapeutic communication, verbal and/or nonverbal, was a challenge for the participants. As participants expressed the challenges in verbal communication, many avoided therapeutic communication measures such as touch and sitting to communicate longer with the patient due to uncertainty and lack of training. Supported by Amaryllis' statement, "It's one thing to talk about it [therapeutic communication], and it's another thing to have the simulation where you're interacting with someone grieving." Similar to Amaryllis, Jasmine stated, "You talk about therapeutic communication and all, but when it's right there in front of you, you're kind of taken aback like, how do I react to this?"

Therapeutic communication was challenging for participants, as they had not experienced the situation or training before. Along with the lack of training for therapeutic communication in situations involving death, the uncertainty and discomfort of the situation posed the greatest challenge for participants in providing therapeutic communication. Ultimately, the lack of interaction during the experience led many participants to feel regret in not doing more.

Subtheme: Regret. Several participants expressed a sense of regret in missing the opportunity to provide better emotional support for the patient. As mentioned previously, the missed opportunity stemmed from uncertainty and discomfort during the situation. Much of the regret participants expressed was the lack of communication and interaction with the

standardized patient. Jasmine expressed, “I could have done so much more for her emotionally. I was going to ask if she wanted one of us to wait with her in so she wasn’t alone in the room...I wish I offered that”. Similar to Jasmine, Gardenia wished she had taken a seat with the patient and communicated with her more, showing the patient that she was attuned to her needs, stating, “I wish I stayed in the room or even taken a seat with her and talked to her more about how she was feeling. I wish I had said more comforting things.”

Overall, participants regretted not doing more for the standardized patient. This included providing greater emotional care through communication and interaction. The experience led participants to feel regret afterwards, yet they gained a greater awareness of empathy and spirituality.

Theme 3: Greater Awareness of Empathy and Spirituality. Abdel Razeq and Al-Gamal (2018) discovered that the challenges immediately surrounding the time of a loss can be the most critical, thus emphasizing the importance for healthcare professionals to appreciate and recognize the devastating experience and provide quality sympathetic bereavement care to the mother and family. As supported in the literature, Helps et al. (2023) identified that compassionate bereavement care is essential for parents’ needs.

Similar to increased awareness of empathy, spirituality plays a vital role during these challenging life and death situations. Murgia et al. (2020) noted spirituality is a vital force to help individuals overcome crises and give meaning to life and death. The findings of the current aligned with Murgia’s et al. findings, confirming the participants developed a greater awareness of empathy and spirituality. Individuals with strong religious faith, such as Amaryllis, found comfort in their belief system in helping them provide care to a mother experiencing a perinatal loss as well as for other difficult situations healthcare providers can experience in the clinical

setting. Amaryllis stated, “For me, it’s comforting to have religion as a caregiver, especially with what we see in the hospital and in helping a mother through perinatal loss.”

Few participants expressed their increased awareness of spirituality, yet a majority of the participants expressed their increased awareness of empathy. Blossom’s experience provided greater awareness of empathy for not only patients experiencing perinatal loss, but for all patients. Blossom stated:

It’s awful to see someone lose their baby. It’s difficult to deal with, for not only the person, but also the nurse. My heart goes out to people that go through this, and my empathy for people has grown. Respect every patient that walks in the hospital because you never really know what someone’s going through. That sensitivity to all patients is something I will always have now.

The thematic findings of this study revealed the lack of experience/death exposure, lack of engagement and communication, and the greater awareness of empathy and spirituality. These three themes were supported by the subthemes of the need for increased training, therapeutic communication, and regret. These findings support previous studies that expressed the need for increased death education to improve nursing students’ confidence and comfort in handling death situations.

Implications for Policy and Practice

The findings of the study suggest implications for nursing instructors and educators, as well as recommendations for future policy and practice that nursing program administrators should implement for future undergraduate nursing students.

Implications for Policy

Based on the rich data and insights gained from the participants' lived experiences during simulation education involving perinatal loss, an incorporation or increase in death education in the nursing curriculum was found to be a major implication. There has been a longstanding gap in theory and clinical practice on death and dying in nursing curricula (Hillier et al., 2021). Currently, 41% of nursing students in the nation report being present at a patient's death, yet only 17% of nursing students felt their nursing curriculum prepared them to cope with death (Heise et al., 2018). The lack of nursing curricula adequately training nursing students to handle and cope with death highlights the need for nursing program administrators to establish policies to address this gap.

The participants of this study provided insight into the lack of education, preparation, and knowledge regarding communication and patient care in situations involving death. The lack of knowledge was specifically expressed for perinatal loss. Gardenia stated:

I realized how little I know about the subject and I never really thought about someone's emotional and mental state.... I've never learned about it and I feel that's something that we should also learn about. I feel like it's [perinatal loss] is overlooked. In topics like this, we don't really focus on it and we just have a broad subject like communicate with your patients and they [instructors] don't really teach us how to.

Gardenia was not alone in her opinions, as Jasmine shared the same thoughts noting, "I feel like if I was taught or given some guidance, I would have had a better representation of what to say in that moment."

Institutions should implement a policy regarding simulation death education. Simulation death education for perinatal loss can improve several factors, including improved death

awareness, patient engagement, communication, nursing students' confidence, and empathy. Perinatal loss education through simulation can provide nursing students with the practice needed to emotionally work through a challenging situation. Simulation can also enhance confidence and the ability to provide better physical and emotional patient care.

Implications for Practice

This study provides practical implications for instructors and educators who work with undergraduate nursing students. The practical implications provide insight into the factors of simulation education, specifically HFS with a standardized patient. These implications show the benefits in applying simulation in death education. Evidence has identified HFS as an effective teaching strategy to translate theory into practice, and facilitates better development in knowledge, skills, and self-confidence to deal more effectively when caring for patients (Labrague et al., 2019).

The use of standardized patients provides an effective way for students to develop their communication and clinical skills (Kucukkelepce et al., 2020), and increases nursing students' confidence and positive attitude in caring for the dying patient and their families (Byrne et al., 2020). Marigold expressed her experience with a standardized patient to be beneficial, stating:

I think they [instructors] should do simulations like these for students, just because we don't really know what to say and how to act sometimes around mothers that just lost their babies. Now that I've been through the simulation, it shows how sad the situation can be and how hard it is.

Similar to Marigold, Tulip noted:

This helped my perception and made me more educated on how to go through it again in a real life clinical setting. You [students] don't get much experience with that [perinatal

loss], and with simulation, you see their [patients] emotions and how you care for it without doing any harm.

This study highlights the need for further death education in undergraduate nursing education. By understanding the experiences of undergraduate student nurses in simulation education involving perinatal loss, instructors and educators can see the benefits of death education through simulation in order to help nursing students work through challenging situations. The importance of exposing student nurses to situations they may encounter in the clinical setting provides them with awareness of patient needs and their own needs in handling challenging situations.

Theoretical and Empirical Implications

The purpose of this hermeneutic phenomenological study was to identify the perceptions of the lived experiences of undergraduate student nurses in simulation education involving perinatal loss. The theoretical and empirical implications will be discussed in this section. Undergraduate student nurses shared their lived experiences of simulation education involving perinatal loss. The findings from the research study build on Malcolm Knowles' Theory of Andragogy and NLN Jeffries Simulation Theory.

Theoretical Framework

The two theoretical frameworks utilized in this study provided insight into the contributing factors for undergraduate nursing students experiencing a perinatal loss through simulation education. Evaluating the findings through the lens of both theoretical frameworks allowed for better appreciation of the experiences of undergraduate nursing students in a simulation involving perinatal loss. These frameworks provided a vital foundation for the research study. Along with providing vital foundation, the frameworks guided the research study.

Malcolm Knowles' theory of andragogy focuses on the science of adult learning, and addresses the need for adults to experience situational learning activities through problem-centered situations relevant to the job (New England Institute of Technology, 2021). Knowles' central focus was to change the field of education in hopes that andragogy could add coherence to the practice of adult education (St. Clair & Kapplinger, 2021). The application of Knowles' theory allowed for the participants to experience a learning problem-centered activity relevant to their future career as nurses. The researcher acknowledges not all participants may encounter a real-life situation of perinatal loss in their practice area; however, the majority of nurses unfortunately experience death throughout their nursing careers.

NLN Jeffries simulation theory emphasizes learner-centered education, which provides students with a safe environment to learn (Stephen et al., 2020) and promotes active learning and self-confidence (Khasawneh et al., 2021). The experiences captured by the participants demonstrated incorporation of this theory with a safe simulation environment allowing participants to interact with a standardized patient and practice communication through human interaction. The participants in this study provided insight into how the NLN Jeffries simulation theory provides an environment of exposure to patient situations without doing harm. This study incorporated simulation providing students a learning environment where they had the opportunity to be an active participant. National guidelines recommend substitution of up to 50% of in-person clinical time be provided through simulation (Dolan et al., 2021) to allow for students to critically think, communicate effectively, and enhance their ethical reasoning, decision-making skills, and cultural competencies (Labrague et al., 2019). Similarly, simulation aids in safety, communication, and skill acquisition to increase confidence and self-efficacy (Edwards et al., 2022).

The theoretical framework guiding this study aided in providing insight into undergraduate nursing students' needs for education involving perinatal loss. Based on the findings of this study, there are both theoretical and empirical implications. These implications are described to help improve death education, specifically perinatal loss, in undergraduate nursing education.

Theoretical Implications

Conducting this study provided several theoretical implications for simulation education with undergraduate student nurses. The study provides evidence that the learning experience of simulation with standardized patients facilitates undergraduate nursing students' compassionate and competent caring behavior, allowing students to be mindfully present in patient encounters (Martensson et al., 2022). As noted by Azalea, "There are more emotions now attached to it [perinatal loss]...especially from doing the simulation rather than just reading it in the textbook." Similarly, Jasmine expressed:

The simulation addressed the emotional support that a mother is going to need after the fact. I think with other assessments we take vitals and make our patient stable, but in this situation we were more concerned about her emotional state, which differentiates from any other simulation in taking care of patients...it gives you a better perspective of patient care and quality.

This study underscored the importance of a standardized patient simulation. These findings correlated with the findings of Sook and Kim (2022), who suggested that limited instruction in perinatal loss education was partly due to the situation being an interactive practice rather than a situation for solely providing health information or teaching nursing skills. Iris stated:

It [simulation] was more emotional than I was expecting. A lot of times, nurses try to step away from it [emotions], but when you're dealing with death it's really hard to separate how we are feeling. The hardest part is coming up with responses. Dealing with death, you might freeze up because you don't want to say anything wrong, and I feel like I need to learn more [training] on how to comfort them [parents].

Similarly, HFS is one of the most effective methods for improving students' experiences. These simulation experiences allow students to analyze themselves and increase their confidence in handling similar situations in the clinical setting (Labrague et al., 2019). As Tulip stated:

We don't have much experience with emotional interventions...I think this [simulation] should be something all students go through because we don't get to see this in the clinical setting. In a simulation, with a real person, you get more of their emotions and how you care for them without doing any harm.

As the research findings provide theoretical implications, closely related empirical implications also manifested from the participants' experiences. These implications suggest improvements in nursing death education, specifically perinatal loss.

Empirical Implications

Many of the findings in this study support the empirical work of simulation for death education, specifically perinatal loss. The study revealed the participants felt the need for more in-depth training regarding perinatal loss. Participants expressed their lack of training in this area affected their ability to interact with the patient. Lily stated:

I think that they [students] should all go through a simulation like this, because you never know how you're going to reach. This simulation has given me light on how to use more therapeutic communication and how I would react in an unexpected and terrible situation.

Similarly, Gardenia mentioned:

After witnessing it [perinatal loss] in simulation, I have a lot to learn. It's [perinatal loss] one of those things that I didn't really think about, then I was in sim [simulation] and I had a lot of questions as I was doing things... I didn't know what I should be doing or saying. Professors should go further into nursing interventions that aren't medical. I may understand the medical terminology and medical assessments, but human-to-human interactions like communication is just as important as understanding medically what's going on.

Along with the need for increased training, participants expressed the need for simulation. The need for training, specifically with a standardized patient, was expressed to enforce the practice of therapeutic communication and human interaction. Blossom emphasized:

Instructors should cover more about losses because we just talk through PowerPoints, and you never really get to understand exactly what that person is going through. With people, it allows a perspective of someone that has actually experienced it and you can actually feel how they felt.

The study supported the literature showing the benefits of standardized patients. Use of standardized patients in nursing education provides an effective way for students to develop their cognitive, communication, and clinical skills (Kucukkelepce et al., 2020). Similarly, participants expressed they felt unprepared to handle a perinatal loss situation. Daisy stated:

I felt very unprepared because I didn't know what to do, and I had never dealt with that before in a clinical setting or first-hand experience. It was very hard for me, and almost uncomfortable, to try to figure out what would be appropriate or not in that situation. I think it [perinatal loss] is more common than what we might see in our clinical rotation at

school. It [perinatal loss] should be touched more on in class to practice, because in real-life, I don't want to walk into a room completely unprepared to not know what to do.

Participants' responses support the literature showing nursing students feel unprepared to deal with issues surrounding communication with dying patients, family members, or members of the healthcare team (Heise et al., 2018). The literature showed perinatal bereavement education can be effective in improving student knowledge, and awareness of the emotional needs of bereaved families (Ratislavova et al., 2019). The findings of the current study indicate that participants wish they were taught more about perinatal loss and had the human interaction to explore the emotions they may feel and actions they may take when confronted with a similar situation in the clinical setting. Participants implied the emotional awareness and well-being of the patient is just as important as the physical care one receives include a quote here. As this study found, death is a difficult topic to discuss, and it is equally vital in the training nursing students receive in providing patient care.

Limitations and Delimitations

This study, which explored the experiences of undergraduate student nurses in simulation education involving perinatal loss, included limitations and delimitations. Limitations in qualitative research concern the potential weaknesses that are usually out of the researcher's control, and are closely associated with the research design (Theofanidis & Fountouki, 2018). Delimitations are limitations consciously set by the researcher that are mainly concerned with the study's theoretical background, objectives, research questions, and study sample (Theofanidis & Fountouki, 2018).

Limitations

Limitations of the research study included the individuals who consented to participate in the study. The participant pool included male and female undergraduate students in their junior and senior levels. This limitation stemmed from the participants' experience with maternal health course training. The verbiage and experiences of the simulation would play a difficult factor for those student nurses who have not experienced a course in maternal health care. This limitation affected the study in understanding one's previous understanding and/or exposure to perinatal loss.

The gender of the 13 participants and geographical location of the study are also limitations of the study. Participants were selected from one private university in the southeastern United States. Although the research study was presented to both male and females, the percentage of male nurses in the nursing program is much less than the percentage of enrolled females. The likelihood of recruiting an equal number of male and female undergraduate nursing students from one private university was highly unlikely. This limitation affected the research study in understanding the experiences of male student nurses and their experience with perinatal loss. Similarly, the geographical location could possibly present different findings if there are increased experiences with perinatal losses in different regions of the world. Due to time constraints with one standardized patient, only one geographical location was able to provide experiences involving perinatal loss education.

The performance of the participants was an uncontrollable variable. Although participants had the knowledge and understanding of a perinatal loss simulation with a standardized patient, the depth of knowledge of perinatal losses varied between participants based on their degree of training and clinical experience.

Lastly, the findings of this study cannot be generalized, as it only reflects the experiences of the study participants in one undergraduate nursing program who have little to no experience and/or exposure to death. Understanding different nursing program levels could have different experiences based on the amount of knowledge and/or experience. Similarly, individuals in different regions of the world could have a different experience than the participants in the southeastern U.S.

Delimitations

Five delimitations in the research study included: a). allowing only undergraduate nursing students from one private university to participate in the study; b). the geographical location of the private university in the southeastern U.S.; c). the small sample size; d). open to individuals 18 years of age or older; and e). any history of pregnancy. These delimitations were conscious exclusionary decisions made during the development of the research plan.

Allowing participants from one private university to participate in the study resulted from typical purposeful sampling from a university at which the researcher is affiliated. This delimitation affected the overall study in that the sampling pool was limited in size. A larger demographic in age, gender, religion, and race of individuals could provide richer findings from individuals at different undergraduate nursing school across the U.S. Similarly, individuals from other countries could provide rich data to support the research findings.

In conjunction with the sampling method, only undergraduate nursing students were recruited because it is possible nursing students enrolled in nursing programs at a masters or doctoral level would have been more likely to already have experienced their own personal patient deaths in the clinical setting and found ways to cope with these experiences.

The next delimitation was the small sample size. There were 13 undergraduate student nurses sampled for this study that had completed or were currently enrolled in their Maternal-Child Health rotation. The sample size was made to achieve a sample that met the study's criteria. Although the sample size met the study's criteria, more participants could provide richer data and/or experiences from a wider range of individuals. Similarly, with a larger sample size, it is possible more male nursing students could have participated and provided their experiences of perinatal loss education.

The age of the individuals coincided with the theoretical framework Knowles' theory of andragogy, which encompasses adult learners. The adult learners support Knowles' theory in adults taking action in their learning. This delimitation affected the study, since 12 of the 13 participants fell into the age range between 18 and 22 years. Older undergraduate nursing students may have provided different experiences with perinatal loss education.

The final delimitation included the exclusion of individuals who had experienced a perinatal loss or knew someone near to them who had experienced a loss or had a history of pregnancy. This delimitation was set to avoid deeper emotional triggers and the reliving of traumatic past experiences. This delimitation was in place to protect an emotionally vulnerable population. This delimitation also affected the research study in understanding the lived experiences of undergraduate student nurses who had a history of pregnancy and/or loss. Richer data could be obtained through understanding the lived experiences of undergraduate student nurses and personal and educational experiences.

Recommendations for Future Research

Future research is necessary to determine if other undergraduate nursing students enrolled in other universities located in other geographical areas have the same experiences as the

participant population. Additional research would provide beneficial information regarding death education for healthcare providers, as well as individuals outside of the undergraduate student nurse population who may encounter death in their professional career. Furthermore, this study could be replicated with a larger sample size inclusive of male participants to explore different perceptions. Future research could evaluate the effect of different simulations aside from the use of a standardized patient on death education and its benefits toward improved communication skills and human interaction.

The participants in this study felt the simulation provided them with several beneficial factors. Among these benefits, students expressed improvement in enhanced communication skills and greater empathy awareness. The improvement in these skills is crucial for times when they will encounter similar situations in the clinical setting. Amaryllis discussed how the experience would impact her nursing practice:

A big thing is confidence. The more you practice, the better you'll be able to help the next patient. Practicing in sim [simulation] will never give you something that you necessarily become incredibly proficient in, but I will be able to offer better support and see where I can improve in making an impact for the patient.

Dahlia expressed, "This experience made me more empathetic and aware of what people experience." Similar to Amaryllis and Dahlia, Gardenia expressed how the simulation experience contributed to her knowledge and growth, stating:

The thing that separates nurses from doctors is doctors are medical and diagnose patients, whereas a lot of nursing is providing care to the patient and showing empathy. If I never did this [experience], and I was thrown into it after graduating from nursing school, I would have no idea how to talk to a patient. I think that if I ever experience this situation

again, I would know how to handle it better. I would remind myself that my main focus is to make my patient feel like she understands me and knows I'm there for her. If I ran into this situation again, I would be more relaxed and comfortable knowing that I've dealt with this kind of thing before.

Educators who are in the field of nursing education could benefit from integrating death education into their curriculum to prepare nursing students for death in the clinical setting. Although this study was conducted in the southeastern U.S., replicating this study in another region could be explored with other participants to compare the findings. Additionally, a correlational study with nurses who had death education in their undergraduate nursing program in comparison to those who did not could yield valuable information in nursing education. Lastly, future research with nurses who had death education in their undergraduate program could be performed to evaluate the effectiveness of the death education and how it impacted their first clinical death experience.

Understanding the experiences of the participants in this research study contributes to the literature supporting death education, specifically perinatal loss, in undergraduate nursing. Further research from the recommendations in this study can provide valuable information for undergraduate nursing education. Continuation of research similar to this study may provide benefits across the healthcare continuum, which may be extremely beneficial in situations where unexpected or traumatic patient death is encountered.

Conclusion

The purpose of this qualitative hermeneutic phenomenological research study was to provide valuable insights into the lived experiences of undergraduate student nurses in simulation education involving perinatal loss. The findings of this study provided insight into the

lived experiences of undergraduate student nurses in simulation education involving perinatal loss. Following the group simulation with a standardized patient, individual interviews and researcher observations revealed a lack of experience to death exposure, a lack of engagement and communication, and a greater awareness of empathy and spirituality. In addition to the main themes developed, the findings revealed a need for increased training, improved therapeutic communication, and participant regret.

Ultimately, the lack of experience/death exposure resulted from the participants' uncertainty and discomfort in what they felt would be appropriate communication and actions. The lack of experience led to a lack of engagement and communication between the participants and the standardized patient. As a result of the lack in engagement and communication, participants expressed a need for increased training to aid in knowledge and personal growth. In addition to the expressed need for training, participants expressed a sense of regret for not having done more for the patient.

Although the missed opportunity of engaging and communicating with the standardized patient left participants with a sense of regret, the majority felt the experience provided them with greater empathy, confidence, and communication skills for future clinical situations similar to the simulation experience. The benefits from this research study correlate with previous research in recommending advancement of death education, specifically perinatal loss, in undergraduate nursing education. The integration of in-depth perinatal loss education in nursing curricula can provide students with improved communication skills and self-confidence in handling challenging patient-care situations revolving death.

Furthermore, the need for further research and interventions to support undergraduate student nurses in preparing them for death scenarios in the clinical setting must be explored.

Incorporating perinatal loss through simulation with a standardized patient allows student nurses to practice communication and human interaction during death situations. Practicing human interaction and communication through simulation helps increase self-confidence and professional skills. The findings of this study show the need for increased perinatal loss training and the effects of providing care during patient death situations. These findings provide information regarding the need for death education for undergraduate student nurses, current nurses, and other professional fields where unexpected or traumatic patient death is encountered. Similarly, death education research must be explored across the healthcare continuum, where unexpected or traumatic patient death is encountered.

Figure 1***Baby Josue***

Born Asleep, March 7, 2018

When you asked me if I wanted pictures, I thought ‘what I want is my son alive.’ Now I am beyond grateful that you took pictures because those are the only pictures I have of him. If I didn’t have those pictures, I fear I would have forgotten what he looked like. On that day, my mind was blank, wondering ‘Why did this happen?’ Half of me moved on, and the other half of me was destroyed. Though time has passed, the pain lingers. I’m like a sad clown...happy on the outside and sad on the inside. There are moms and dads who go through this every day, and every day I pray for them. I pray for God to give them the strength to keep moving forward because I know, on the day Josue died, people who I didn’t know were probably praying for me.

To know that my situation touched you the way it did, and led you on this journey, makes me happy to know that he didn’t die in vain. – *Mother of Josue*

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APPENDICES

Appendix A

Recruitment Letter

Dear Potential Participant,

As a doctoral candidate in the School of Nursing Education at Liberty University, I am conducting research to better understand the lived experiences of student nurses during simulation of perinatal loss. The purpose of my research is to understand the perceptions and experiences of undergraduate nursing students in simulation education involving perinatal loss, specifically that of a stillbirth or intrauterine fetal demise (IUFD), and I am writing to invite you to join my study.

Participants must be 18 years of age or older, enrolled in the baccalaureate nursing program at the University of xxxx, and currently enrolled or have completed the maternal-child care rotation. Participants must not have previously been pregnant, have children, and/or have personally experienced or had someone near to them experience a fetal demise/stillbirth/miscarriage. Participants will be asked to participate in a simulation with two other participants and a standardized patient, attend a prebrief and post-simulation debrief, and participate in a one-on-one-audio-recorded Zoom interview within 48 hours after completing the simulation. Real-time member checks, in which the researcher will immediately share their understanding of the comments and key concepts, will be conducted after the interview for participant confirmation that the findings are adequately interpreted. It should take approximately one hour and forty-five minutes to complete the procedures listed. Names and other identifying information will be requested as part of this study, but participant identities will not be disclosed. Pseudonyms will be utilized in reporting data findings.

To participate, please scan the QR code below to access the consent, screening questionnaire, and counseling services information. After you have been determined to be eligible, you will be shown the consent form. The consent form contains additional information about my research, and you will be asked to type your name on the form if you choose to participate and provide your email address so I can contact you with information regarding the simulation and the Zoom interview.

If you choose to participate, you will be contacted for participation and given a copy of the signed consent upon arrival to the simulation lab at the University of xxxx. Participants who complete the study will receive a \$25 gift card. Those who voluntarily withdraw from the study will receive a \$5 gift card.

Sincerely,
Paloma Peña
Doctoral Candidate
xxxx
Adjunct Instructor with University of xxxx



Appendix B

Consent Form

Title of the Project: The Lived Experiences of Student Nurses During Simulation of Perinatal Loss

Principal Investigator: Paloma Alejandra Peña, Doctoral Candidate, Liberty University
Paloma Alejandra Peña, Adjunct Instructor, University of xxxx

Co-investigator: Dr. Jane Langemeier, Liberty University

Invitation to be Part of a Research Study

You are invited to participate in a research study. To participate, you must be 18 years of age or older, enrolled in the baccalaureate nursing program at the University of xxxx, and currently in or have completed your maternal-child care rotation. Additionally, you must not have previously been pregnant, have children, and/or have personally experienced or had someone near to you experience a fetal demise/stillbirth/miscarriage. Taking part in this research project is voluntary.

Please take time to read this entire form and ask questions before deciding whether to take part in this research.

What is the study about and why is it being done?

The purpose of the study is to explore the lived experiences of undergraduate nursing students in simulation of perinatal loss.

What will happen if you take part in this study?

If you agree to be in this study, I will ask you to do the following:

1. Participate in an in-person prebrief, lasting no longer than 10 minutes.
2. Participate in an in-person, 20-minute simulation, with 2 other participants and a standardized patient.
3. Participate in a quick post-simulation debrief, no longer than five minutes.
4. Participate in an audio-recorded Zoom interview, within 48 hours of the simulation, that will take no more than 1 hour.
5. Participate in real-time member checks following the interview, which will take no longer than 10 minutes.

How could you or others benefit from this study?

Participants should not expect to receive a direct benefit from taking part in this study.

Benefits to society include possible improved education preparation for future nursing students and nurses in providing care in situations involving death and dying.

What risks might you experience from being in this study?

Due to the sensitive nature of the study, the expected risks from participating include psychological and emotional distress. The research involves simulation, discussion, and questions of sensitive nature that can pose psychological or emotional risks (e.g. fear, stress, guilt, triggering of past emotions, etc.). These risks are similar to risks students may encounter during a typical obstetric clinical rotation. To minimize these risks, the researcher will strictly follow exclusion criteria and counseling education.

Referral information for counseling services will be provided to student respondents in the initial QR code link for the research study. Additionally, when students arrive at the simulation lab on the day of the study, a handout for referral information will be given, in case one decides to not continue with the study.

Along with the simulation handout and discussion during prebrief, the researcher will again refer participants to the handout during debrief, and discuss the counseling services available to participants should they experience any psychological or emotional risks.

How will personal information be protected?

- The records of this study will be kept confidential.
- Published reports will not include any information that will make it possible to identify a subject.
- The identifiable information will not be made available to other researchers.
- Research records will be stored securely in a password-locked computer, and only the researcher and her dissertation chair will have access to the records.
- Participant responses will be kept confidential through the use of pseudonyms, e.g. Participant Rose, during the transcribing of interviews.
- Audio recordings of the interview will only be available to the researcher.
- One-on-one Zoom interviews will be conducted in a location where the participant feels safe and comfortable.
- Data will be stored on a password-locked computer and password-locked file. After five years, all electronic records will be deleted and any hardcopy records will be shredded.
- Audio recordings will be used and uploaded to transcribing software. All data processed through the computer software is fully encrypted, managed, and stored by SOC-compliant data center providers and secured against unauthorized access. Recordings will be stored on a password locked computer and password-locked file for five years. The researcher and members of her committee will have access to these recordings.
- Personal identifiers from the collected data will be removed and the data used for future research without additional consent from you.
- No follow-up data is required, and no attempts will be made to participants once the study has ended.

How will you be compensated for being part of the study?

Participants will be compensated for participating in this study. At the conclusion of the interview, participants will receive a \$25 visa gift card via email. Any participant who chooses to withdraw from the study after beginning but before completing all study procedures will receive a \$5 gift card.

Is the researcher in a position of authority over participants, or does the researcher have a financial conflict of interest?

The researcher serves as an adjunct instructor at the University of xxxx. This research is solely being conducted as the researcher's role as a doctoral candidate at Liberty University, and not as an adjunct instructor from the University of xxxx. To limit potential or perceived conflicts, the researcher will ensure data will not be used in any way or form that affects the students' academic standing. Participation in the study is voluntary and not related to curriculum or program requirements. The identity of the participants will be confidential and protected through the use of pseudonym names. No action will be taken against an individual based on his or her decision to participate or not participate in this study.

Is study participation voluntary?

Participating in this project is voluntary, and refusal to participate or withdrawing from participation at any time during the project will involve no penalty or loss of benefits to which the subject is otherwise entitled. The principal investigator may terminate participation of a subject or the project entirely without regard to the subject's consent. In the event of questions or difficulties of any kind during or following participation, the subject may contact the Principal Investigator as indicated below.

Your decision whether to participate will not affect academic standing, or your current or future relations with Liberty University or the University of xxxx. If you decide to participate, you are free to not answer any question or withdraw at any time without affecting those relationships.

What should you do if you decide to withdraw from the study?

If you choose to withdraw from the study, please contact the researcher at the email address/phone number included in the next paragraph. Should you choose to withdraw, data collected from you will be destroyed immediately and will not be included in this study.

Whom do you contact if you have questions or concerns about the study?

The researcher conducting this study is Paloma Peña. You may ask any questions you have now. If you have questions later, **you are encouraged** to contact her at xxxx or by email at p@liberty.edu and/or ppena@xxxx.edu. You may also contact the researcher's faculty sponsor, Dr. Jane Langemeier, at jl@liberty.edu.

Whom do you contact if you have questions about your rights as a research participant?

If you have any questions or concerns regarding this study and would like to talk to someone other than the researcher, **you are encouraged** to contact the IRB. Liberty University's physical address is Institutional Review Board, 1971 University Blvd., Green Hall Ste. 2845, Lynchburg, VA, 24515; our phone number is 434-592-5530, and our email address is irb@liberty.edu. The University of xxxx physical address is Institutional Review Board, xxxx; the phone number is xxxx and the email address is irb@xxxx.edu

Disclaimer: The Institutional Review Board (IRB) is tasked with ensuring that human subjects research will be conducted in an ethical manner as defined and required by federal regulations. The topics covered and viewpoints expressed or alluded to by student and faculty researchers are those of the researchers and do not necessarily reflect the official policies or positions of Liberty University.

THIS RESEARCH PROJECT HAS BEEN APPROVED BY THE INSTITUTIONAL REVIEW BOARD FOR THE PROTECTION OF HUMAN SUBJECTS OF THE UNIVERSITY OF xxxx (xxxx)

You agree to participate in this study by signing this document. Make sure you understand what the study is about before you sign. You will be given a copy of this document for your records. The researcher[s] will keep a copy with the study records. If you have any questions about the study after you sign this document, you can contact the study team using the information provided above.

I have read and understood the above information. I have asked questions and have received answers. I consent to participate in the study.

The researcher has my permission to audio-record me as part of my participation in this study.

Printed Subject Name

Signature & Date

Appendix C

Screening Questions

1. Select your age
a) Under 18 b) 18-22 c) 23-27 d) 28-32 e) 33-38 f) 39+
2. Are you enrolled in the baccalaureate-nursing program at the University of xxxx?
a) Yes b) No
3. Are you currently enrolled in or have completed the Maternal-Child Health?
a) Yes b) No
4. Are you currently pregnant or have a history of pregnancy?
a) Yes b) No
5. Select your gender
a) Male b) Female c) Transgender d) Non-binary e) Other
6. Have you completed at least 1 semester of hospital clinicals?
a) Yes b) No
7. Do you practice religion?
a) Yes b) No
If yes, please specify:
8. Have you or someone near you experienced a fetal demise/stillbirth/miscarriage?
a) Yes b) No
If yes, please explain:
9. Do you have any children?
a) Yes b) No
10. Have you participated in a simulation before?
a) Yes b) No
If yes, please explain:
11. Are you comfortable participating in a simulation with 2 other students and a standardized patient?
a) Yes b) No

Appendix D

Participant Task Sheet

You are the dayshift nurse, coming on shift to care for a patient who experienced an intrauterine fetal demise (IUFD). Your tasks will be provided on this sheet below.

History: Mrs. A. is a 32-year-old female, 40-week primigravida, G1P1000. She presented to triage last night at 2130 complaining of decreased fetal movement. When the night nurse applied the ultrasound monitor, no heartbeat was found. The doctor confirmed, via ultrasound machine, that no heartbeat was detected. Mrs. A. stayed for induction and delivered an IUFD at 0650. You are now coming on to shift at 0700. Along with her morning vitals, use the BUBBLE-HE acronym to conduct a postpartum assessment.

Roles

Primary nurse: conduct breasts, uterus, bladder, bowels, and emotions assessment

Safety nurse: conduct lochia, episiotomy/perineum, hemorrhoids, and emotions assessment

Charge nurse: conduct vitals and emotion assessment

Temperature:

Heart Rate:

Blood Pressure:

Pulse Ox:

Pain Level:

Breasts	Generally, breasts and nipples are assessed for breastfeeding mothers. Explain to the mother she will still have milk come in and options can be discussed, when she is ready, on how to handle it.
Uterus	Simulate assessing the uterus. Mother is firm, midline, and at umbilicus.
Bladder	The bladder is not distended and she does not have the urge to urinate.
Bowels	Offer the mother liquids. Stool softeners will be offered with her regular medications.
Lochia	<u>Check for lochia and chart findings:</u> <hr/> <hr/>
Episiotomy and Perineum	Perineum is intact.
Hemorrhoids	No hemorrhoids present.

Emotions	Evaluate and chart findings: <hr/> <hr/>
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Appendix E

Standardized Patient Script

Date Scheduled: October 2nd, 2023

Attire: Shorts and sports bra. A gown will be provided.

Appearance: Appears fatigued, depressed, tearful

Interaction: Sad, depressed flat responses, tearful, looking at the baby

Initial Presentation: Patient lying on the bed; upright in bed. Holding a baby wrapped in blanket in patient's arms

Setting: Inpatient room, hospital bed

Equipment in Room: IV pump with fluids infusing, hospital gown, peripad, infant manikin wrapped in receiving blanket, isolette at bedside

Student Level/Semester: Junior and Senior Level Students

PATIENT NAME: Mrs. Racheal Adams

Chief Complaint: "I delivered a baby"

HISTORY: *Student will ask you questions.*

Date of Birth: March 19, 1997

Age: 26 years

Medications: prenatal vitamins

Allergies: None

Past Medical History: 40 weeks pregnant (full term); first pregnancy

IMMUNIZATIONS: UTD

SURGERY: None

Question	Patient Response
Onset: Came to triage/ hospital last night at (9:30pm)	"The baby wasn't moving". "She hadn't moved for maybe a day? And I called my OB doctor and she said to come to the hospital." "When I got to triage, they couldn't find a heartbeat"... cry or with a crack if you say this.
Breasts No physical exam will be conducted. Students are to explain your milk	Patient Response: "What am I supposed to do with my milk? I don't even have a baby to feed anymore."

supply will still be coming in.	
Uterus Students are to simulate a fundal check. (Feel you abdomen)	A card will be provided. You have no pain or discomfort
Bladder If students ask if you need to urinate	"I don't feel like I have to right now"
Bowel Students should/might offer liquids.	<i>"I'm not really thirsty"</i>
Lochia (The students will check for Bleeding) Students will check lochia between the sheets.	A red-painted pad will be placed on the bed.
Perineum If students ask if you tore or got an episiotomy	"No"
Hemorrhoids If students ask if you have hemorrhoids	<i>"I'm not sure"</i>
Emotions If student asks how you're feeling	<i>"I don't really know right now. I feel so numb. I just keep thinking if I had come in a day earlier, she would still be alive. I wouldn't have to be going through this. Now I have to plan a funeral. (Crying) And her crib is all set up, her room is decorated...what am I going to do with all her clothes?"</i>

Timeline

- Generally healthy, no past medical history
- 40 weeks pregnant (full term)
- Last night the baby had no movement since yesterday, something felt wrong
- You called the Dr; came to hospital at 9:30pm.
- Induced just after midnight
- Delivered the baby 15 minutes ago.

PHYSICAL EXAMINATION: *Student will examine you.*

(Students may listen to your heart & lung sounds with a stethoscope and may touch/palpate your abdomen, groin, & back)

VITAL SIGNS: BP 122/76, P 88, RR 16, T 98.8, Pulse Oximetry 99

GENERAL:

Mrs. Adams, a 26-year-old female who just delivered a full-term stillbirth. This was her first pregnancy, she was 40-week primigravida, G1P1000. She presented to triage last night at 9:30pm complaining of decreased fetal movement. The doctor confirmed, via ultrasound machine, that no heartbeat was detected. Mrs. Adams stayed for an induction and delivered an IUFD at 0650.

Lungs: normal breathing

Abdomen/ Uterus: normal bowel sounds, no pain, *“I’m not really thirsty”*

Bladder: no pain *“I don’t feel like I have to go right now”*

Patient Chart

Setting: Hospital Bed

PATIENT NAME: Racheal Adams

DOB: 03/19/1997

Vital signs:

BP 122/76, P 88, RR 16, T 98.8

Chief Complaint: “ I had a baby”

Nurse’s notes: Mrs. Adams, a 26-year-old female who just delivered a full term stillbirth. This was her first pregnancy, she was 40-week primigravida, G1P1000. She presented to triage last night at 2130 complaining of decreased fetal movement. The ultrasound confirmed there was no heartbeat detected. Ms. Adams stayed for an induction and delivered an IUFD at 0650.

Student’s Role: *You are the nurses seeing the patient.*

Appendix F

Debrief Contact and Counseling Form

Thank you for participating. The purpose of this study is to explore the lived experiences of student nurses during simulation of a perinatal loss. Findings of this study will be published within a year in a nursing education journal.

The researcher conducting this study is Paloma Peña. You may ask any questions you have now. If you have questions later, you are encouraged to contact me at xxxx or by email at p@liberty.edu. You may also contact my faculty sponsor, Dr. Jane Langemeier, at jl@liberty.edu.

This simulation depicts real life scenarios, which may be psychologically disturbing for individuals. If in case this simulation emotionally triggers you, please contact your on-campus counselor.

Counseling Services

Counseling services are located in the xxxx Health and Wellness Center directly behind xxxx Hall. Counseling is provided to full-time undergraduate students and all international graduate students. Domestic graduate students without an active student health insurance policy can be seen based on a fee for service.

Hours of Operation

Non-emergency sessions are by appointment only. Crisis walk-ins are available.

Fall and Spring Semesters

Monday-Friday 8:30am-5pm

Summer

Monday-Thursday 8:30am-5pm

After Hours Crisis Emergency Care

Tier One: Contact Campus Safety at xxxx for emergencies and crisis care only.

Tier Two: Call the Crisis Center at xxxx or 211 for emergencies of non-emergencies.

Appointments

To make an appointment, call xxxx

Confidentiality

CS records are strictly confidential and protected under xxxx Statute 394.4615. CS records stay at Counseling Services separate from academic records. Under state confidentiality laws, counseling records are not released without consent of the student/patient. Limits of confidentiality include life-threatening circumstances, child, elderly or mentally challenged abuse, and at times, in the event of a lawsuit. For a full explanation of confidentiality, see xxxx and search 394.xxxx.

Appendix G
Observation/Field Notes

Date:	Time:
Participant Pseudonym:	Site:
Participant Role:	
Notes:	

Appendix H

COREQ Checklist

COREQ (COnsolidated criteria for REporting Qualitative research) Checklist

A checklist of items that should be included in reports of qualitative research. You must report the page number in your manuscript where you consider each of the items listed in this checklist. If you have not included this information, either revise your manuscript accordingly before submitting or note N/A.

Topic	Item No.	Guide Questions/Description	Reported on Page No.
Domain 1: Research team and reflexivity			
<i>Personal characteristics</i>			
Interviewer/facilitator	1	Which author/s conducted the interview or focus group?	
Credentials	2	What were the researcher's credentials? E.g. PhD, MD	
Occupation	3	What was their occupation at the time of the study?	
Gender	4	Was the researcher male or female?	
Experience and training	5	What experience or training did the researcher have?	
<i>Relationship with participants</i>			
Relationship established	6	Was a relationship established prior to study commencement?	
Participant knowledge of the interviewer	7	What did the participants know about the researcher? e.g. personal goals, reasons for doing the research	
Interviewer characteristics	8	What characteristics were reported about the interviewer/facilitator? e.g. Bias, assumptions, reasons and interests in the research topic	
Domain 2: Study design			
<i>Theoretical framework</i>			
Methodological orientation and Theory	9	What methodological orientation was stated to underpin the study? e.g. grounded theory, discourse analysis, ethnography, phenomenology, content analysis	
<i>Participant selection</i>			
Sampling	10	How were participants selected? e.g. purposive, convenience, consecutive, snowball	
Method of approach	11	How were participants approached? e.g. face-to-face, telephone, mail, email	
Sample size	12	How many participants were in the study?	
Non-participation	13	How many people refused to participate or dropped out? Reasons?	
<i>Setting</i>			
Setting of data collection	14	Where was the data collected? e.g. home, clinic, workplace	
Presence of non-participants	15	Was anyone else present besides the participants and researchers?	
Description of sample	16	What are the important characteristics of the sample? e.g. demographic data, date	
<i>Data collection</i>			
Interview guide	17	Were questions, prompts, guides provided by the authors? Was it pilot tested?	
Repeat interviews	18	Were repeat interviews carried out? If yes, how many?	
Audio/visual recording	19	Did the research use audio or visual recording to collect the data?	
Field notes	20	Were field notes made during and/or after the interview or focus group?	
Duration	21	What was the duration of the interviews or focus group?	
Data saturation	22	Was data saturation discussed?	
Transcripts returned	23	Were transcripts returned to participants for comment and/or	

Topic	Item No.	Guide Questions/Description	Reported on Page No.
		correction?	
Domain 3: analysis and findings			
<i>Data analysis</i>			
Number of data coders	24	How many data coders coded the data?	
Description of the coding tree	25	Did authors provide a description of the coding tree?	
Derivation of themes	26	Were themes identified in advance or derived from the data?	
Software	27	What software, if applicable, was used to manage the data?	
Participant checking	28	Did participants provide feedback on the findings?	
<i>Reporting</i>			
Quotations presented	29	Were participant quotations presented to illustrate the themes/findings? Was each quotation identified? e.g. participant number	
Data and findings consistent	30	Was there consistency between the data presented and the findings?	
Clarity of major themes	31	Were major themes clearly presented in the findings?	
Clarity of minor themes	32	Is there a description of diverse cases or discussion of minor themes?	

Developed from: Tong A, Sainsbury P, Craig J. Consolidated criteria for reporting qualitative research (COREQ): a 32-item checklist for interviews and focus groups. *International Journal for Quality in Health Care*. 2007. Volume 19, Number 6: pp. 349 – 357

Once you have completed this checklist, please save a copy and upload it as part of your submission. DO NOT include this checklist as part of the main manuscript document. It must be uploaded as a separate file.

Appendix I

IRB Approval

Date: 7-22-2023

IRB #: IRB-FY22-23-1468

Title: The Lived Experiences of Student Nurses During Simulation of Perinatal Loss

Creation Date: 4-27-2023

End Date:

Status: Approved

Principal Investigator: Paloma Pena

Review Board: Research Ethics Office

Sponsor:

Study History

Submission Type Initial	Review Type Limited	Decision Exempt - Limited IRB
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Key Study Contacts

Member Jane Langemeier	Role Co-Principal Investigator	Contact [REDACTED]@liberty.edu
Member Paloma Pena	Role Principal Investigator	Contact P: [REDACTED]@liberty.edu
Member Paloma Pena	Role Primary Contact	Contact P: [REDACTED]@liberty.edu

Title of Proposal **The Lived Experiences of Student Nurses During Simulation of Perinatal Loss** 07/22/2023
 id. 41448797
 by Paloma Pena in IRB: Research Proposal





Original Submission 08/21/2023

Title of Proposal **The Lived Experiences of Student Nurses During Simulation of Perinatal Loss**



Principal Investigator **Paloma Pena**

Department **Nursing**

E-mail 

Role at the University of **Other**


Co-investigators (if student, must have a faculty co-investigator) **This research involves co-investigators**

Please list all co-investigators (include name, email, and role at 
Dr. Jane Langemeier, @liberty.edu

CITI Training **All investigators named above have completed CITI training**


For each investigator named above, upload a CITI completion certificate (the course must be either the one for Biomedical researchers or for Social-Behavioral-Educational Researchers; if refresher course is active, also upload original basic course)
[Citi_IRB_Training.pdf](#)
[DrLangemeier_CITI.pdf](#)

Funding **This project is being funded by a grant or some other source**

Funding source (include title of funded project if available). List any in kind donations. **Sigma Research Award**

Date project will begin (allow at least 2 weeks for the IRB to provide initial feedback on your proposal) **9/1/2023**

Date project will end **9/8/2023**

What level of review is appropriate for your proposal? **The  IRB has three levels of review: 1) Full, for research the deals with very sensitive topics, special populations, or involves risk to the participant; 2) Expedited, for research where anonymity cannot be assured, involves deception, or that involves children; and 3) Exempt, for research on normal adult participants, where the anonymity of responses is assured, and there is little risk.**

Level of Review Requested **Expedited or Full Review**

Appendix J
Site Approval

April 27, 2023

Paloma Peña, PhD (c), RN, CMSRN
Doctoral Candidate
School of Nursing Education
Liberty University
Address: xxxx

Dear Paloma Peña,

After careful review of your research proposal entitled “The Lived Experiences of Student Nurses During Simulation of Perinatal Loss”, I have decided to grant you permission to conduct your study at the University of xxxx.

Check the following boxes, as applicable:

I grant permission for Paloma Peña to contact students who are enrolled in or have completed their Maternal-Child rotation to invite them to participate in her research study.

We are requesting a copy of the results upon study completion and/or publication.

Sincerely,

Dr. xxxx xxxx, EdD, APRN, NNP-BC
Director/Chair of the Department of Nursing
The University of xxxx
Address: xxxx