#### University of New England

## **DUNE**: DigitalUNE

All Theses And Dissertations

Theses and Dissertations

11-2019

# Nurse Educators' Experiences With Integrated Learning Intervention Practice Systems And Learning Outcomes

Nikolaos S. Moraros

Follow this and additional works at: https://dune.une.edu/theses

Part of the Educational Assessment, Evaluation, and Research Commons, Educational Leadership Commons, Higher Education Commons, and the Higher Education Administration Commons

© 2019 Nikolaos S. Moraros

## NURSE EDUCATORS' EXPERIENCES WITH INTEGRATED LEARNING INTERVENTION PRACTICE SYSTEMS AND LEARNING OUTCOMES

By

Nikolaos S. Moraros

EdD (University of New England) 2019

#### A DISSERTATION

Presented to the Affiliated Faculty of

The College of Graduate and Professional Studies

At the University of New England

In Partial Fulfillment of Requirements

For the Degree of Doctor of Education

Portland & Biddeford, Maine

November 08, 2019

Copyright by Nikolaos S. Moraros 2019

## NURSE EDUCATORS' EXPERIENCES WITH INTEGRATED LEARNING INTERVENTION PRACTICE SYSTEMS AND LEARNING OUTCOMES

#### Abstract

Traditional learning interventions or remediation processes provided to underperforming students are often reactionary and offered too late in a course or program to be effective. These students' knowledge gaps or learning deficiencies are not adequately addressed to effectively change his or her academic performance or learning outcomes in a timely manner. This descriptive qualitative phenomenological research study explored the lived experiences of a nursing school administrator and nurse educators who used a fully-integrated learning intervention practice system that includes proactive strategic remediation approaches at all levels in a pre-licensure vocational educational nursing program.

Purposeful sampling was used to select six participants from a small, private, single-campus, vocational nursing education program in Texas. Interviews were conducted in-person, audio-recorded, using in-depth semi-structured, open-ended interview question format. Interview transcripts were transcribed verbatim manually. Data validation involved bracketing and intuiting, external auditing, member checking, and triangulation. The modified van Kaam data analysis model was used to analyze, identify recurring themes, and provide complex meaning to the data.

The study's findings revealed three main categories and the eleven central themes.

Participants reported increased interactions between nursing school administrators, nurse educators, and nursing students that facilitates and supports collaborative working partnerships,

111

and proactive actions to stay at the forefront of academic, communication, educational, instructional, and learning processes. Participants indicated that educators were provided with the necessary academic, educational, and technological resources and tools to maximize educational efficacy, educators' teaching experiences, students' learning experiences, academic performances, and learning outcomes to achieve success.

Participants recommended adequate faculty development support and training to enhance and maintain fluency and competencies with newly integrated policies, practices, systems, and approaches within the nursing program and curriculum that affect teaching and learning.

Participants recommended administrators provide adequate academic resources and services to students that include counseling and stress management skills, support study habits, test-taking strategies, time management skills, and tutoring. Efforts should be made to help students manage school and other life stresses more effectively.

Further research is required to deepen understanding of the effects of incorporating a fully-integrated learning intervention practice system with more proactive strategic remediation approaches at all levels of a nursing program. Studies must include the perspectives and lived experiences of nursing school administrators, nurse educators, and nursing students from associate degree, baccalaureate, diploma, and practical and vocational nursing programs.

Keywords: fully-integrated learning intervention practice system, pre-licensure nursing education programs, proactive strategic remediation approaches, learning method S.I.M.P.L.I.C.I.T.Y., underperforming students

### University of New England

Doctor of Education Educational Leadership

This dissertation was presented by

Nikolaos S. Moraros

It was presented on November 13, 2019 And approved by:

Carey S. Clark, PhD, RN, AHN-BC Lead Advisor University of New England,

> Michelle Collay, Ph.D. Secondary Advisor University of New England,

Ashwini R. Wagle, Ed.D. Tertiary Advisor San Jose State University

William Boozang, Ed.D. Affiliate Committee Member University of New England

#### **ACKNOWLEDGMENTS**

To the Doctoral Program in Educational Leadership, the College of Graduate and Professional Studies, and the University of New England, I thank you for providing me with the opportunity to pursue my doctoral degree.

To my dissertation advisors, I would like to express my deepest gratitude for your support and guidance during this process. I thank you, Dr. Carey S. Clark, for introducing me to phenomenological research and your input throughout the proposal phase of this dissertation. I want to thank Dr. Barbara R. Heard for her patience and diligence in reviewing countless drafts of my dissertation proposal. Your continuous feedback was invaluable. I want to thank Dr. Ashwini Wagle for agreeing to be a part of my doctoral dissertation committee. Thank you for taking the time to review, edit, and providing feedback on all five chapters of my dissertation. I want to express my gratitude to my affiliate committee member Dr. William Boozang, for his mentorship and support during this process and in the years leading up to my doctoral dissertation. I am thankful to Dr. Michelle Collay for her patience and assistance during the data analysis phase and the final stages of the dissertation process to its completion.

I want to thank all the participants who volunteered to be a part of this study. I am honored and inspired by your dedication to the profession of nursing, nursing education, and nursing students. Thank you for taking the time to help me add to the knowledge of the field of nursing education

Finally, to my wife, Karyn, and my son Elijah. You are my motivation. I thank you both for your love, encouragement, and unwavering support. Your confidence in me, your patience and understanding, and all your sacrifices throughout this journey have enabled me to realize my goals. I am eternally grateful to you both, and I love you!

### Table of Contents

CHAPTER 1: INTRODUCTION	1
Major Issues in Pre-Licensure Nursing Education	2
Nursing Student Challenges	3
Learning Interventions Practices and Remediation Strategies	4
Attrition Rate	6
Retention Rate	7
NCLEX-PN First-time Passing Rate	8
Statement of the Problem	9
Purpose of the Study	10
Research Questions	10
Theoretical Framework	11
Assumption of the Study	12
Delimitations of the Study	13
Limitations of the Study	13
Rationale and Significance	15
A Fully-Integrated Learning Intervention Practice System	16
Definition of Terms	18
Summary	22
CHAPTER 2: LITERATURE REVIEW	24
Pre-Licensure Nursing Education Programs	26
Nursing Education Curriculum	27
Primary Objectives of Pre-Licensure Nursing Education Programs	27
Major Concerns of Pre-Licensure Nursing Education Programs	28
National Council Licensure Examination for Registered Nurses, Practical	
Nurses, and Vocational Nurses	29
Predictors of Student Readiness for Nursing School	31
Predictors for Student Readiness for the NCLEX	32
Educational Learning Intervention Practices and Remediation Strategies	
for Success	35

	Purpose of Learning Interventions and Remediation in Higher Nursing
	Education
	The Benefits of Integration of Teaching and Learning Interventions
	Effective Components of Teaching and Learning Interventions and
	Remediation
	Challenges Faced by Nursing Leaders and Nurse Educators
	Factors that Affect Faculty Teaching and Student Learning
	Nursing Education Teaching Approaches
	Nursing Student Learning Approach
	Effects of Learning Interventions and Remediation Approaches
	Effects of Learning Interventions and Remediation Efforts on NCLEX
	Performance
	Theoretical Framework
	Summary
СНАР	TER 3: METHODOLOGY
	Research Design
	Qualitative Research Methodology
	Phenomenology
	Phenomenological Study Design
	Phenomenology and Nursing Education
	Setting
	Recruitment and Participants' Rights
	Recruitment
	Participants' Rights
	Sample Method
	Sample Size
	Principal Investigator's Relationship to Study Participants and Research
	Site
	Description of Participants
	Data Collection
	Semi-structured Interviews

	Audiotape Recordings	71
	Documentation Reviews	73
	Field Tests	73
	Data Analysis	74
	Data Verification	77
	Credibility	77
	Transferability	78
	Dependability	78
	Potential Limitation	78
	Lack of Generalizability and Accuracy	79
	Recall Bias	79
	Researcher-induced Bias	80
	Summary	80
CHAP	TER 4: RESULTS	83
	Description of the Sample, Recruitment, and Saturation	84
	Data Collection Process	86
	Data Analysis Process	89
	Findings of the Research Study	117
	Category 1: Organizational Leadership and Organizational Culture	119
	Theme 1: Effective Leadership and Mentorship Creates Transformational Changes Institution-Wide	120
	Theme 2: Improving Student Academic Experiences, Performances and Learning Outcomes is the Goal	124
	Theme 3: Embrace Change, Technology, and Innovative Ideas to Ensure Educational Efficacy	126
	Category 2: Instructional leadership, Teaching Styles, and the Classroom Environment	132
	Theme 4: Multi-dimensional Teaching Styles Enhance Faculty Teaching and Student's Learning Experiences, and Learning Outcomes	133
	Theme 5: Interacting Often and Constructive Two-Way Communication Builds Stronger Relationships	134

Ca	Strategic Remediation Approaches	137
	Theme 6: Integrated Learning Intervention Practice Systems and Proactive Remediation Approaches Provide Holistic Teaching and Learning Approaches	138
	Theme 7: Collaborative Learning Environments Promote Active Learning and Effective Communication	143
	Theme 8: Tap into educator's expertise with learning interventions and strategic remediation best practices	148
	Theme 9: Mandatory student academic advisory assessments, facilitate early identification of underperforming students	150
	Theme 10: Taking ownership of student education and learning is the key academic success	153
	Theme 11: Recommendations to improve the integrated learning intervention practice system and the proactive strategic remediation approach	155
Su	ımmary	158
СНАРТЕ	R 5: CONCLUSION	161
St	atement of the Problem	161
St	atement of the Purpose	162
Su	ummary of the Study	163
In	terpretation of the Findings and Conclusion	167
	Theme 1: Effective leadership and mentorship create transformational changes institution-wide	169
	Theme 2: Improving student academic experiences, performances and learning outcomes is the goal	170
	Theme 3: Embrace change, technology, and innovative ideas to ensure educational efficacy	171
	Theme 4: Multi-dimensional teaching styles enhance faculty teaching and student's learning experiences, and learning outcomes	172

	e 5: Interacting often and constructive two-way communication stronger relationships	173
remed	e 6: Integrated learning intervention practice systems and proactive liation approaches provide holistic teaching and learning liches	174
	e 7: Collaborative learning environments promote active learning fective communication	17:
studen	e 8: Tap into educator's expertise with at-risk and at high-risk ts and learning interventions and strategic remediation best	170
	e 9: Mandatory student academic advisory assessments, facilitate dentification of underperforming students	17′
	e 10: Take ownership of student education and learning is key to	17′
interve	e 11: Recommendations to improve the integrated learning ention practice system and the proactive strategic remediation such	17
Implications a	nd Recommendations	17
Nursing School	ol Administrator and Nurse Educators Recommendations	18
Limitations of	the Study	18
Recommenda	tions for Future Research	19
Conclusion		19
REFERENCES		19
APPENDICES		20
Appendix A: V	UNE Institutional Review Board Full Approval Letter	20
Appendix B: I	Letter of Intent to Conduct the Research Study at the Research Site	20
Appendix C: A	Approval Letter from Research Site	20
1.1	Recruitment Email to Prospective Study Content Expert Reviewer to Review Study Interview Questions	20
Appendix E: I	nitial Informational Meeting Recruitment Script to Prospective	

Study Participants (Nursing School Administrators and Nurse	
Educators)	211
Appendix F: Consent Forms	213
Appendix G: Research Study Interview Questions	
Appendix I: Resume of Researcher	220

### List of Tables

Table 1:	Study Participants Demographic Characteristics	86
Table 2:	The Core Themes per Category	95
Table 3:	Composite Description of Study Participants' Transcribed Interview Transcripts	114
Table 4:	Category 1, Central Themes, and Interview Questions	119
Table 5:	Faculty Opinions of the Organizational Leadership and Organizational Culture Before and After Implementation of the Integrated Learning Intervention Practice System and Proactive Strategic Remediation	125
	Approach	125
Table 6:	Components of S.I.M.P.L.I.C.I.T.Y. Faculty Found Most Useful	130
Table 7:	Components of LMS Moodle technology Faculty Found Most Useful	131
Table 8:	Category 2, Central Themes, and Interview Questions	132
Table 9:	Faculty feelings on Instructional leadership, Teaching Styles, and the Classroom Environment	135
Table 10:	Category 3, Central Themes, and Corresponding Interview Questions	138
Table 11:	Components of the Integrated Learning Intervention Practice System	144
Table 12:	Faculty Opinions About the Integrated Learning Intervention Practice System	145
Table 13:	Components of the Proactive Strategic Remediation Approaches	146
Table 14:	Faculty Opinions on the Proactive Strategic Remediation Approaches	146
Table 15:	Improving the Integrated Learning Intervention Practice System and the Proactive Strategic Remediation Approaches in The Nursing Program	157

## List of Figures

Figure 1:	Relationship between the Main Categories, the Core Themes, and the		
	Research Question	118	

#### CHAPTER 1

#### INTRODUCTION

Pre-licensure nursing education programs include practical and vocational nursing (PN/VN) programs, associate degree nursing (ADN) programs, diploma programs, and Bachelor of Science in nursing (BSN) programs. These pre-licensure nursing education programs offer nursing education to nursing students that upon successful completion and graduation lead to a certificate, diploma, or a degree in nursing (National League for Nursing, 2016). In nursing education, a pre-licensure nursing education program's ability to maintain accreditation status and good standing is significantly affected by the program's capability to adequately prepare its nursing students for academic success, and to become both competent future nurses, and effective members of the healthcare system (Cherkis & Rosciano, 2015; Dube & Mlotshwa, 2018; Reinhardt, Keller, Summers, & Schultz, 2012). A pre-licensure nursing education program's success is primarily measured by the program's ability to adequately prepare its nursing students to take and pass the National Council Licensure Examination (NCLEX) for practical nurses (NCLEX-PN) or for registered nurses (NCLEX-RN) on the first attempt (Cherkis & Rosciano, 2015; Reinhardt et al., 2012; Serembus, 2016). For a pre-licensure nursing education program, maintaining a high first-time NCLEX passing rate is the hallmark considered the most significant and important indicator of its program's educational delivery of quality, and its effectiveness (Cherkis & Rosciano, 2015).

The NCLEX is a nationally-accepted and recognized requirement by all state boards of nursing to determine eligible nursing candidates' competency for nursing licensure for all entry-level positions within the nursing practice in the United States and Canada (Breckenridge, Wolf,

& Roszkowski, 2012; National Council of State Boards of Nursing, n.d.a.). For nursing students, academic success is determined by the ability to consistently meet the minimum academic progression standards set by their nursing program for each nursing course and clinical experience to satisfactorily complete and graduate from a nursing program (Johnson, Sanderson, Wang, & Parker, 2017; Reinhardt et al., 2012). After graduating from nursing school, the graduate nurse is eligible to sit for the state board nursing license exam, NCLEX-RN or NCLEX-PN, (National Council of State Boards of Nursing, 2017). For nursing school graduates, successfully passing the NCLEX on their first attempt successfully demonstrates their level of competence in theoretical and practical learning in nursing (Shustack, 2019). After passing the NCLEX-RN or the NCLEX-PN, the eligible nurse candidate is issued a state-registered nurse license, a state practical nurse license, or vocational nurse license to legally practice nursing (National League of Nursing, 2016).

#### **Major Issues in Pre-Licensure Nursing Education**

Significant areas of ongoing concern for pre-licensure nursing education programs are nursing students' academic performance, high attrition rates, low retention rates, and NCLEX readiness (Carrick, 2011; Pennington & Spurlock, 2010). Many nursing education programs are dealing with nursing students struggling and failing to meet the minimum academic progression standards needed to satisfactorily complete and graduate from the nursing program (Carrick, 2011; McGann & Thompson, 2008). An ongoing concern for many nursing education programs is that their nursing school graduates are not adequately prepared to take and pass the NCLEX (Pennington & Spurlock, 2010).

#### **Nursing Student Challenges**

Many students admitted to a nursing education program enter with competitive academic scores and entrance exam scores (Pennington & Spurlock, 2010; Shustack, 2019). However, after entering the nursing program, those students find themselves struggling or failing to maintain the program's minimum academic progression standards (Corrigan-Magaldi, Colalillo, & Molloy, 2014). A student who has consistently shown significant deficits in nursing knowledge, and is failing to maintain the nursing program's course minimum academic progression standards, is identified as a student at-risk of failure (Carrick, 2011; Corrigan-Magaldi et al., 2014). A student at-risk of failure is also identified as a student who is more likely to withdraw from a program or drop out of school (McGann & Thompson, 2008). In this study, a student at high-risk of failure refers to a student who is continually underperforming and struggles to maintain the nursing program's course minimum academic progression standards due to the inability to cope effectively with academic, emotional, environmental, personal, or socioeconomic stresses (Corrigan-Magaldi et al., 2014).

There are several factors to which students often attribute their poor academic performance in nursing school (Dube & Mlotshwa, 2018; Shustack, 2019). These include (a) an inability to keep up with the rigorous pace of the nursing curriculum, (b) inadequate study time management, (c) incompatibly with faculty teaching style, (d) ineffective learning styles, (e) low grades in nursing courses, (f) low scores on standardized tests, (g) low scores on end-of-program exit exams, (h) test anxiety, or (i) the inability to successfully balance school, work, and family (Dube & Mlotshwa, 2018; Shustack, 2019). Students who are at-risk or at high-risk of failure require academic interventions to help them maintain minimum academic progression standards (Corrigan-Magaldi et al., 2014; McGann & Thompson, 2008).

#### **Learning Intervention Practices and Remediation Strategies**

In nursing education, a major educational need that policymakers, nursing school administrators, and nursing educators must take seriously is to address immediately students' knowledge deficits of fundamental nursing concepts and skills by promptly utilizing learning intervention practices and strategic remediation approaches (Tierney & Garcia, 2011). Learning intervention practices in this study are defined as multi-level teaching and learning practices utilized by nurse educators to help students address fundamental knowledge gaps (McGann & Thompson, 2008). These learning intervention practices help students develop essential skills to improve students' academic performance on course examinations and assessment competencies on a short- or long-term basis (Mee & Schreiner, 2016). Strategic remediation approaches in this study included a series of classes or activities that provide additional academic support (Tierney & Garcia, 2011). Remediation is designed to help address and meet the individual learning needs of a student who initially failed to understand key nursing concepts (Tierney & Garcia, 2011). Many pre-licensure nursing education programs provide learning intervention practices and remediation strategies to accommodate various students' learning styles to help improve students' academic performance on course examinations or assessment competencies (McGann & Thompson, 2008).

What many pre-licensure nursing education programs often lack are effective procedures and protocols that allow for early identification of at-risk and high-risk students that would result in improving student academic performance (McGann & Thompson, 2008; Reinhardt et al., 2012). There are several notable challenges with most learning intervention practices and strategic remediation approaches.

- First, most learning intervention practices and strategic remediation approaches are customized to focus only on underperforming students (Horton, Polek, & Hardie, 2012).
- Second, most remediation approaches offered are more often reactive than proactive (Horton et al., 2012). Too often, by the time nursing educators identify a student as atrisk or high risk for failure and they offer that student an opportunity to undergo remediation to improve his or her academic performance, they are too late to be effective (Cleland, Mackenzie, Ross, Sinclair, & Lee, 2010). Most nursing educators and nursing students do not realize there is a problem with either the nurse educator's teaching style or the nursing student's learning style until close to the end of the course. Thus, the effectiveness of reactionary remediation approaches to improving the at-risk or high-risk student's academic performance is questionable (Evans & Harder, 2013).
- Third, these learning intervention practices and remediation approaches mostly focus on underperforming students months or years after they have been struggling in the academic curriculum (Mee & Schreiner, 2016). At this point, so much time has elapsed that when the nursing educator discovers the underperforming, struggling, and/or failing nursing student, these students have experienced extreme gaps of knowledge in nursing concepts, content, and skills that are too significant to be remedied (Cleland et al., 2013).
- Fourth, due to the rigorous nature of the nursing program curriculum, nurse educators often lack the time needed to adequately and satisfactorily address the unique learning needs of the at-risk and high-risk student (Horton et al., 2012). It is imperative for leaders in nursing education to implement and integrate appropriate learning intervention practices, and strategic remediation approaches throughout a nursing program curriculum

to improve its effectiveness regarding improving student academic performance and learning outcomes (Crouch, 2015).

#### **Attrition Rate**

Another problem concerning the VN program is its high attrition rate (the VN school's registrar office, personal communication, November 20, 2018). In this VN programs classes are offered once per year, a student would have to wait one year to retake a failed course (the VN school's registrar office, personal communication, November 20, 2018). Students at-risk and at high-risk of failure at this point have an overall negative view of nursing education, the nursing program, and their learning experience (Carrick, 2011). As a result, these students often choose to leave the VN program (Carrick, 2011; Merkley, 2015). Merkley's (2015) descriptive literature review of nursing education programs from 1965 to 2015 reported the rate of attrition of nursing students in some nursing education programs to be as high as 50% (p. 71). For years 2013-2018, the attrition rate for the VN program studied by this researcher was high, at approximately 45% (the VN school's registrar office, personal communication, March 11, 2019).

This pre-licensure vocational nursing education program is in a small, single-campus, private institution of higher learning located in a southeast metropolitan city in the state of Texas. The VN program offers a 48-week program that starts every January, requiring students to complete 1588 total contact hours that includes obtaining practical nursing theory in the classroom setting, and laboratory, and obtaining clinical experience hours in a clinical setting (the VN school's registrar's office, personal communication, March 11, 2019). Approximately 25 students enter the VN program's cohort each year (the VN's school registrar's office, personal communication, October 8, 2018). An average of 12 nursing students were reported to have dropped out or failed out of this study's VN program each year (the VN school's registrar's

office, personal communication, November 20, 2018). These nursing students were dissatisfied with understanding and keeping up with the course materials, the nursing program requirements, and complained about excessive assignments, poor faculty teaching styles, the school facility, high tuition fees, and poor grades in nursing school (the VN school's registrar's office, personal communication, October 8, 2018).

Could the high attrition rate in this vocational nursing education program be related to admission standards? This VN program's admission and selection process is competitive. The program receives approximately 80 applications and only accepts 25 students to the VN program cohort each year (the VN school's registrar's office, personal communication, March 6, 2019). Students are admitted to the vocational nursing program with competitive grade point averages from an official high school transcript or scores from an official general education diploma/general education development equivalency. Acceptance to this VN program also requires two criminal background tests, immunization and physical exam records, past academic and employment history, recommendation letters, a personal essay, admission entrance testing (HESI-A2), and selection committee interviews (the VN school's registrar's office, personal communication, January 6, 2019). However, once in the nursing education program, some nursing students find themselves consistently underperforming, struggling (high-risk), and/or failing (at-risk) to meet the academic progression standards (Carrick, 2011).

#### **Retention Rate**

Low student retention rate was a significant concern for this VN program. From 2013 to 2018, this research study's VN program's retention rate has been consistently low, averaging approximately 55% (the VN school's registrar's office, personal communication, November 20, 2018). From 2013 to 2018, this VN program's nursing student completion and graduation rate

average was low, at 54% (the VN school's registrar's office, personal communication, November 20, 2018).

#### **NCLEX-PN First-time Passing Rate**

The national NCLEX-PN first-time passing rate average in the years from 2013 to 2017 was reported at 84.63%, 82.19%, 81.89%, 83.70%, and 83.85%, respectively (Texas Board of Nursing, 2018a). The national NCLEX-PN first-time average passing rate for the years 2013-2017 was 83.25% (Texas Board of Nursing, 2018a). In 2013-2017, the overall NCLEX-PN first-time passing rate in the state of Texas was higher (86.29%) than that of the national average NCLEX-PN first-time passing rate. For the years 2013-2017, the rates were reported to be 86.43%, 85.28%, 85.28%, 87.62%, and 86.84%, respectively (Texas Board of Nursing, 2018a).

In comparison with the overall national (83.25%) and Texas (86.29%) NCLEX-PN first-time passing rate from 2013-2017, this research study's VN program graduates' overall five-year, 2013-2017, NCLEX-PN first-time passing rate was significantly low, at 59.88% (Texas Board of Nursing, 2018b). From 2013-2017, this VN educational program's NCLEX-PN first-time passing rates for its first-time takers were 37.93%, 58.82%, 20.83%, 100%, and 81.82% respectively (Texas Board of Nursing, 2018b). This nursing school's VN graduates who failed or chose not to take the NCLEX-PN cited that they did not feel adequately prepared to take the examination (the VN school's registrar's office, personal communication, October 8, 2018). To maintain full nursing education program approval, the Texas Boards of Nursing require their nursing education programs to maintain at least 80% first-time NCLEX passing rates ("Nursing Licensure Requirements in Texas," 2018, para 2). From 2013 to 2015, with such low first-time NCLEX-PN passing rate scores, this VN educational program has been in jeopardy of losing its approval.

#### **Statement of the Problem**

The quality and effectiveness of a pre-licensure nursing education program was constantly being questioned. There continues to be a significant number of nursing students failing to meet the minimum academic progression standards to complete and graduate the nursing program and graduates failing to pass the NCLEX exam on their first attempt (Cherkis & Rosciano, 2015; McGann & Thompson, 2008; Pennington & Spurlock, 2010). Nursing education leaders and nurse educators must learn to take a more proactive strategic approach to readily identify, address, and overcome academic gaps and deficiencies within the nursing program, nursing curriculum, faculty teaching styles, and student learning styles to improve students' academic performance and learning outcomes (Dube & Mlotshwa, 2018). The key to success for the underperforming student is for nursing education leaders and nurse educators to develop and implement appropriate learning intervention practices and remediation approaches that can be integrated within the nursing education program curriculum that will provide these students with learning opportunities needed to help them achieve academic success (Dube & Mlotshwa, 2018; Horton, Polek, & Hardie, 2012). Within the pre-licensure vocational nursing education program that was examined for this study, addressed were four intertwining issues that significantly affected a nursing student's academic progression:

- A lack of effective procedures or guidelines in place that allow the opportunity for early identification of students at-risk and high risk for failure;
- Inadequate learning management systems in place to monitor, track, and address students' academic performance and academic progress effectively, in real time;
- High student attrition rates and low student retention rates in the nursing program because of underperforming, struggling, or failing nursing courses, and;

 Low first-time NCLEX-PN exam passing rates due to a decrease in nursing school graduates' NCLEX readiness.

#### **Purpose of the Study**

The purpose of this descriptive phenomenological research study was to explore, and gain insight from, nursing school administrators' and nurse educators' experiences of using a fully-integrated learning intervention practice system at all levels in a pre-licensure vocational educational nursing program. The research study was seeking to determine the effectiveness of a fully-integrated learning intervention practice system in monitoring and tracking students' academic performance and academic progression within an educational program, and to find out what were the approaches used for early identification of students at-risk and high-risk for failure. This study also seeks to obtain nurse educators' lived experiences with utilizing proactive strategic remediation efforts and their ability to effectively and efficiently address the learning and academic needs of identified at-risk and high-risk students in a pre-licensure vocational nursing education program's curriculum. This researcher study sought to determine the effectiveness of a fully-integrated learning intervention practice system on improving nursing students' learning experiences, academic performance, learning outcomes, and improving graduates' NCLEX readiness.

#### **Research Questions**

The following research question was the explored in this study: What are nursing school administrators' and nurse educators' experiences with utilizing a fully-integrated learning intervention practice system that includes proactive remediation efforts throughout a prelicensure vocational nursing education program? Exploring this research question provided this researcher the opportunity to obtain a greater understanding of a fully-integrated learning

intervention practice system implemented at all levels of a pre-licensure vocational nursing education program and its effect on students' academic performance and learning outcomes, since its implementation. The data obtained from this study demonstrate nurse educator's experiences with this fully-integrated learning intervention practice system in this VN program. Nurse educators provided insights into the processes they used that offer the best opportunities for early identification of students at-risk or high risk for failure in their respective nursing courses. This study drew a correlation between the implementation of a fully-integrated learning intervention practice system with a proactive strategic remediation approach and the alignment of nurse educators' teaching and learning objectives, instructional content, evaluation, and assessment methods with improvements to student learning and achievement outcomes (Texas Higher Education Coordinating Board, 2008).

#### **Theoretical Framework**

The theoretical framework "help[ed] to focus and shape the research process" in this study (Bloomberg & Volpe, 2012, p. 96). It informs the methodological design and influence the data collection instruments used in this study (Bloomberg & Volpe, 2012). A study's theoretical framework provides an "organizing structure both for reporting this study's findings and for the analysis, interpretation, and synthesis of these findings" (Bloomberg & Volpe, 2012, p. 96).

In this research study the theoretical framework is the systems theory of teaching and learning. Systems theory of teaching and learning is a multidisciplinary systems theory for complex systems. Systems theory was first introduced by Greek philosopher and scientist, Aristotle, who explained the basic tenets of systems theory, stating that the "whole [was] greater than the sum of its parts" (Chen & Stroup, 1993, p. 449). In nursing education, the systems theory of teaching and learning consists of two complex and interdependent systems. At the

macro-level is nursing education (i.e., the academic institution, the nursing program, nursing school administrators, and nurse educators) and at the micro-level is nursing student learning.

The systems theory of teaching and learning demonstrates a strong correlation between collaborative interactions of nurse educators and nursing students and improvements to students' learning styles, academic performance, and overall learning outcomes.

#### **Assumptions of the Study**

Assumptions of a study are statements that reflect what the researcher of a study believes to be true regarding specific important issues that pertain to the research topic before starting the study (Bloomberg & Volpe, 2012). There are several assumptions about this study. The first assumption was that the nursing school administrators and the nurse educators participating in the study will provide knowledgeable, credible, and dependable information regarding their perceptions and lived experiences with the phenomenon of interest. The second assumption was that all study participants have multiple years of experience engaging with student learning intervention and remediation practices in nursing education and have worked with at-risk and high-risk students for at least two years. The third assumption of this study was that all study participants will provide truthful and sincere responses regarding their lived experiences utilizing a fully-integrated learning intervention practice system with strategic remediation approach processes at all levels of a pre-licensure VN educational program. The fourth assumption was that the findings in this study will not be skewed by researcher bias. Based on the purpose of the study and research questions, the researcher assumes that the descriptive phenomenology design was the appropriate methodology for this research study.

#### **Delimitations of the Study**

The delimitations of a study are the intentional conditions or parameters imposed by the researcher "to limit the scope of a study" (Bloomberg & Volpe, 2012, p. 8). This study's participants included only nursing school administrators and nurse educators who work and teach at a single-campus pre-licensure vocational nursing education program. The study participants consisted of only nursing school administrators and nurse educators who have the following qualifications:

- At least two years of experience working with at-risk and high-risk students in nursing education, and;
- At least two years of experience teaching in nursing education, and;
- Actively participated in the implementation of the fully-integrated learning intervention
  practice system and proactive strategic remediation approaches at this pre-licensure VN
  program during the last academic school year, and;
- At least one year of experience actively utilizing student learning intervention practices and strategic remediation efforts in a vocational nursing program's nursing curriculum.

#### **Limitations of the Study**

The first potential limitation that may affect the results of this qualitative research study was its lack of generalizability. The data collected for this study were obtained from a small number of different participants' feelings, beliefs, and perceptions of a lived experience concerning a specific phenomenon of interest studied at a single site. Although the data collected was rich, in-depth, and a contextualized representation of the phenomenon of interest studied, the findings from this qualitative study cannot be generalized (Willis, 2014).

A second limitation of this study was accuracy. Qualitative data cannot be validated, as opinions, feelings, and one's perceptions cannot be subjected to statistical analysis (Willis, 2014). This study cannot predict with 100% certainty that a fully-integrated learning intervention practice system with proactive strategic remediation approach processes implemented throughout all levels of a nursing program can guarantee improvements in student academic performance. Neither can it ensure an increase in a recent VN nursing school graduate's first-time NCLEX pass rates.

The third limitation of this study was recall bias. The researcher was the instrumentation tool used to collect data in this study, asking open-ended questions during face-to-face, one-to-one interviews. How each study participant can accurately recall lived experiences or events regarding the investigated phenomenon during interviews can be a limitation to the credibility and dependability of the data collected, transcribed, analyzed, and described (Court, 2013; de Lima Guimarães et al., 2013). The researcher has no control over how each participant chooses to answer the research questions.

The fourth limitation of this study is researcher-induced bias. Although in qualitative phenomenological research, researcher bracketing is encouraged, the subjectivity of this researcher will come into question. Possible researcher-induced bias may occur when transcribing the collected data and describing the collected data during data analysis (Bloomberg, & Volpe, 2012). The researcher, the principal investigator of this study, is a nursing school administrator at the research study site. The researcher has had multiple years of experience in nursing education and working with at-risk and high-risk students in student learning intervention and remediation programs. The researcher of this study was also instrumental in helping with the development and implementation of the fully-integrated learning intervention

practice system with proactive strategic remediation approaches within the VN educational program studied (Willis, 2014).

#### **Rationale and Significance**

Pre-licensure VN educational programs face two significant ongoing issues in higher education. The first concern was the increased number of nursing students struggling or failing to meet minimum academic progression standards to complete the nursing program successfully (Carrick, 2011). The second concern was the increased number of nursing graduates failing to pass the NCLEX-PN on the first attempt (Dube & Mlotshwa, 2018; McGann & Thompson, 2008). Low student retention rates and low NCLEX first-time passing rates by recent nursing school graduates are good indicators that the educational quality provided by such a pre-licensure nursing education program was ineffective (Dube & Mlotshwa, 2018; Shustack, 2019). An increase in recent nursing school graduates' failures on the NCLEX exam does not just affect the individual new nurse graduate and his or her respective nursing school and program alone. It is a problem that negatively affects the entire healthcare system, a system in need of competent licensed nurse graduates to help combat the nursing shortage crisis in the United States (Dube & Mlotshwa, 2018).

A fully-integrated learning intervention practice system with a more proactive strategic remediation approach will allow nurse educators the opportunity to work with at-risk and high-risk students effectively. This new practice system and approach should be implemented in the nursing program from the first day they take a nursing course through graduation (Davenport, 2007; Evans & Harder, 2013). There have been several studies conducted about learning interventions and remediation programs in nursing education. However, there is a need for further research to help other nursing school administrators and nurse educators in pre-licensure

vocational nursing education obtain a better perspective and more in-depth understanding of the benefits and challenges of incorporating a fully-integrated learning intervention practice system with a more proactive strategic remediation approach within its nursing curriculum.

#### A Fully-Integrated Learning Intervention Practice System

A fully-integrated learning intervention practice system with the use of a more proactive strategic remediation approach implemented at all levels of a nursing programs' curriculum supports nursing educators' and nursing school administrators' various approaches to facilitate students to be more committed and to become active participants in their learning experiences and learning outcomes (Cherkis & Rosciano, 2015). Every nursing curriculum will act much like a continuous learning activity workshop. It involves fully incorporating into the nursing curriculum a learning intervention practice system that involves concept-based learning, technology, one-to-one coaching, group support, mentorship, live review courses, online review courses, simulation clinical case studies, Assessment Technologies Institute (A.T.I) and Elsevier Evolve NCLEX style practice questions, and peer tutoring (Mee & Schreiner, 2016). The objective will be for nurse educators and students to work in a collaborative educational environment that creates the opportunity and the time required to address and minimize students' gaps in basic knowledge of nursing concepts (Cherkis & Rosciano, 2015).

The implementation of this practice at all levels of a nursing program curriculum provides nurse educators with the necessary tools and opportunity for early identification of students at-risk and at high-risk of failure of a course throughout various points in a nursing student's academic progression in the nursing program (Cherkis & Rosciano, 2015; Corrigan-Magaldi et al., 2014). A more proactive strategic remediation approach will allow nurse educators to tailor remediation activities to address the specific learning needs of students

identified as academically struggling or failing adequately, in a satisfactory and timely manner (Corrigan-Magaldi et al., 2014). This means that underperforming students' educational and learning needs may be readily addressed with more proactive remediation strategies within weeks, rather than using more traditional reactive remediation approaches that would have taken months or years to address the learning needs of the underperforming student (Cleland et al., 2013; Evans & Harder, 2013; Horton et al., 2012). This process provides the underperforming student with significant opportunities to achieve academic success (Cherkis & Rosciano, 2015).

Findings from this research study provided greater insight from nursing administrators and nurse educators into the benefits and challenges of implementing a fully-integrated learning intervention practice system with a proactive strategic remediation approach process in a prelicensure VN program. With this new integrated system of learning, educators and students will have an opportunity to engage actively, collaborate, and communicate in a group environment, respectfully sharing ideas and solving problems through critical thinking and practical decision-making exercises (Mee & Schreiner, 2016). This new nursing curriculum learning intervention practice system is expected to help adequately prepare nursing students to improve their academic performance (i.e., assessments, standardized tests, and exams) and learning outcomes. This may ensure that all students meet the minimum academic progression standards required to complete and graduate the nursing program on schedule.

When teaching objectives of the nursing education curriculum and nurse educator match the educational and learning needs and characteristics of the nursing student, nursing programs should notice an increase in student satisfaction, student retention rates, and a decrease in overall student attrition rates (Häggyman-Laitila, Mattila, & Melender, 2016). Under this new fully-integrated learning intervention practice system with a proactive strategic remediation approach,

all nursing students are expected to be theoretically and practically prepared to achieve academic success, to be adequately prepared to take and pass the NCLEX exam, and ready to enter the healthcare system as licensed, competent vocational nurses (Cherkis & Rosciano, 2015). With continuous positive trends with the VN nursing school graduates' first-time NCLEX-PN passing scores, the pre-licensure VN program should expect to maintain good standing and ongoing approvals and accreditation from national and state nursing boards and regional educational accredited agencies (Reinhardt et al., 2012).

#### **Definition of Terms**

The following are significant terms and definitions that will be used in this study:

- Academic success: A nursing student's ability to consistently meet the minimum
  academic progression standards set by their nursing program needed to complete and
  graduate from the program (Reinhardt et al., 2012).
- At-risk students: A nursing student identified as "at-risk" for failure is a student who has
  consistently shown significant deficits in nursing knowledge, is failing to maintain the
  nursing program's minimum academic progression standards, and requires academic
  intervention (Corrigan-Magaldi et al., 2014).
- Fully-integrated learning intervention practice system: A fully-integrated learning intervention practice system in this study refers to a nursing program fully incorporating into every nursing curriculum a learning intervention practice system for students that involves concept-based learning, technology, one-to-one coaching, group support, mentorship, live review courses, online review courses, simulation clinical case studies, Elsevier Evolve NCLEX style practice questions, and peer tutoring (Mee & Schreiner,

- 2016). Each nursing curriculum will act much like a continuous learning activity workshop.
- High-risk students for failure: A nursing student identified as "high-risk" for failure is a student who is continually struggling to maintain the nursing program's course minimum academic progression standards and requires academic intervention (Corrigan-Magaldi et al., 2014).
- Learning interventions: Multi-level teaching and learning approaches, practices, and strategies utilized by educators to help students address fundamental knowledge gaps (McGann & Thompson, 2008). Learning intervention practices help the student develop necessary skills to improve a student's academic performance on course examinations and assessment competencies on a short- or long-term basis (Mee & Schreiner, 2016).
- National Council Licensure Examination (NCLEX): NCLEX is a nationally-accepted and recognized prerequisite by State Boards of Nursing to determine an eligible candidate's competency for nursing licensure in all entry-level positions within the nursing practice in the United States and Canada (Breckenridge et al., 2012; National Council of State Boards of Nursing, n.d.a.).
- National Council Licensure Examination for Practical Nurses (NCLEX-PN): The
   NCLEX-PN examination is available to nursing students who graduated from State-

- Board-of-Nursing-approved pre-licensure practical and vocational nursing education programs (NCSBN, n.d.b.).
- NCLEX success: Maintaining a high first-time NCLEX passing rate is the hallmark
  considered the most significant and important indicator of a pre-licensure nursing
  education program's educational delivery of quality, and its effectiveness (Cherkis &
  Rosciano, 2015). For nursing school graduates, passing the NCLEX on their first attempt
  successfully demonstrates their level of competence in theoretical and practical learning
  in nursing (Shustack, 2019).
- Nursing curriculum: The nursing curriculum is an outlined, planned, learning experience
  of core nursing coursework, which determines the nursing scope, organization, activities,
  and classroom and clinical assessment with set minimum progression standards that a
  student must attain to successfully complete and graduate from a nursing program (Khan,
  Hirani, & Salim, 2015).
- Nursing school graduate: A nursing school graduate is a nursing student who successfully completed all the minimum academic requirements needed to successfully graduate from a pre-licensure accredited nursing education program (Johnson et al., 2017). The VN nursing school graduate student is eligible to sit for the state board nursing license exam, NCLEX-PN, after graduation (National Council of State Boards of Nursing, 2017).
- *Phenomenology*: Phenomenology occurs in two contexts: as a philosophy and as a methodology (Llamas, 2018). Phenomenology is described as the way in which human beings experience a phenomenon in how they see the world in which they live (Chamberlain, 2009).

- Phenomenological study design: As a methodological design used in human scientific
  qualitative research, phenomenology is an approach that describes a lived experience
  from the different perspectives of several participants sharing a specific phenomenon
  (Tuffour, 2017).
- Pre-licensure nursing education programs: Pre-licensure nursing education programs are practical and vocational nursing programs (PN/VN), ADN, diploma programs, and BSNs that offer nursing education to nursing students that lead to a certificate, diploma, or degree in nursing upon meeting the minimum academic progression standards to successfully complete and graduate the nursing program (National League for Nursing, 2016). After graduation, eligible candidates who take and pass the NCLEX-RN or NCLEX-PN are issued a state nursing license, a requirement to practice nursing in any entry-level nursing position (National League for Nursing, 2016).
- Proactive strategic remediation approach: A more proactive strategic remediation approach in this study, under the fully-integrated learning intervention practice system, refers to nurse educators adequately and satisfactorily tailoring remediation activities that readily address the specific educational and learning needs of students identified as academically struggling or failing, within weeks, rather than using more traditional reactive remediation approaches that would have taken months or years to address (Cleland et al., 2013; Corrigan-Magaldi et al., 2014; Evans & Harder, 2013; Horton et al., 2012).
- Registered nurse: A nurse who successfully completed and graduated from an accredited pre-licensure nursing program (ADN or BSN program), passed the NCLEX-RN exam, and is issued a state-registered license to practice nursing as a licensed registered nurse,

- working alongside physicians and other healthcare professionals coordinating patient care plans (Cherkis & Rosciano, 2015).
- Remediation: Remediation, or the remediation process, is defined as a class or activity intended to provide additional support that helps to address and meet the individual needs of a student who initially failed to understand key nursing concepts (Tierney & Garcia, 2011).
- Vocational nurse: A nurse who successfully completed and graduated from an accredited
  pre-licensure vocational nursing program, passed the NCLEX-PN, and was issued a state
  nursing license to practice in the nursing profession as a licensed vocational nurse (LVN)
  or licensed practical nurse (LPN; National League for Nursing, 2016). The LVN/LPN is
  trained to assist other healthcare providers in providing primary care to patients (National
  League for Nursing, 2016).

#### **Summary**

Chapter 1 introduced this research study. The focus of this study was to explore and gain insight into a fully-integrated learning intervention practice system with proactive strategic remediation approaches at all levels in a pre-licensure vocational educational nursing program from the perspectives and lived experiences of nursing school administrators and nurse educators. This research study was needed, as it provides nursing school administrators and nurse educators' perspectives on the benefits and challenges of incorporating a fully-integrated learning intervention practice system with a more proactive strategic remediation approach at all levels of a pre-licensure vocational nursing education programs' curriculum to address the academic and learning needs of nursing students. Chapter 1 included a statement of the problem,

research questions, theoretical framework, assumptions, delimitations, limitations, rationale, significance, and definition of terms.

Chapter 2 focuses on the review of the literature. It provides a review of relevant research literature with significant findings that have a direct bearing on the study's statement of the problem at the selected research study site. The chapter includes a chapter summary.

Chapter 3 presents the methodology of the study. It includes a detailed description of the methodological research study design. The chapter discusses the principal investigator's relationship to study participants. Chapter 3 includes a detailed description of the study's setting and target population, description of participants, recruitment process, data collection, data analysis methods, participants' rights, biases, potential limitations of the study, and a chapter summary.

Chapter 4 presents the results of the study. The chapter provides the data analysis, a description of the qualitative data collected, and a chapter summary.

Chapter 5 presents the conclusions of the study. The chapter describes the study's findings and discusses the implications of this study's findings for practice. In Chapter 5, the researcher presents recommendations for future studies on this topic and a chapter summary.

#### CHAPTER 2

#### LITERATURE REVIEW

The purpose of this descriptive qualitative phenomenological research study was to explore and gain insight concerning the lived experiences of nursing school administrators and nurse educators with a fully-integrated learning intervention practice system using proactive strategic remediation efforts throughout all levels at a pre-licensure vocational nursing (VN) program. This research study sought to explore how the implementation and integration of appropriate learning intervention approaches and practices early within a nursing curriculum affects the likelihood for early identification of nursing students who are at-risk or at high-risk of failure. In addition, the study will examine how effective the remediation strategies and approaches used to address the learning needs of the identified at-risk (failing) and high-risk (struggling) nursing students are in helping them to meet the minimum academic progression standards required to complete each nursing course and graduate successfully. An educational institution and its pre-licensure nursing program's success are measured by nursing students' academic performance, students meeting the minimum required academic progression standards, graduation rates, and nursing school graduates maintaining first-time NCLEX passing rates (Cherkis & Rosciano, 2015; Dube & Mlotshwa, 2018; Serembus, 2016; Shustack, 2019). A nursing school's educational institution's success is also measured by its ability to maintain accreditation status, the delivery of quality education, and maintaining good standing.

In this literature review, a systematic review was conducted of current and relevant literature on integrated learning intervention practice systems and remediation approach strategies used in pre-licensure nursing programs. Evidence-based literature was reviewed and summarized in search of relevance, gaps, or inconsistencies in the following categories: pre-

licensure nursing educational programs, educational and learning intervention practices and remediation strategies for success, and factors that affect faculty teaching and student learning.

Under the category of pre-licensure nursing education programs, the following areas of literature were summarized and reviewed: primary objectives and concerns of pre-licensure nursing education programs, NCLEX-RN and practical and vocational nurses (NCLEX-PN), and predictors of student readiness for nursing school and the NCLEX exam. Under the category of educational learning intervention and remediation strategies for success, the following areas of literature were summarized and reviewed:

- What remediation is;
- The purposes of learning interventions and remediation in higher nursing education;
- The benefits of integrating teaching and learning intervention practices and proactive remediation strategies in nursing curriculum from admission to graduation;
- Effective components of remediation and teaching and learning interventions, and;
- Challenges faced by nursing leaders and nurse educators to develop, implement, and integrate learning intervention strategies within a nursing program.

Under the category of factors that affect faculty teaching and student learning, the following areas of literature were summarized and reviewed: the nursing education teaching approach, nursing student learning approach, and the effects of learning interventions on nursing students' academic performance and nursing school graduates' NCLEX performance. The following keywords were used separately and in combination to select articles for this literature review based on the chosen research topic and research questions: academic performance success, academic success, at-risk students, early integrated remediation practices, higher education, high-risk students, integrated remediation practices, learning intervention strategies,

NCLEX-RN and NCLEX-PN first-time passing rate, nursing, nursing curriculum, nursing education, nursing students, nursing graduates, pre-licensure nursing education programs, remediation, remediation practices, and student achievement.

The databases searched to find literature sources for this research topic included PubMed, ProQuest, and the University of New England's Library Services online database. To ensure the accuracy, relevance, reliability, and credibility of the data collected, the following inclusion criteria were followed: all literature reviewed and selected was from peer-reviewed, scholarly journals and books published in the last 11 years from 2008 to 2019. In addition, all authors chosen for this study were doctoral and masters-prepared professionals, with published studies or books. Selected authors needed to be affiliated with a pre-licensure nursing education program or a healthcare education program. Selected authors needed to be experts in their respective nursing or health-related field of study specific to this research topic. Exclusion criteria for this literature review included articles published more than 11 years ago and no more than 4 journal articles from the same publication were allowed. Over 100 journals and 16 books were reviewed for this research topic. Based on the inclusion and exclusion criteria, 40 journals and 3 books were selected for this research project.

#### **Pre-licensure Nursing Education Programs**

Practical and vocational nursing programs (PN/VN), ADN, nursing diploma programs, and BSNs are all categorized under pre-licensure nursing education programs. According to the 2016 National League for Nursing (NLN) Biennial Survey of Schools of Nursing, there were a total of 3,938 basic pre-licensure nursing education programs in the United States (excluding U.S. territories; p. 29). To be more specific, in 2016, in the United States, there were 1,631 pre-licensure practical and vocational nursing programs (PN/VN), 1,333 pre-licensure ADN

programs, 67 pre-licensure hospital-based nursing diploma education programs, and 914 pre-licensure BSN programs (p. 29).

## **Nursing Education Curriculum**

Although pre-licensure nursing education program curricula vary by nursing school and type of nursing program, they all have one thing in common: A nursing education program's curriculum must adhere to the academic policies, regulations, and procedures as defined by their respective state nursing board (Texas Higher Education Coordinating Board, 2008). The nursing education program curriculum is designed as a blueprint that can guide a nursing student to become a professional nurse (Texas Higher Education Coordinating Board, 2008). The nursing curriculum is a planned, outlined learning experience of common core standard prerequisites of the nursing education program coursework (Texas Higher Education Coordinating Board, 2008). The nursing curriculum is designed to prepare nursing students academically through evidence-based best practice activities, and classroom and clinical assessment methods (Texas Higher Education Coordinating Board, 2008). In accordance with nursing education standards set by the State Board of Nursing, the nursing curriculum provides minimum academic progression standards that nursing students must attain to complete each required nursing program course needed to graduate (Khan, Hirani, & Salim, 2015).

#### **Primary Objectives of Pre-Licensure Nursing Education Programs**

The primary objective of all pre-licensure nursing education programs in higher education is first to prepare its nursing students to become competent future nurses and effective members of the healthcare system (Cherkis & Rosciano, 2015; Reinhardt et al., 2012; Shustack, 2019). A second objective is to prepare its nursing students to pass the NCLEX on their first attempt after graduation (Cherkis & Rosciano, 2015; Reinhardt et al., 2012; Serembus, 2016;

Shustack, 2019). Third, these programs ensure that their academic institution and pre-licensure nursing education program continue to have State Board of Nursing program approval and national accreditation status in good standing (Cherkis & Rosciano, 2015; Reinhardt et al., 2012; Serembus, 2016). Across all campuses in higher education, nursing education is considered one of the most regulated professional education programs (Pennington & Spurlock, 2010).

## **Major Concerns of Pre-Licensure Nursing Education Programs**

In higher education, two major problems are facing pre-licensure nursing programs. The first major problem is whether nursing students failing to meet the minimum academic progression standards can complete and graduate from the nursing program (McGann & Thompson, 2008). The second major problem is whether pre-licensure nursing education programs can consistently maintain a high first-time NCLEX pass rate (Cherkis & Rosciano, 2015; Pennington & Spurlock, 2010; Shustack, 2019). These two key factors significantly affect the viability of the accreditation status and good standing quality of an academic institution, its pre-licensure nursing education program, its nurse educators, its nursing students, and the communities they serve (Cherkis & Rosciano, 2015; Pennington & Spurlock, 2010).

Cherkis and Rosciano (2015) conducted a non-experimental, cross-sectional, one group post-test research investigation. Their findings demonstrated how critically important it was to the viability of an academic institution's pre-licensure nursing program, its students, and the communities it serves that its nursing students complete the nursing program on time from admission to graduation. Then, after graduation, the nursing programs expect their recent nursing school graduates to take and achieve high NCLEX exam pass rates, on their first attempt.

Maintaining a high first-time NCLEX pass rate is the hallmark that is the most significantly important indicator of a nursing program's educational quality, effectiveness, and its nursing

graduates' competence in the theoretical and practical learning of nursing (Cherkis & Rosciano, 2015; Pennington & Spurlock, 2010).

# National Council Licensure Examination for Registered Nurses, Practical Nurses, and Vocational Nurses

The NCLEX is a nationally-accepted and recognized prerequisite for nurse licensure in both the United States and Canada (NCSBN, n.d.a.). For all nursing school graduates who are eligible candidates to become licensed RNs, LPNs, and LVNs, passing the NCLEX is a prerequisite for all entry-level positions within the nursing practice throughout the United States, its territories, and Canada, (Breckenridge et al., 2012; Serembus, 2016). The NCLEX was created, and is implemented and managed by the NCSBN. The NCSBN is a major nursing governing body (National Council of State Boards of Nursing, n.d.a.). The NCSBN provides regulatory excellence for patient safety and public health, welfare, and protection by ensuring "safe and competent nursing care is provided by licensed nurses" (NCSBN, n.d.b., para 1). The NCSBN is committed to "developing psychometrically sound and legally defensible nurse licensure examinations consistent with the current nursing practice" (para. 2). In 1994, the NCLEX exam was adopted by all state boards of nursing in the United States. By 2005, the NCLEX exam was adopted by all provincial boards of nursing in Canada (NCSBN, n.d.a.).

The NCLEX exam is given in two different versions, the NCLEX-RN and NCLEX-PN.

The NCLEX-RN examination is available to nursing students who graduated from State-Boardof-Nursing-approved pre-licensure registered nursing programs (NCSBN, n.d.b.). The NCLEXPN examination is available to nursing students who graduated from state boards of nursing
approved pre-licensure practical and vocational nursing programs (NCSBN, n.d.b.). The NCLEX
exam is a six-hour-maximum computerized adaptive test comprised of varying complexity of

levels of question categories (i.e., 1, 2, and 3) to evaluate a nursing graduate's level of knowledge and understanding, critical thinking skills, judgment, and nursing competence in the assessment, diagnosis, planning, implementation, and evaluation in the delivery of quality patient care (NCSBN, n.d.a.). The number of questions on the NCLEX is as low as 75 and as high as 265. The NCLEX examination is an adaptive test. A candidate's performance on the exam is predetermined by a scoring algorithm, which determines within a 95% certainty if a candidate's performance was above or below the NCSBN passing standard (NCSBN, n.d.c.). Every three years, the NCLEX exam is amended by the NCSBN (n.d.a.).

It is essential to make the distinction between the nursing candidate who, upon passing his or her respective NCLEX exam, will become a licensed registered nurse (RN), as opposed to a licensed practical (LPN) or vocational nurse (LVN). A licensed RN is a nurse who successfully completed and graduated from an accredited pre-licensure nursing program (i.e., ADN or BSN), passed the NCLEX-RN exam, and was issued a state-registered license to practice nursing as a licensed RN (Cherkis & Rosciano, 2015). A licensed RN works with physicians and other healthcare professionals to coordinate basic to complex patient care plans (Dube & Mlotshwa, 2018). An LPN or an LVN is a nurse who successfully completed and graduated from an accredited pre-licensure vocational or practical nursing education program, passed the NCLEX-PN, and was issued a state nursing license to practice in the nursing profession as a LVN or LPN (National League for Nursing, 2016). The LVN and LPN are trained to assist other healthcare providers under the supervision of an RN to provide primary care to patients (National League for Nursing, 2016).

#### **Predictors of Student Readiness for Nursing School**

Typically, the admissions criteria and a selection process provide guidelines used by a program's selection committee to determine and select the best candidates to be admitted to their specific programs (Lamadrid-Figueroa, Castillo-Castillo, Fritz-Hernández, & Magaña-Valladares, 2012). Nursing school programs are extremely competitive. It is difficult for prospective applicants to be accepted into a nursing program. The nursing curriculum is a very demanding and rigorous program for students (Serembus, 2016). Cherkis and Rosciano (2015) and Corrigan-Magaldi, Colalillo, and Molloy (2014) indicated that there are multiple educational variables recognized and frequently used by nursing schools as predictors to determine student success in pre-licensure nursing programs. They include prerequisite GPA in science courses, and pre-admission assessment to identify the high-risk student, such as the Test of Essential Academic Skills, ATI, and the NLN Pre-admissions Diagnostic Readiness Exam. The assumption is that predetermined admissions criteria and the rigorous selection process for student applicants to enter a specific health education program are predictors of a student's potential academic success (Lamadrid-Figueroa et al., 2012).

Crouch (2015) indicated that there is no recognized objective instrument as the sole predictor to determine a student's ability to complete a nursing program successfully. Crouch (2015) suggested that nursing programs include the Watson-Glaser Critical Thinking Appraisal test, with a significance level of  $p \le 0.001$ , as an objective instrument to the prediction equation of student success in nursing programs. Crouch (2015) indicated, if nothing else, this test should be used by nursing programs as an assessment tool to evaluate nursing students' critical thinking.

Lamadrid-Figueroa et al. (2012) indicated no scientific study evidence exists to support that a school's adherence to specific admissions criteria to admit applicants to a specific

academic program guaranteed that applicant future academic success in the program. However, studies have shown that a school's admissions criteria that followed, "a more objective evidence-based selection process" when admitting students observed a positive trend in student academic success (Lamadrid-Figueroa et al., 2012, p. 605). Nursing education programs' admissions committees may need to apply more rigorous, objective, evidence-based approaches when using admission criteria and selection processes to select students (Lamadrid-Figueroa et al., 2012). Serembus (2016) encouraged pre-licensure nursing programs to be more proactive in setting benchmarks for student performance using comprehensive and integrated approaches with standardized assessments and remediation strategies throughout educational programs (from admission through graduation) to prepare its nursing students better to engage in safe and competent nursing practices.

#### **Predictors for Student Readiness for the NCLEX**

Passing the NCLEX exam is critically important for the nursing school graduate. It is a requirement for all nursing school graduates to be issued a state license to practice nursing (Breckenridge et al., 2012; Serembus, 2016). Breckenridge et al. (2012) stressed the need for pre-licensure nursing programs to implement identifiable indicators that predict a nursing student's potential to pass the NCLEX exam on the first attempt. To date, there is limited research to support specific learning intervention practices or remediation strategies that are considered the most consistent set of predictor variables that can prepare nursing students to successfully pass the NCLEX exam or predict failure on the NCLEX exam (Cherkis & Rosciano, 2015; Stout & Haidemenos, 2016). Stout and Haidemenos (2016) pointed out that to meet the standards for ongoing state approval and accreditation, pre-licensure nursing programs should

adopt a variety of standardized remediation and intervention strategies to prepare and improve nursing students' chances of success on the NCLEX exams.

In efforts to assess nursing students' readiness for the NCLEX exam, pre-licensure nursing programs also use the Health Education System Incorporated (HESI) online case studies and HESI Exit-2 (E-2) examination, with a HESI E2 cut score of 900 (Randolph, 2017; Reinhardt et al., 2012). According to Johnson et al.'s (2017) retrospective descriptive research study, pre-licensure nursing education programs also use pre-entry admission criteria and demographic and academic performance in various courses (e.g., science GPA, standardized testing, high-stakes testing) as predictor variables associated with first-time NCLEX pass rate success. Study findings have shown that as a learning intervention strategy to prepare students for the NCLEX exams, the HESI exit exam, on average, helped increase the nursing graduate's first-time NCLEX passing rate by as much as 3.29% (Cherkis & Rosciano, 2015, p. 212).

Davenport (2007) cautioned educators to use the HESI exam assessment tool only as a likely predictor of student success on the NCLEX and not as a high-stakes exam.

The prediction study by Breckenridge et al. (2012) presented the Risk Assessment Profile, Strategies for Success (RAPSS), a 13-item criterion-based instrument that includes demographic and academic risk indicators initially developed to predict a student's potential to graduate from a pre-licensure nursing program. The RAPSS was also useful to predict whether nursing program graduates would pass or fail the NCLEX exam on the first attempt (p. 165). The RAPSS could also be used as a learning intervention approach to tailor nursing students' remediation strategies (p. 165). The 13 RAPSS predictors are scaled ordinally, coded "so that a higher value reflects a greater risk of failure" (Breckenridge et al., 2012, p. 164). The criterion

code score of zero designates the likelihood to pass the NCLEX exam, and a score of one or higher designates the likelihood of failure on the first attempt at the NCLEX exam (p. 164).

Only eight of the 13 RAPSS predictors for a student's academic risk apply to nursing students enrolled in a VN pre-licensure nursing education program. The eight RAPSS predictors for students' academic risk include: English as a second language; working, married with children and attending school full time; family income (poverty level); first in family to attend college; overall GPA prior to entering a nursing education program; a score lower than 40 on the National League for Nursing Pre-admission Examination; a score lower than 63 on the Nursing Entrance Test composite, a score of less than 74% on the Test of Essential Academic Skills; and scores below acceptable level on a pre-entry standardized test (e.g., SAT score less than 1000, ACT score less than 21) (Breckenridge et al., 2012, pp. 162-163). All 13 RAPSS predictors for students' academic risk apply to nursing students enrolled in ADN and BSN pre-licensure nursing education programs. The 13 RAPSS predictors for students' academic risk listed by Breckenridge et al. (2012) include the eight RAPSS predictors that pertain to VN programs, and five predictors that apply to ADN and BSN program. Those include students completing college preparatory algebra; completing college preparatory college biology; completing college preparatory chemistry; science GPA, and retaking prerequisite science college courses to obtain a C or higher letter grade (pp. 162-163).

A limitation of Breckenridge et al.'s (2012) study was its small sample size. A single, university-level nursing education program was used for this study. Also, although the 13 predictors of this study theoretically could significantly predict or identify risk factors that could affect students' potential to succeed or fail to graduate a nursing program, not all 13 predictors identified by the study were significant predictors of NCLEX performance (Breckenridge et al.,

2012, p. 164). The most powerful predictors of nursing students' NCLEX readiness in this study's findings were a student's science GPA and income at poverty level (Breckenridge et al., 2012).

## **Educational Learning Intervention Practices and Remediation Strategies for Success Remediation**

Tierney and Garcia (2011) defined remediation as a class or activity intended to provide additional support that helps meet the needs of an individual who initially failed to understand key concepts. The authors further explained that remediation provides those individuals who "do not have the skills, experience or orientation necessary" with an opportunity to "perform at a level that the institutions or instructors recognize as 'regular' for those students" (Tierney & Garcia, 2011, p. 104). Cleland et al. (2010) defined remediation as "the act or process of correcting a deficiency" (p. e185). Although there are various approaches to the remediation process, it typically consists of three steps: identification or diagnosis, remediation intervention, and retesting (Cleland et al., 2010; Cleland et al., 2013).

In the United States, remediation in higher education has been a part of postsecondary education since colonial times (Tierney & Garcia, 2011). According to Tierney and Garcia (2011), 29% of students at 4-year postsecondary institutions and 43% of students in 2-year public postsecondary institutions require some form of remediation intervention (p. 105). Across the United States, learning intervention practices and remediation approaches for students cost higher education institutions between \$2 and \$3 billion annually (Tierney & Garcia, 2011, p. 105). Remediation learning intervention practices should be considered as part of the public higher education's "democratic function" to help students succeed in higher education (Tierney & Garcia, 2011, p. 105).

Students who are struggling academically in a nursing course are identified as high-risk for failure (Corrigan-Magaldi et al., 2014). Students who are academically failing nursing courses are identified as at-risk of failure (Corrigan-Magaldi et al., 2014). Students identified as at-risk or high-risk should be provided with multiple instructional and educational remediation intervention strategic approaches to help accommodate the varied styles of learning of each student to resolve specific gaps in knowledge and skill, and give opportunities to improve educational performance issues or needs (Corrigan-Magaldi et al., 2014). Horton et al. (2012) and McGann and Thompson (2008) support educators customizing learning interventions and remediation strategies that targets the specific educational and learning needs of underperforming students. The authors indicated that educators finding the appropriate learning intervention approach and remediation strategies that were more compatible with a student's learning style was the key to helping underperforming students minimize their knowledge gaps on basic nursing course concepts. The goal is to ensure that every nursing student can meet the minimum academic standards to progress in a nursing program.

Learning intervention practices and remediation strategies can be offered on a short-term basis to help students prepare for a summative assessment (Mee & Schreiner, 2016). Learning intervention practices or remediation strategies can be offered on a long-term (ongoing) basis to help students address gaps in basic knowledge and to help the students develop basic skills, but intervention and remediation may not necessarily help students develop effective skills for lifelong learning (Cleland et al., 2013; Mee & Schreiner, 2016). Tierney and Garcia (2011) argued that learning interventions and remediation processes offered in higher education institutions often help to fulfill the needs of the institution rather than to help resolve students' educational problems. Recent evidence has noted a substantial amount of time and demands

placed on educators during the remediation process (Tierney & Garcia, 2011). They questioned the efficacy of remediation intervention practices as they relate to subsequent student performance on examination (Tierney & Garcia, 2011). That said, McGann and Thompson (2008) and Tierney and Garcia (2011) supported the fact that learning intervention practices and remediation processes in nursing education are a serious, challenging educational predicament for nursing school administrators, nurse educators, and nursing students. The authors urged nursing education policymakers, nursing school administrators, and nurse educators to take seriously and to address immediately the educational and learning challenges experienced by nursing students as they matriculate in pre-licensure nursing programs.

#### Purpose of Learning Interventions and Remediation in Higher Nursing Education

Learning intervention practices and remediation strategies in higher nursing education were developed and implemented in nursing curricula to improve students' academic performance on course examinations and assessment competencies to help the at-risk or high-risk nursing student to maintain nursing program minimum academic progression standards (McGann & Thompson, 2008). Cleland et al. (2013) indicated that the primary goals of the learning intervention practices and remediation approaches in higher nursing education programs are to ensure safe practice and to develop defensible systems that can identify and address student underperformance. If the student repeatedly fails to respond to interventions in a specific academic course or program, Cleland et al. (2013) suggested nursing educators and nursing school administrators help students determine other career choices. Evans and Harder (2013) indicated that although the primary goal of learning intervention practices and remediation strategies for at-risk or high-risk students is to improve their learning outcomes, "there must be an intentional use of learning theory and frameworks to determine if those at-risk or high-risk

students [participating in the remediation approaches] are provided with a fair quality educational intervention" (p. 150).

Stout and Haidemenos (2016) considered nursing education remediation approaches as mentoring sessions that provided students an opportunity to review, examine, and correct practice questions. Based on their findings, Pennington and Spurlock (2010) warned against nursing students and nurse educators having a false perception that the learning intervention practices and strategic remediation approaches equated to both academic success and NCLEX first-time passing rate success. Cherkis and Rosciano (2015) and Stout and Haidemenos (2016) supported the conclusion of a study by Pennington and Spurlock (2010) that no empirical evidence exists to support the effectiveness of learning intervention practices and remediation approaches that could completely guarantee first-time NCLEX pass rate success.

#### The Benefits of Integration of Teaching and Learning Interventions

Cherkis and Rosciano (2015) suggested that the integration of learning intervention practices in the form of implemented assessment and standardized test products throughout nursing curricula, from admission to graduation, allows the opportunity for early identification of at-risk and high-risk students throughout various points in students' academic progression in the nursing program. Cherkis and Rosciano (2015) and Corrigan-Magaldi et al. (2014) agreed that learning intervention practices should be well structured, where remediation strategies in real time can be tailored to effectively address the needs of the student who is struggling or failing academically. Nursing students who perform poorly on the HESI exams should be given an opportunity to undergo remediation as soon as possible to target and address areas of academic and learning weaknesses.

Davenport (2007) and Johnson et al. (2017) indicated that the start of early learning intervention practices allows nurse educators the opportunity to potentially stop the cycle of academic underperformance of at-risk students by identifying at-risk students in a timely manner. This would allow nurse educators the time needed to create and provide a supportive learning environment with the appropriate and targeted strategic teaching and learning practices that meet the specific academic needs of the at-risk or high-risk student to meet the minimum progression standards. Carrick (2011), Cherkis and Rosciano (2015), and Johnson et al. (2017) suggested that those nursing curricula that have integrated active learning practices and course learning that are reflective of the NCLEX design integrated NCLEX review course and question formats have significantly improved students' academic and learning outcomes. Results of these learning intervention practices have shown improvement in the odds of nursing school graduates passing the NCLEX exam (Carrick, 2011; Cherkis & Rosciano, 2015; Johnson et al., 2017).

Findings from a study by Cleland et al. (2013) supported the development, implementation, and integration of learning intervention practices from the first nursing course taken in a pre-licensure nursing academic program. The authors indicated this practice would provide the nurse educator with the opportunity needed to help students to identify early in their academic career what learning practices they were most receptive to and permit them to make the necessary adjustments, accordingly. Furthermore, students aware of their gaps of knowledge and skills in real time can readily seek help (undergo a remediation process) to reduce the potential for underperforming, struggling, or failing an academic nursing course or program.

## **Effective Components of Teaching and Learning Interventions and Remediation**

For both the nursing student and nursing educator, the development, implementation, and integration of an improved approach to teaching and learning is essential to effectively cultivate

a deeper understanding of nursing concepts based on interactive thinking utilizing active learning and formative assessment strategies (Cherkis & Rosciano, 2015). Both learning intervention practices and the strategic remediation approaches enable the nurse educator to recognize the strengths and weaknesses in his or her teaching style. Also, the nurse educator can help nursing students recognize the strengths and weaknesses in their learning styles (Davenport, 2007). The learning intervention process provides nurse educators the opportunity to review and reinforce nursing concepts using National Council of Board of Nursing adaptive online learning systems through preparation, assessment, and standardized testing modules (Oermann & Gaberson, 2014). The remediation process allows students the opportunity to learn how to effectively examine, understand, apply, and analyze nursing concepts (Cherkis & Rosciano, 2015).

Utilizing concept-based learning, case studies, critical thinking exercises, standardized comprehensive examinations, and the completion of NCLEX questions and face-to-face NCLEX review courses are active learning intervention strategy practices that have been instrumental in helping nursing programs to see a significant improvement in academic performance and learning outcomes (Cherkis & Rosciano, 2015). Most of the active learning intervention strategic practices mentioned are computer-based. This mode of learning offer nursing students easier access to computer-based learning opportunities permitting students to learn at a preferred self-pace. Findings from studies by Cleland et al. (2013) and Frank and Scharff (2013) indicated that students using computer-based learning intervention practices learned to be more self-directed and more motivated to take control and actively pursue and fill knowledge and skill gaps to improve their learning and academic performance. Studies have shown that students find computerized learning intervention practices to be more conducive to their successful application of nursing concepts (Cherkis & Rosciano, 2015). Subsequently, nursing programs adopting these

learning intervention practices have noticed an increase in their recent nursing school graduates' NCLEX first-time passing rates (Cherkis & Rosciano, 2015).

## **Challenges Faced by Nursing Leaders and Nurse Educators**

The rigorous pace of a nursing program necessitates that the nurse educator's pattern of student assessment is complex. Too often, the nursing student who is academically underperforming or struggling finds little to no guidance or support from nurse educators in the classroom or in clinicals, unless he or she is failing the nursing course (Cleland et al., 2013). This is a significant issue that Horton et al.'s (2012) quantitative, descriptive study encountered with most learning intervention practices and remediation processes in nursing education. They found most nursing education learning intervention approaches and practices, especially remediation strategies used by nurse educators, were more of a reactive process than a proactive process (pp. 146-147). Another problem is that many students found to be underperforming, failing, or struggling academically were not identified as at-risk for several months or years after starting their nursing course or program (Horton et al., 2012). Thus, students deemed "at-risk of failure" become those who, despite participating in learning intervention and remediation activities, continued to struggle academically (Cherkis & Rosciano, 2015).

#### **Factors that Affect Faculty Teaching and Student Learning**

Most student success initiatives implemented by an academic institution start with the type of teaching environment educators create in the classroom setting that helps to develop, support, and guide student's learning experiences (Crouch, 2015). Studies have shown that a strong correlation exists between quality teaching and student academic achievement and success (Stout & Haidemenos, 2016). The quality and effectiveness of an educator's teaching style play key roles in a student's academic performance and learning outcomes. The level of interaction

between educator and students and the way in which educators engaged students with evidence-based educational practices added value to students' academic and learning experiences (Healy, Flint, & Harrington, 2014). For some students at-risk of failure, recent studies have shown that the problem may not be a lack of knowledge, but rather the nursing faculty's teaching approach (Cherkis & Rosciano, 2015).

## **Nursing Education Teaching Approaches**

Many nurse educators' use of passive (or traditional) teaching and learning strategies does little to help enhance these students' critical thinking or problem-based learning skills (Stout & Haidemenos, 2016). Traditionally in the classroom setting educators provide large amounts of course material in a short period of time with little to no input from students in the form of discussions or experiential exercises (Michel, Cater, &Varela, 2009). Typically, the nursing curricula require students to depend heavily on rote learning to master a subject (University of Oxford, n.d.).

According to Almajed, Skinner, Peterson, and Winning's (2016) qualitative study, "Collaborative Learning: Students' Perspectives on How Learning Happens," students expressed the need to have quality educators who could provide them with the guidance and direction toward the right path, and provide the right motivation, relevant knowledge, and interesting topics for development of students' learning and communication skills. From the student's perspective, quality educators can achieve better outcomes by creating and implementing a learning environment where students are properly taught (Almajed et al., 2016). An empirical study conducted by Michel, Cater and Varela (2009) on the active versus passive teaching styles and its effect on student learning outcomes, showed that "the active teaching and learning approach may have a greater positive influence on student learning" than the more traditional

passive teaching approach (p. 64). Educators engaged in active teaching approaches may "improve upon passive teaching" (Michel et al., 2009, p. 57).

Active teaching approaches adopt several models of active learning methods to help motivate students to become active participants in their own learning through individual and group class reading, writing and discussion exercises (Michel et al., 2009). Within the classroom setting the active teaching and learning approaches used include experiential learning, critical thinking and problem-based learning, participative learning, and cooperative learning (Michel et al., 2009). A collaborative learning environment was shown by Almajed et al., (2016) study to help promote continuous interactions between educator and student, and student and student. This type of active participative and collaborative learning environment was shown to broaden students' approach to learning by increasing "students' sense of responsibility," encouraging problem-solving and critical thinking, facilitating sharing of information, and increasing student class participation during learning activities (Almajed et al., 2016, p. 7). Collaborative learning environments provide students with an opportunity for consistent "direct feedback" that can positively improve a student's learning experiences and learning outcomes (p. 7).

The NCLEX first-time pass rate is a long-standing gatekeeper that nursing programs and nurse educators need to address on a continual basis. Crouch (2015) and Davenport (2007) emphasized the significance of the critical role that nurse educators play in the development and preparation of nursing students to become effective, efficient, and competent future nurses in the healthcare workforce. Thus, nurse educators are responsible not only to ensure that their nursing students successfully complete their nursing education programs, but that their nursing school graduates have developed the necessary critical thinking skills (i.e., relevant analysis, reasoning, decision-making, and independent judgment) to pass the NCLEX exam and successfully practice

nursing (Crouch, 2015). Critical thinking or problem-based learning skills are essential skills needed by all nursing students and future nurses to pass nursing tests, exams, and to be effective nurses in the nursing practice (Cherkis & Rosciano, 2015). The National League of Nursing identified critical thinking skills as a significant outcome criterion for the nursing school accreditation process in demonstrating that its nursing students gained valuable thinking skills to solve problems in a systematic way (Crouch, 2015). Cherkis and Rosciano (2015), Crouch (2015), and Stout and Haidemenos (2016) emphasized the importance of every nursing student adopting essential critical thinking skills to cultivate a deeper understanding of nursing concepts.

The systems theory of teaching and learning has demonstrated the educator-student relationship has a significant influence on a student's learning experiences, academic performance, and learning outcomes (Carrick, 2011). Cherkis and Rosciano (2015) and Oermann and Gaberson (2014) encouraged nurse educators to find systematic and efficacious approaches that provide opportunities for comprehensive assessments and educational processes. Instructors using hese systematic and efficacious learning intervention approaches should adequately plan for testing and comprehensive assessments that improve student learning outcomes and prepare students better for academic, licensure, and certification examination success. Davenport (2007) stated that this approach starts with a comprehensive plan that helps the nursing student from the first nursing course through graduation to better "understand the testing process, develop [adequate] test-taking skills, increase content knowledge, improve critical thinking abilities and to gain confidence" (p. 33).

#### **Nursing Student Learning Approach**

Cleland et al. (2013) indicated that students struggling or failing academically have low self-efficacy beliefs and negative feelings toward learning. Thus, they have difficulty being

motivated to continue with difficult learning tasks. Students are often given a large amount of information to memorize, but lack the skill to critically analyze and apply new knowledge effectively (Stout & Haidemenos, 2016).

Student approach to learning studies conducted by leading educational psychologists and researchers Ference Marton and Roger Säijö, and John B. Biggs and Noel Entwistle identified three common approaches to learning that most students adopt, they include surface approach to learning, deep approach to learning and achieving or strategic approach to learning (Biggs, n.d.; University of Oxford, n.d.). Students who adopt the surface approach to learning see tasks or a course subject as a burden or something to cope with to get by (University of Oxford, n.d.). These students often choose to focus on doing as little as possible to complete assignments or tasks and use rote memorization to study only what they deem is important to pass an exam (Biggs, n.d.; University of Oxford, n.d.). Stout and Haidemenos (2016) indicated that rote memorization does not facilitate critical thinking, a key concept many nursing students struggle with understanding fully. Students who adopt a surface approach to learning make no attempts to understand the meaning or implication of what they learn (Biggs, n.d.). In higher education, a surface approach to learning is considered undesirable (University of Oxford, n.d.).

Students motivated by a deep approach to learning are intrinsically curious about seeking understanding and meaning about what they learn (Biggs, n.d.; University of Oxford, n.d.). Deep learners, as these students are often called, genuinely enjoy learning (Biggs, n.d.). These students are personally committed to learning, and completing tasks that help them build on prior knowledge of a current subject or topic of interest (Biggs, n.d.; University of Oxford, n.d.). Students who adopt a deep approach to learning have a higher cognitive level process and are open to learning from others different points of view (Biggs, n.d.). A student's values, who

adopts an achieving or strategic approach to learning, are derived "from an intention to obtain the highest possible grades and involves adopting well-organized and efficient study methods" (University of Oxford, n.d., p. 4). The strategic approach to learning "is used in conjunction with a deep or surface approach to learning" (University of Oxford, n.d., p. 4). A student may adopt different learning approaches in various courses based on their perceptions of the demands a course subject will have on them (University of Oxford, n.d.). Biggs (n.d.) points out that personal factors and teaching context are the two major factors that influences a "student's development of a certain learning approach" (para. 7).

#### **Effects of Learning Interventions and Remediation Approaches**

Although studies have shown that learning intervention practices and remediation approaches have helped students to persist academically, learning interventions and remediation have not been shown to help the weakest student to earn a degree or to pass the NCLEX examination successfully (Cherkis & Rosciano, 2015; Pennington & Spurlock, 2010; Stout & Haidemenos, 2016; Tierney & Garcia, 2012). Research evidence on the effectiveness of learning intervention practices and remediation approaches in higher education remains uncertain and conflicting on whether such efforts help students overcome academic deficiencies, improve performance, or can sit for an examination (Cleland et al., 2013; Pennington & Spurlock, 2010; Tierney & Garcia, 2012). Research evidence provided no further insight on what type or how much additional support work or teaching are required for a student to develop his or her learning potential to achieve academic success (Cherkis & Rosciano, 2015; Cleland et al., 2013; Pennington & Spurlock, 2010; Stout & Haidemenos, 2016; Tierney & Garcia, 2012).

Both Hyland (2012) and McGann and Thompson (2008) concluded that consistent nurse educators' mentorship of at-risk and high-risk students is a critical contributing factor that will

help facilitate the necessary behavioral changes required to achieve academic and NCLEX success. It is imperative that higher education leaders implement appropriate learning intervention practices and strategic remediation approaches that can be integrated into a nursing education program curriculum. These more proactive strategic remediation approaches will involve both the nurse educator and nursing student working in collaboration to find individualized educational and learning opportunities ideal for the students' learning capabilities to overcome academic deficiencies and realize academic success (Dube & Mlotshwa, 2018).

#### Effects of Learning Interventions and Remediation Efforts on NCLEX Performance

Overall, nursing programs graduates who participated in a variety of learning intervention practices and active remediation activities using case studies, problem-based learning, critical thinking exercises, standardized comprehensive examinations, reviewing and completing sample NCLEX questions, and taking NCLEX review courses in face-to-face workshops or online, noted a significant improvement on NCLEX passing rates (Cherkis & Rosciano, 2015; Hyland, 2012). There exists a great deal of uncertainty and misunderstanding concerning learning intervention practices; remediation strategy approaches; and the systematic development of critical, evidence-based intervention by nurse educators. This has led to limited evidence-based research on the correlation between effective learning intervention practices and remediation strategies to increase success on the NCLEX (Hyland, 2012). As mentioned previously, no set of predictor variables can ensure student success on the NCLEX exam (Cherkis & Rosciano, 2015; Johnson et al., 2017; Stout & Haidemenos, 2016).

To increase scientific progression in learning intervention and remediation best practices, tools, methods, and evidence-based remediation strategies in nursing education, Hyland (2012) encouraged higher education nurse educators to conduct more rigorous quantitative and

qualitative research methods and learning intervention practices. Hyland (2012) also suggested that nurse educators "acquire stronger evidence-based remediation" strategies that are more relevant, credible, and applicable in today's learning environment to effectively improve academic and NCLEX passing rate success (pp. 236-237). Johnson et al. (2017) indicated that currently, the only measure of success that exists for an academic institution and its pre-licensure nursing programs, its nursing students, its nursing graduates, and the communities they serve is its nursing students successfully completing the professional nursing program and for its nursing graduates to "pass the licensure examination on their first attempt" (p. 544).

#### **Theoretical Framework**

Systems theory of teaching and learning is the theoretical framework selected to guide this research study. As a theoretical framework, the systems theory of teaching and learning applies to the complexity of the interdependence and interrelationships of the nursing education and student learning systems that make it more viable for effective and efficient growth, development, and productivity (Carrick, 2011; Chen & Stroup, 1993). The continuous and interdependent relationship that exists between nursing education teaching and learning systems (educators and students) makes it possible for nurse educators to set and achieve student-centered goals and objectives. In this interdependent system, nurse educators and nursing students can identify and work together to address strengths and weaknesses within the system in an efficient and effective manner (Carrick, 2011). The primary goal within the pre-licensure nursing education system (i.e., administrators, educators, programs, and curriculum) and the nursing student learning system is to prepare nursing students academically to become competent future nurses. This subsequently includes concurrently preparing students to successfully pass the licensure exam, the NCLEX, upon graduating from nursing school.

Nurse educators are strongly encouraged to work closely with their students to help identify and address the ongoing problems of students who are at-risk or high risk of underperforming academically (Carrick, 2011, p. 80). Almajed et al.'s (2016) qualitative study, "Collaborative Learning: Student's Perspectives on How Learning Happens," supported Carrick's (2011) article suggesting that nurse educators should create a collaborative learning environment in the classroom setting for nursing students that provides an opportunity for the development and facilitation of teaching, learning, and achievement activities that reflect inquiry-based learning approaches. This system would ensure that students become active participants in their own learning/education through autonomous learning while nurse educators act as facilitators or guides of learning (pp. 2-3). This process can be accomplished through educator-to-student or student-to-student interactions. This process promotes and encourages knowledge-sharing experiences and data/information searching; promotes social interaction and peer support; and develops and improves current and future work skills in critical thinking, problem-solving, knowledge presentation, test-taking techniques, and meaningful negotiation skills (Carrick, 2011). These are critical skills required by all nurses to achieve academic success as students and as future nursing practice professionals (Carrick, 2011).

The effectiveness of the nursing education (teaching) system is dependent on the continuous feedback loop related to student outcomes (Carrick, 2011). The student learning outcome measurement is comprised of nursing student test scores, GPA, attrition, standardized assessment test scores, and nursing school graduate nurses' NCLEX-PN passing rates (Carrick, 2011). The nursing student learning systems, although parallel with the teaching system, are dynamic and multidimensional, as nursing students learn what is required to practice nursing safely at the nursing practice entry level (p. 80). Students must learn to use strategic learning

approaches while monitoring learning outcomes. Students must learn to be open to filling knowledge gaps while obtaining new knowledge, skills, and clinical judgment competencies by actively participating in learning activities such as attending classes, participating in clinical experiences, skills/simulation labs, reading, and studying (Carrick, 2011). Carrick (2011) stressed the importance of integrated learning intervention practices and remediation strategies within the nursing program/curriculum that focus on multiple factors involving the student learning experience. This would ensure that all nursing students receive comprehensive support to ensure a better chance of achieving their desired learning outcomes (Carrick, 2011).

Learning intervention practices implemented in nursing programs' curricula considered to be contributing factors that have helped improve students' success outcomes both academically and on the NCLEX exam include the following:

- Academic policies that required high academic standards for admission and academic progression policies;
- Curriculum and teaching approaches modeled after the NCLEX test blueprint;
- Assessment of learning outcomes using comprehensive assessment standardized tests,
   NCLEX question format course testing, and readiness tests; and
- Remediation and student support that allow an opportunity to address the academic and learning needs of at-risk students early, test anxiety counseling, peer support groups/peer tutoring, mentoring sessions with a small faculty-student ratio that meet student learning needs; and implementing structured learning assistance (Carrick, 2011, p. 82).

Several authors have noted that no definite models exist that can predict student academic achievement success or models that can increase a student's first-time NCLEX passing rate scores (Cherkis & Rosciano, 2015; Johnson et al., 2017; McGann & Thompson, 2008;

Pennington & Spurlock, 2010; Stout & Haidemenos, 2016). Studies have also shown that there exists no definite educational model that can increase a student's first-time NCLEX passing rate scores (Cherkis & Rosciano, 2015; Johnson et al., 2017; McGann & Thompson, 2008; Pennington & Spurlock, 2010; Stout & Haidemenos, 2016). Carrick (2011) cited other studies that have shown personal and situational factors do have a significant effect on student outcomes.

#### **Summary**

This research was warranted. Pre-licensure vocational nursing education programs' nursing school administrators and nurse educators need to have a greater understanding of the importance of having a comprehensive, fully-integrated learning intervention practice system with a more proactive strategic remediation approach within its programs and curriculum. Nurse educators and nursing school administrators could readily identify the educational needs of atrisk and high-risk students for failure early in the program, and address learning gaps in real-time, to ensure that these students have a chance to realize academic success (Dube & Mlotshwa, 2018). Nurse educators and nursing students working together in a collaborative system teaching and learning environment provide a greater opportunity for each to recognize and address strengths and weaknesses in faculty teaching styles and student learning styles, in real-time (Carrick, 2011).

The systems theory of teaching and learning, used as a theoretical framework in Carrick's (2011) study concluded that collaborative teacher-student relationships help to minimize students' gaps in basic content knowledge of nursing concepts and nursing skills. Collaborative teacher-student relationships assist in developing and improving students' critical thinking and problem-solving through problem-based learning and test-taking skills in real-time (Dube &

Mlotshwa, 2018). These collaborative relationships encourage students to become active participants in their learning experiences and learning outcomes (Johnson et al., 2017; McGann & Thompson, 2008). This collaborative system of teaching and learning ensures that all students can demonstrate academic program achievement by meeting the minimum progression standards throughout the nursing program and graduate successfully from the nursing program (Stout & Haidemenos, 2016).

As part of the fully integrated learning intervention and proactive strategic remediation practices, an active and collaborative teaching and learning environment in nursing school should be encouraged and supported between nurse educator and nursing student to help better prepare students for academic success and for professional competence (Carrick, 2011; Dube & Mlotshwa, 2018; Pennington & Spurlock, 2010). After nursing school graduation, the new nurse graduate is adequately prepared to take and pass the NCLEX exam on his or her first attempt (Dube & Mlotshwa, 2018). Further study is required to support these findings to determine the actual effectiveness of the identified learning intervention practice systems and remediation strategies on academic success and NCLEX success.

Chapter 2 presented a review of nursing-related literature exploring the phenomenon being investigated, the implementation and integration of appropriate learning intervention practices, and strategic remediation approaches within the pre-licensure nursing education program and curriculum (learning intervention practices and strategic remediation approaches), how they can permit early identification of at-risk and high-risk students for failure, and how they affect student performance and learning outcomes. This chapter presented literature that supported nursing education programs that provided an academic environment where both the nurse educator and the nursing student could address educators' teaching styles and students'

learning style strengths and weaknesses (Cherkis & Rosciano, 2015). This type of academic environment showed how nurse educators could better provide and prepare nursing students with better learning opportunities to help improve their learning experiences and learning outcomes (Pennington & Spurlock, 2010). This allows students the ability to successfully maintain the minimum academic progression standards required throughout a nursing education program.

Chapter 3 presents the methodology of the study. It includes a detailed description of the research study design. It describes the principal investigator's relationship to study participants. The chapter discusses the project setting and target population, gives a detailed description of study participants and the recruitment process, describes data collection and data analysis methods, discusses participants' rights and potential limitations of the study, and provides a chapter summary.

Chapter 4 discusses the results of the study. It presents the data analysis and a description of the qualitative data collected. The chapter includes a chapter summary. Chapter 5 contains the conclusions of the study. This chapter describes the study's findings and discusses the implications of this study's findings for practice. Included are the recommendations for future research on this topic and a chapter summary.

#### CHAPTER 3

#### **METHODOLOGY**

The purpose of this descriptive phenomenological study was to explore and gain insight into nursing school administrators' and nurse educators' lived experiences with utilizing a fully-integrated learning intervention practice system at all levels of a pre-licensure vocational nursing education program. This study sought to explore whether integrated student learning intervention practices lead to significant differences in nursing students' academic performance. More specifically, this study sought a better understanding of nurse educators' lived experiences with the proactive use of strategic remediation approaches to address students' academic and learning needs in this pre-licensure VN program. Current literature describing this specific phenomenon is limited in nursing education research. The use of phenomenology as a methodology for this study can help other nursing school administrators, and educators gain a deeper understanding of the experiences of nurse administrators and nurse educators with the overall benefits, challenges, and limitations that may be encountered utilizing a fully-integrated learning intervention practice system and proactive strategic remediation approaches at all levels of a pre-licensure vocational nursing education program, as it relates to student academic performance and learning outcomes.

This chapter discusses in detail the research design, the study's research setting, population, the principal investigator's relationship to study participants, descriptions of study participants, sample method and size, selection of participants, data collection, data analysis, participants' rights, potential limitations of the study, and provides a chapter summary. This study sought to answer the following research question: What are the experiences of nursing school administrators and nurse educators with utilizing a fully integrated learning intervention

system that includes proactive remediation efforts throughout a pre-licensure vocational educational program?

## **Research Design**

## **Qualitative Research Methodology**

According to Tuffour (2017), "Qualitative research is designed to study people's life experiences" (p. 1). This research study used a qualitative research approach as a guide to ensure it stayed focused on the perceptions of participants' lived experiences in their natural setting with the phenomenon of interest (Bloomberg & Volpe, 2012). Using the qualitative approach allowed the researcher to better explore, describe, and explain each participants' lived experiences with the phenomenon of interest. The qualitative approach allowed for a greater understanding of the complexities that involve assigning meaning to the phenomenon of interest (Bloomberg & Volpe, 2012; Chamberlain, 2009; Court, 2013).

More specifically, the use of a descriptive design in this qualitative research study allowed the researcher the opportunity to elicit from study participants their feelings, thoughts, and beliefs on the benefits, challenges, and limitations they experienced utilizing a fully-integrated learning intervention practice system and proactive strategic remediation approaches to address a need in this pre-licensure vocational nursing education program (Bloomberg & Volpe, 2012). The qualitative research design permitted this researcher to utilize an open-ended question format that allows participants to provide open-ended responses that genuinely express opinions about their own lived experiences (Creswell, 2015). Since study participants were not constrained by closed-ended questions and predetermined responses, the researcher could gather rich, pertinent data that allowed greater understanding of the phenomenon investigated (Creswell, 2015).

According to Court (2013) and Creswell (2015), qualitative research allows for a constructionist worldview to be used to obtain a deeper understanding of a phenomenon based on different perceptions and subjective experiences of study participants. Utilizing a qualitative research approach, the researcher understood that there exists no absolute definitive truth investigated concerning this phenomenon of interest (Court, 2013). Court (2013) and de Lima Guimarães et al. (2013) indicated that all truth is subjective and relative based on how individuals in society construct their beliefs, concepts, customs, ideas, traditions, and values. Thus, the evaluating criteria and rigor in this qualitative research study was dependent on its accuracy, credibility, trustworthiness, and the replicability of the study, rather than on the validity and reliability of the study (Hammarberg, Kirkman, & de Lacey, 2015). The accuracy of the data collected in this study depended on whether the information given by participants during in-depth, semi-structured interviews was truthful or accurate as they perceive it to be (Creswell, 2015; de Lima Guimarães et al., 2013).

#### Phenomenology

Phenomenology occurs in two contexts: as a philosophy and as a methodology (Llamas, 2018). German philosopher and mathematician, Edmund Husserl (1859-1938), founded the phenomenology movement and modern phenomenology (Chamberlain, 2009; Tuffour, 2017). Husserl described phenomenology as the way to understand human beings' consciousness and perceptions of lived experiences of a phenomenon in the world in which they live (Chamberlain, 2009; Tuffour, 2017). Phenomenology understands the essence of an experienced phenomenon holistically, and not just focused on understanding individual parts of that experienced phenomenon (Balls, 2009; Moxham & Patterson, 2017). Phenomenology is not concerned with quantifying a lived experienced phenomenon but instead focuses on describing, exploring,

understanding, and interpreting the "what," "why," and "how" of a phenomenon of interest (Chamberlain, 2009; Tuffour, 2017). Husserl proposed that a phenomenon does not exist if it is not experienced by people having lived through it (Chamberlain, 2009).

Husserl encouraged those involved in phenomenological research to maintain a "natural attitude" and objectivity about the phenomenon of interest in everyday life throughout the research process (Applebaum, 2012). Husserl referred to this natural attitude as phenomenological reduction, which can be employed using a two-step technique that consists of bracketing and intuiting (Applebaum, 2012; Balls, 2009; Tuffour, 2017). Bracketing occurs when a researcher consciously suspends or holds back personal knowledge, existential assumptions, biases, and ideas about a phenomenon of interest studied (Balls, 2009; Tuffour, 2017). Intuiting refers to researchers accepting and reporting statements made by participants exactly the way they are presented during interviews (Tuffour, 2017). Phenomenology reduction helps the researcher to set aside entirely "existential questions and shift from existential affirmation or negation to description" of the phenomenon (Applebaum, 2012, para. 5).

#### Phenomenological Study Design

Due to the generic nature of phenomenological research, the phenomenological study design applies to any human and social science research discipline (Tuffour, 2017). As a methodological design used in human scientific qualitative research, a phenomenology is an approach that describes a lived experience from the different perspectives of several participants sharing a specific phenomenon (Tuffour, 2017). A descriptive phenomenological methodology attempts "to identify the essential structure of a phenomenon" (Englander, 2012, p. 23).

To assure that the credibility and dependability of the data collected from study participants were sound, the phenomenological approach to this study was conducted using five

logical sequences. In step one, the researcher determined whether the selected phenomenological study design was the most appropriate qualitative research approach to direct and guide this study based on the research's purpose and research problem. There are two main types of phenomenological design approaches—hermeneutical and transcendental (Hall, Chai, & Albrecht, 2016). The transcendental phenomenology approach was developed by American phenomenologist and psychologist, Clark Moustakas, who adapted this approach from Husserl (Hall et al., 2016). The transcendental phenomenological approach is rigorous and unbiased and focuses on descriptions of a phenomenon provided by participants that produce an essence of the human consciousness, perspectives, and experiences (Hall et al., 2016). Whereas the hermeneutical phenomenology approach, developed by leading German interpretative phenomenologist Martin Heidegger and adapted from Husserl, relies heavily on the researcher to use his or her own lived experiences to provide a detailed account and interpretation of the meaning of other people's lived experiences (Balls, 2009; Hall et al., 2016; Tuffour, 2017).

Based on this study's research purpose and research question, a descriptive phenomenological approach was determined to be the more appropriate research methodology to underpin this research study. The purpose of phenomenology in this study was to describe the essence, nature, and commonalities participants experienced concerning a phenomenon (Balls, 2009; Tuffour, 2017). This study approach allowed the researcher to explore, understand, and obtain detailed descriptions of participants' perceptions and lived experiences with this phenomenon of interest while keeping preconceptions of the phenomenon bracketed and the approach to the topic neutral (Balls, 2009).

In step two, the researcher identified the relevancy of the selected phenomenon to the research question. The phenomenon of interest, in this case, was relevant to the study's research

question. The study explored the perceptions and experiences of nursing school administrators and nurse educators utilizing a fully-integrated learning intervention practice system and proactive remediation efforts in a pre-licensure vocational nursing education program.

Step three is data collection. The researcher uses a series of rigorous and meticulous methods to obtain and conduct data collection and data analysis (Hall et al., 2016). Data collection in phenomenological research is extensive and can include conversations, one-on-one interviews, focus groups, participant observations, and review of documents (i.e., academic documents and reflective journals) (Balls, 2009; Creswell, 2015). In this study, data collection includes obtaining different perspectives of lived experiences from several study participants. Semi-structured interviews were conducted in a location selected by the researcher and study participants. Open-ended questions allow participants to provide additional information that can maximize the amount of data that can be collected and analyzed by the researcher.

This researcher kept a self-reflective journal to consciously identify and acknowledge his interview skills, opinions of the interview, personal assumptions, biases, and notions about the phenomenon of interest during the research process (Balls, 2009; Englander, 2012). This reflective journaling provides research transparency. The process can also help the researcher to keep track of and maintain a systematic procedure of phenomenological reduction throughout the research process (Balls, 2009).

Step four is data analysis. During data analysis, the researcher searched for essences or common themes and patterns from participants' statements that illustrate deeper "clusters of meaning" of the phenomenon of interest as specified from participants' perspectives (Balls, 2009; Chamberlain, 2009). The fifth and final step is the summary. The researcher provides a

meaningful, composite, structural, and textual description of the phenomenon of interest studied from the different perspectives of the participants who lived it.

# Phenomenology and Nursing Education

The use of phenomenology in qualitative research in nursing education is becoming increasingly common. Balls (2009), de Lima Guimarães, de Oliveira Viana, de Matos, Carvalho, and de Almeida Lima Baroni (2013), and Moxham and Patterson (2017) suggested that this may be due to the ontological subjectivity shared by phenomenology, and by nursing as a science, discipline, and profession. Within nursing and nursing education, whether it be patients, students, clinical nurses, nurse educators, or nursing school administrators, the whole person, or the nature of being and becoming, their reality and their experience(s) are valued (Balls, 2009, de Lima Guimarães, et al, 2013; Llamas, 2018; Moxham & Patterson, 2017). The value of phenomenology is that the participants' subjective experience is the center focus enabling a researcher to gain a more in-depth understanding of a common or shared phenomenon (Balls, 2009; Llamas, 2018; Moxham & Patterson, 2017). Phenomenological research gives voice to people who generally go unheard, as well as explicating their unique experiences and their understanding of the world (Moxham & Patterson, 2017).

## Setting

The setting for this descriptive phenomenological research study was a pre-licensure vocational nursing education program in a small, single-campus, private institution of higher learning located in a metropolitan city in the state of Texas. The pre-licensure vocational nursing education program was approved by the Texas Board of Nursing, the Texas Health and Human Services Commission, and the Texas Workforce Commission. This pre-licensure vocational nursing education program is 48 weeks in length. The total annual enrollment of a VN student

cohort is 25 students. The average age of students in the VN program cohort is 32 years; 84% are female, and 16% are male. The ethnic composition of the VN student cohort was 72% Black non-Hispanic, 16% Hispanic, and 12% Asian (VN program's school registrar's office, personal communication, October 8, 2018). The school has five core adjunct nursing faculty (i.e., one full-time and four part-time) and two nursing administrators (i.e., the campus director and the director of nursing education and allied health programs). The school also has ten part-time clinical adjunct nurse educators.

The school is committed to providing educational opportunities and resources to underrepresented, disadvantaged residents in its local and surrounding communities in a greater metropolitan region. This study setting was appropriate because it focused on a phenomenon (i.e., implementation of fully-integrated learning intervention practices with proactive strategic remediation approaches) and a group (i.e., nursing school administrators and educators) who share a common challenge (i.e., nursing students at-risk and at high-risk of failure). The school offers its students an opportunity to obtain access to quality education and training in higher learning that prepares the individual to become a productive member of society. At the start of the 2018-2019 academic school year, for 48-weeks, to improve its underperforming students' academic performance and learning outcomes, this pre-licensure vocational nursing education program developed and implemented a fully-integrated learning intervention practice system with proactive strategic remediation processes at all levels of its nursing program's curriculum. The learning intervention practice system included incorporating into the existing nursing curriculum interactive teaching materials (e.g., simulations, case studies, peer mentorship), and standardized testing and retesting (i.e., HESI and ATI exams). Proactive strategic remediation approaches included, but were not limited to, the use of NCLEX practice questions, concept

mapping, Elsevier Evolve Adaptive Quizzing, and Evolve Adaptive Learning compare-andcontrast questions format tool and HESI standardized exams on specific content areas.

# Recruitment and Participants' Rights

Participant recruitment in qualitative research is essential "to the success of a research study" (Newington & Metcalfe, 2014, p. 1). Recruitment in a qualitative research study refers to the process a researcher utilizes to identify, attract, and select potential eligible participants based on the research study's purpose, inclusion criteria, and the potential participant's level of interest in a proposed study (Creswell, 2015; Newington & Metcalfe, 2014). Research studies that involve the recruitment of potential human subject participants require ethical approval by the Institutional Review Board (IRB) before the implementation of the proposed study (Bloomberg & Volpe, 2012; Creswell, 2015). The researcher and their research study must comply with specific ethical and federal regulations, guidelines that ensure potential study participants' rights to autonomy, dignity, privacy, and the confidentiality of any data obtained from participants for a study to be respected and protected (Creswell, 2015). This process creates the basis for study participants' informed consent process (Creswell, 2015). Throughout the research process, researchers must take appropriate steps to comply with the key fundamental ethical conduct of research (Bloomberg & Volpe, 2012; Creswell, 2015). These include: (a) ensuring that study participation is voluntary, (b) equitable selection of study participants, (c) providing a description of the study that is accurate and clear, (d) ensuring that the presentation of the study remains unbiased, and (e) disclosing and minimizing any potential risks or undue influence for study participants (Bloomberg & Volpe, 2012; Creswell, 2015).

### Recruitment

Before any recruitment of study participants or data collection from the study participants, approval was obtained from the University of New England's IRB for the protection of human subjects (Appendix A). Approval was obtained as well from the pre-licensure VN programs' academic institution, where this study occurred (Appendix C). The principal investigator of this study was employed as the director of nursing education and allied health programs in the study setting. Therefore, the researcher had access to the school's pool of prospective participants, nursing school administrators, and nursing educators for this study. This study's principal investigator personally presented a letter of intent (Appendix B) to the prelicensure VN programs' advisory committee to conduct this research study at the school's prelicensure vocational nursing education program. This letter of intent provided a systematic and comprehensive detailed outline of this study's problem statement, its purpose, research question, research procedures, its anticipated risk and benefits, criteria for participant selection, and intent to provide its prospective participants an opportunity to ask questions.

The researcher started the initial recruitment process with an informational meeting with the school's nursing school administrators and nursing adjunct faculty. The researcher provided a brief description of the research project. The prospective study participants received details of the voluntary study, informed consent, and study participation rights. After the initial group meeting, an email was sent out to prospective study participants inviting them to participate in this study's semi-structured open-ended, in-depth interviews. The email invitation included a detailed description of the study, the study's purpose and procedures, a complete list of the inclusion criteria, an explanation of the voluntary nature of the study and informed consent, an

informed consent form, and study participation rights (Appendix D). The email sent to prospective study participants included the researcher's contact information.

Prospective participants who concluded that they were not eligible to participate in the study or chose not to participate were thanked in the initial email letter for their consideration. Prospective participants who were interested in voluntarily participating in the study were invited to contact the researcher via the researcher's email. The researcher emailed each interested, eligible, prospective study participant a copy of the informed consent form. Study participants were to complete and sign the consent form and return it to the researcher before participating in the study (Appendix F). All contact between the researcher and study participants was conducted via email, and during face-to-face, one-on-one interviews. The researcher continued to keep in touch with all eligible participants who emailed interest in the study until participation saturation was realized.

## Participants' Rights

The email that each interested prospective eligible participant received included an informed consent form providing a detailed description of the study, study procedures, inclusion criteria, and an explanation of the voluntary nature of the study. Prospective participants had an opportunity to make an informed decision about whether they choose to give their valid voluntary consent (Appendix B, Appendix D). Study participants were informed of their rights as participants within this research study. Participation in this study was voluntary. Participants had the option to withdraw from this study at any time. Study participants could identify the individual responsible for the research (Department of Health, Education, and Welfare, 1979). A consent form had to be signed by each prospective participant signifying his or her voluntary informed consent to participate in this research study. Each participant was required to provide

the researcher with their signed consent form before staring their interview for the study. To protect participants from any risk of coercion all prospective participants were informed in writing that participation in this research study was entirely voluntary. All prospective participants were informed in writing that the decision about whether to participate in the research study will, in no way, affected his or her advisory committee membership or employment.

Throughout this research study, to preserve and guarantee the confidentiality of all participants' data, no identifying characteristics of any person(s) were displayed. Participants were assigned pseudonyms. Participants were informed that a copy of their interview transcripts would be emailed to them for review and to check the accuracy of the data transcribed. Participants had the option to schedule a meeting with the researcher to verify correctness, clarify discrepancies, or request that a response(s) is(are) removed from their interview transcript entirely.

Every effort was made by the researcher to keep the study participants' interview responses and correspondences private, secure, and safe. As per the University of New England's IRB protocol, all collected data from this study, written and audio materials, will be kept for three years at the principal investigator's home in a locked cabinet, then destroyed. This researcher scheduled monthly consultations with the school's advisory committee members until the end of the study to keep its members updated on the progress of the research until the study was completed.

# **Sample Method**

This study used a purposeful sampling strategy. Purposeful sampling is a non-probability technique used by the researcher to subjectively select a population-based on predetermined

characteristics to provide more in-depth insight and understanding of a phenomenon studied (Bloomberg & Volpe, 2012). This sampling method facilitates a "homogenous sample of [study] participants that have all experienced the phenomenon" (Hall et al., 2016, p. 137). In a qualitative phenomenological study design, the target population for a study is selected from the sampling unit or phenomenon studied (Creswell, 2015). In this case, the sample is purposeful because the target population and all the study participants are employed by the school where the integrated learning intervention practice system and the remediation strategies were implemented (Bloomberg & Volpe, 2012). The target population for this study was nursing school administrators and nurse educators from the selected VN program who met the study's specific participant inclusion criteria.

The inclusion criteria for this study are specific. Eligible participants for this study must:

- Be a nursing school administrator or a nurse educator who currently works and teaches at the selected pre-licensure vocational nursing education program;
- Hold a state-recognized active RN license where this study will take place;
- Hold a bachelor's of science in nursing degree or higher;
- Actively participate in the development and or the implementation of the fully-integrated learning intervention practice system at the selected pre-licensure VN program during the 2018-2019 academic school year;
- Have at least two or more years of experience of teaching in nursing education;
- Have at least two years of experience with at-risk and high-risk students in nursing education, and;
- Have at least one year of experience actively utilizing student learning intervention practices and remediation in nursing programs and nursing curricula.

### Sample Size

The sample size for this study was projected to be approximately five to ten study participants. Since the purpose of qualitative research studies was not to generalize, "there is no standard for a minimum number of [study] participants" (Hall et al., 2016, p. 137). However, Englander (2012) recommended that the sample size of a qualitative phenomenological human scientific research study should be more than three participants. Englander (2012) explained that a sample size greater than three participants would permit the researcher to obtain the rich data required about the phenomenon to "identify the essential structure of a phenomenon" (pp. 21, 23). Ultimately, the recruitment of study participants was expected to continue until saturation was achieved (Creswell, 2015).

### Principal Investigator's Relationship to Study Participants and Research Site

The principal investigator of this study was the current director of nursing and allied health program of the pre-licensure vocational nursing education program where the research study took place. The researcher of this study is a licensed RN with a master's degree in nursing (MSN) and healthcare service administration in the state of employment and practice. The principal investigator has an academic, professional, and non-supervisory relationship with four of the prospective non-faculty participants asked to be content expert interview question reviewers for this voluntary research study. Within the VN program, the principal investigator has an academic, professional, and non-supervisory relationship with the school's adjunct nursing faculty, who were prospective study participants for this research study. The principal investigator had an academic and professional relationship with the vocational nursing students in the nursing program. This researcher was actively involved in the development and implementation of the fully-integrated learning intervention practice system and the development

of the proactive strategic remediation approach protocols and procedures implemented throughout the pre-licensure VN program.

# **Description of Participants**

Nursing school administrators. The nursing school has two administrators, a campus director and a director of nursing education and allied health programs. The two nursing school administrators have multiple years of experience in their respective fields of expertise in the professional and clinical practice of nursing and higher nursing education. Both nursing school administrators were licensed RNs in the state of Texas and hold BSNs. One of the nursing school administrators holds an MSN degree and a Master's of Science in Healthcare Services Administration degree.

Nursing adjunct faculty. The nursing school had five core adjunct nursing faculty (i.e., one full-time and four part-time) and three clinical adjunct nursing faculty at the time of the study. All eight-nursing faculty members hold an active RN license in the state of Texas and hold BSN degrees. Three of the five core adjunct nursing faculty members hold MSN degrees. One of the five core faculty members holds a master's in public health. One of the core adjunct nursing faculty was a certified nurse practitioner. One nursing faculty member holds a Doctor of Philosophy in health sciences.

Content expert interview questionnaire reviewer participants. Four non-faculty members were asked to review the contents of the study interview questions to check their validity and reliability. These non-faculty members have had at least two years of vocational nursing education teaching experience with prior experience in student learning intervention and remediation practices and approaches. These non-faculty members were members of the local community who were not directly involved with the vocational nursing education program, its

students, or the academic institution's daily operations. Two members were college professors of nursing at another nursing education program. They both were RNs who hold BSN, MSN, and doctorate of nursing practice degrees. Two other non-faculty members were mid-level nursing managers who worked at a university hospital and a long-term care facility in the local area. They each were RNs who hold BSN and MSN degrees.

#### **Data Collection**

In qualitative phenomenological research, there are multiple forms of data collection approaches that can be used to gather extensive data on a phenomenon about a group's shared experiences. These approaches include unstructured or semi-structured interviews, tape-recording, observations, focus groups, visual and audio materials, and review of documents related to the context of the phenomenon (Balls, 2009; Creswell, 2015). The data collection approach considered most appropriate for this study was the following: a one-on-one, semi-structured interview protocol with open-ended questions in an open-ended response-style format, audio recordings, and review of documents related to the context of the phenomenon (Appendix F).

### **Semi-structured Interviews**

In qualitative human scientific research, the interview has become the primary procedure to gather information (Englander, 2012). In qualitative research, the researcher, as an interviewer, acts as the research instrument that collects, reviews, and analyzes data in this study (Creswell, 2015). The use of semi-structured, open-ended interview questions provided participants with an opportunity and the flexibility to give detailed and meaningful open-ended responses to questions based on their perceptions and "lived experiences" while ensuring that specific topics are covered (Creswell, 2015).

During the interview process, the researcher had an opportunity to cross-check participants' responses, in real-time, by asking probing and follow-up questions to clarify and elaborate on given responses in a more in-depth manner (Balls, 2009; Creswell, 2015).

Throughout this interview process, participants were encouraged to ask for clarification on the interview question(s) being asked (Balls, 2009). There exist no explicit phenomenological criteria to conduct interviews (Englander (2012). That said, the open-ended interview question format allows participants to provide new information related to the phenomenon not explicitly addressed by the researchers (Englander, 2012).

Before participating in this study, all eligible study participants who agreed to participate in this study were asked to submit to the study's principal investigator a signed statement of informed consent form approved by the University of New England IRB (Appendix D). The researcher contacted each study participant via email to schedule a convenient time and place for a face-to-face, one-on-one interview. Before starting each interview, the researcher informed study participants of the purpose of the study, participants' rights, the length of the interview process, how the information from the interview would be used, and "the availability of a summary of the study when the research was completed" (Creswell, 2015, p. 220).

Each study participant's interview took approximately 30 minutes to one hour to complete. The researcher, the principal investigator conducted all study interviews. The interview protocol consisted of approximately 15 semi-structured, open-ended questions generated by the study's principal investigator (Appendix G). The study's semi-structured interview questions were designed to address the research question and to guide the study toward a point of data saturation (Balls, 2009). Three demographic questions were asked: current employment status and role, level of education, and years of practice in nursing education. The

following topics were addressed to gather data about study participants' perceptions and lived experiences with the following: (a) the benefits and challenges of utilizing a fully-integrated learning intervention practice system, and the proactive remediation process utilized in the nursing curriculum; (b) their definition of an at-risk and high-risk student and the methods used to identify these students within a course; (c) educators were asked to provide descriptions of their teaching styles; (d) the effectiveness, or lack thereof, of learning intervention and remediation efforts on student academic performances and learning outcomes; and (e) their past and current opinions of the institution's VN programs' curriculum. At the end of each interview, the researcher thanked each participant for participating in this voluntary study (Balls, 2009).

### **Audiotape Recordings**

All interviews were audio-recorded for later transcription and analysis. Before starting the study interviews, all participants were informed that study interviews would be tape-recorded. Participants were asked if they felt comfortable being recorded. Participants had the option to decline being recorded during interviews. If a participant declined to be recorded during the interview process, the researcher wrote out all participants' answers to interview questions on the interview questionnaire. Two digital audio-recording devices were purchased for recording all study interviews to ensure accurate recording of interview conversations. The researcher took brief notes during the interviews. However, audiotaping each interview conversation was the primary mode of data collection. Audiotaping interviews enabled the researcher to manage the time and flow of the interview process better while maintaining a repertoire of attentiveness and openness with participants. Audiotaping interviews also helps the researcher reduce "the difficulty of asking questions and writing down answers at the same time" (Creswell, 2015, p. 220), except for the case in which the participant refused to be recorded. The

physical setting chosen to conduct the interviews was quiet, suitable, and free from distractions to ensure the effectiveness and efficiency of collecting data from audiotaping (Balls, 2009; Creswell, 2015).

Following each interview, the researcher transcribed each audio recording verbatim within 48 hours. All data collected from the audiotapes, research journals, and review documents during this study was scrutinized by the researcher to identify emerging themes. All words, sounds uttered, and facial expressions made during the interview were transcribed to capture the details of an interview (Balls, 2009; Creswell, 2015). Interview questions and transcripts have no data identifiers. On each interview transcript, the interview questions and the researcher's (interviewer's) comments were identified in italics to be distinct from the interviewee's (participant's) responses (Creswell, 2015). To protect the identity of each study participant, participants' interview transcripts were assigned the following pseudonyms: Participant A, Participant B, Participant C, Participant D, Participant E, and Participant F. This systematic participant lettering system provides the researcher with a way to keep track of and to easily retrieve a study participant's completed study interview transcript to review its contents.

Each study participant received an emailed copy of their interview transcripts to review and to ensure accuracy. Participants had the option to contact the researcher to verify correctness, clarify discrepancies, revise their responses, or to request that a response(s) be removed from their interview transcripts entirely; this was member checking (Creswell, 2015). All interview audio files will be kept at the principal investigator's home in a locked cabinet for three years, then erased.

#### **Documentation Reviews**

To further describe nursing school administrators and nurse educators' experiences with the phenomenon of interest and the nursing education program, participants were asked to bring with them to interviews academic materials related to the context of this phenomenon studied. Each participant was asked to bring his or her course syllabi to be reviewed to obtain information on the following: course organization, academic materials provided to students, student monitoring and assessment methods, learning intervention practices, remediation protocols, and the types of resources and support services available to students in each nursing course to ensure that minimum academic progression standards and learning outcomes were met. All identifiable school and student information were redacted. The researcher has conducted extensive research to be familiar with the phenomenological research methodology and bracketed biases to ensure data accuracy before starting the data collection and data analysis process (Hall et al., 2016). The researcher utilized bracketing to consciously set aside previous assumptions and preconceptions based on personal knowledge, experiences, prejudices, and biases concerning the phenomenon of interest. Using phenomenological reduction, this researcher worked to stay actively objective and carefully focused on examining a phenomenon based on the understanding and description of a participant's lived experience with the phenomenon of interest (Tuffour, 2017). The researcher continued to keep in touch with eligible participants who have not scheduled or completed their face-to-face interviews until participation saturation was reached.

### **Field Tests**

Before starting the study, the interview questions were field-tested. Four content expert reviewers, with years of experience with learning intervention practices and the use of remediation strategies in nursing education, were asked to review 15 sample interview questions

to determine whether they could help answer the research question. Corrections were made to the study's interview questions based on the content expert reviewers' suggestions.

### **Data Analysis**

The modified van Kaam data analysis model adapted from Moustakas was used to analyze data from this phenomenological research study. The modified van Kaam data analysis uses a nine-step process to analyze and provide complex meaning to the qualitative phenomenological data collected from individual interviews (Statistics Solution, 2019; Sullivan & Bhattacharya, 2017). These nine steps included: (a) horizontalization, (b) reduction and elimination, (c) clustering and thematizing the invariant constituents, (d) checking the themes against the data, (e) creating individual textural descriptions, (f) creating individual structural descriptions, (g) creating composite textural descriptions, (h) creating composite structural descriptions, and (i) creating a composite structural-textural description of the phenomenon being studied (Statistics Solutions, 2017; Sullivan & Bhattacharya, 2017).

Step one is "horizontalization" (Sullivan & Bhattacharya, 2017, p. 765). In this step, all the data transcribed from participants' interviews were treated the same. The researcher created a list and organized the transcribed data in a manner that provided structural descriptive meaning. A combination of preliminary color coding and grouping of frequently used phrases was used to label the data in a manner that was relevant to the phenomenon studied (Sullivan & Bhattacharya, 2017).

Step two involved "reduction and elimination" (Sullivan & Bhattacharya, 2017, p. 764). In this step, two questions were asked to determine if the transcribed quotes of participants' lived experiences of the phenomenon were considered invariant constituents or meaning units.

Meaning units or "relevant" quotes are a set of phrases or sentences from the transcribed data

that provide direct insight into the phenomenon studied (Malterud, 2012). Throughout this process, data were reduced to meaningful units, or reduced or eliminated due to redundancies, thus, "ridding the study of unnecessary codes" (Sullivan & Bhattacharya, 2017, p. 764). The first question was: "Is this quote important to the participant's lived experience of the phenomenon?" (Statistics Solution, 2019, p. 764). The second question was: "Can this quote be reduced to its latent meaning?" (Statistics Solution, 2019, para. 3). An answer of no to either question resulted in the elimination of a quote(s) (Statistics Solutions, 2019).

The third step consisted of "clustering and thematizing the invariant constituents" (Sullivan & Bhattacharya, 2017, p. 764). Meaning units that passed the two-question test were subjected to exploration and grouping based on latent meaning (Statistics Solutions, 2019). Latent meaning occurs when similar code groups are created to show themes of each participant's experiences as it relates to the shared phenomenon (Statistics Solutions, 2019; Sullivan & Bhattacharya, 2017).

In step four, "final identification of the invariants constituents and themes" takes place (Sullivan & Bhattacharya, 2017, p. 764) by "checking the themes against the data" (Statistics Solutions, 2019, para. 6). The generated themes were examined against the dataset so that each participant's lived experiences were represented (Statistics Solutions, 2019). The fifth step consisted of "constructing individual textural descriptions" (Sullivan & Bhattacharya, 2017, p. 764). Individual textural descriptions were generated for each participant using examples of verbatim quotes from the transcribed interview transcripts (Sullivan & Bhattacharya, 2017).

Step six involved, "constructing individual structural descriptions" (Sullivan & Bhattacharya, 2017, p. 764). In this step, individual textural descriptions and the imagination variation process were used. Imagination variation is the process used to find the possible

meaning of a lived experience from different perspectives to essentialize the structure of the phenomenon (Teräs, 2016). Individual structural descriptions were generated for each participant. The researcher examined and provided a description of each participant's stated lived experiences related to an emotional, social, and cultural context (Statistics Solutions, 2019).

In step seven, the composite textural descriptions were constructed (Sullivan & Bhattacharya, 2017). In this step, the researcher created a table that outlined the reoccurring and prominent themes from each participant. The table was organized into four columns: questions, condensed codes, main categories, and central themes from participants' transcribed interviews of the phenomenon of interest (Statistics Solutions, 2019) (See Table 3). The researcher individually wrote down each theme that corresponded to a participant on the table. Each participant's transcribed responses to a question were written on the composite description table.

Step eight involved, "creating composite structural descriptions" (Statistics Solutions, 2019, para. 10). The researcher used a narrative discussion format to summarize findings and central themes found in participants' lived experiences from the study's data analysis (Statistics Solutions, 2019). This enables the researcher to find a plausible explanation for data findings that addressed the purpose of the study and research question (Creswell, 2015; O'Connor & Gibson, 2003).

Step nine presents "a composite structural-textured description" (Statistics Solutions, 2019, para. 11). As the study concludes, the researcher provides a summary of the study's key findings (Creswell, 2015). The researcher presents a meaningful, comprehensive structural, and textual description of the participants' lived experiences. The composite description presents the essence of the study participants' lived experiences of the phenomenon studied (Statistics Solutions, 2019).

#### **Data Verification**

In qualitative research, the accuracy, trustworthiness, and authenticity of a study's data findings are extremely important (Creswell, 2015). The trustworthiness of a qualitative research study is established by its credibility, transferability, and dependability (Creswell, 2015). Qualitative researchers utilize different strategies to validate procedures such as external auditing, member checking, and triangulation to check the credibility or accuracy of data findings and provide an accurate description of all data collected and analyzed in their study (Creswell, 2015).

### Credibility

Credibility in qualitative research is comparable to quantitative internal validity (Creswell, 2015). The validity of data findings is a critical component in qualitative research (Bloomberg & Volpe, 2012). The credibility of this study was established through different strategies to validate the accuracy and credibility of the study's findings and interpretations, triangulation, and member checking (Creswell, 2015, p. 258). Triangulation occurs when the researcher uses corroborating evidence through the review of academic and personal reflective documents brought by participants related to the phenomenon being studied to cross-check study participants' responses to provide an exact description of participant's interview responses (Bloomberg & Volpe, 2012).

Member checking (peer review) occurred with study participants. Study participants were sent a copy of their transcribed interview transcripts. Participants were asked to review their interview transcripts to check for accuracy and to clarify discrepancies. Within the study, the researcher sought to acknowledge biases, assumptions, and limitations within the study's methodology as another approach to establish the credibility of this study (Creswell, 2015).

## **Transferability**

In qualitative research, transferability is comparable to the quantitative research study's external validity (Creswell, 2015). Transferability refers to a researcher "establishing the context" of a study by providing a detailed description of all its procedures that can be applied by others in similar contexts and settings in real life (Creswell, 2015, p. 258). The researcher in this study stated all processes, procedures, and decisions made throughout this study regarding data collection, data analysis, and the exact description of the study's data findings (Bloomberg & Volpe, 2012). The transferability of this study is dependent on the audience's ability to come to the same conclusion as the researcher's description of the data, based on the defining patterns that emerge from the data analysis (Creswell, 2015).

### **Dependability**

The dependability of a qualitative research study is comparable to the reliability of a quantitative research study (Creswell, 2015). A study's dependability refers to a researcher's ability to provide detailed documentation of all the processes and procedures of the study. This study utilized the term *dependability* to describe the consistency of the information analyzed from the data collected (Creswell, 2015).

### **Potential Limitations**

The researcher identified several possible limitations of this qualitative study. A limitation of this phenomenological qualitative study was its lack of generalizability, recall bias from study participants, and researcher-induced bias (bracketing bias) during the data collection and analysis process (Debois, 2016; Halls et al., 2016; Moxham & Patterson, 2017).

### **Lack of Generalizability and Accuracy**

A limitation of this qualitative study was the inability to generalize the perceptions or lived experiences of a small group of people to a larger population. It is challenging in a qualitative study to establish methodological rigor, researcher subjectivity, credibility, and transferability, and dependability (Balls, 2009; Moxham & Patterson, 2017; Willis, 2014). The data collected from a phenomenological study are often difficult for researchers to interpret. Since phenomenological data are based on participants' perceptions and lived experiences of a phenomenon, these data cannot be subjected to statistical analysis, cannot be validated, are not reliable, and cannot be generalized (Chamberlain, 2009; Halls et al., 2016; Willis, 2014). Another possible limitation of this study was that its findings could not be generalized, as not all vocational nursing programs or other bachelor's of science or ADN programs may have implemented an integrated learning intervention practice with proactive strategic remediation approaches in their academic programs (Willis, 2014). Also, this study could not predict that an integrated learning intervention practice and strategic remediation approach within a nursing curriculum could lead to a first-time increase in NCLEX-PN passing rates for vocational nursing graduates (Cherkis & Rosciano, 2015; Johnson et al., 2017; McGann & Thompson, 2008; Pennington & Spurlock, 2010; Stout & Haidemenos, 2016).

#### **Recall Bias**

Recall bias was a limitation of this qualitative research study. Recall bias occurs when a study participant, for various reasons, intentionally or unintentionally answers open-ended interview questions inaccurately because they are unable to recall past events or experiences regarding a phenomenon of interest (Debois, 2016). These types of erroneous responses can skew the collected data. Participants' responses to interview questions were solely an

individual's perceptions, experiences, feelings, and beliefs about the questions asked. The researcher did not control participants' responses to research questions (Debois, 2016).

#### Researcher-induced Bias

Researcher-induced bias was another limitation of this phenomenological qualitative study. The researcher's subjectivity is an issue when the researcher is familiar with the phenomenon of interest and study participants. It can influence the collection, analysis, and description of the data (Moxham & Patterson, 2017; Willis, 2014). In this case, this researcher was an employee at the research site as the director of nursing education and allied health programs. The researcher of this study had an academic, professional, and non-supervisory relationship with the prospective study participants and was acquainted with the study participants. However, the researcher made every attempt to be objective by applying phenomenological reduction throughout the process of this research study by using bracketing and intuition (Applebaum, 2012).

### Summary

Chapter 3 presented the methodology of this research study. The descriptive phenomenological study design was selected as the appropriate research design to explore and gain insight into the experiences of nursing school administrators and nurse educators' experiences using a fully-integrated learning intervention practice system with a more proactive strategic remediation approach at all levels of a pre-licensure vocational nursing education program. As a philosophy and a methodology, phenomenology helps to guide this qualitative approach, enabling this research to stay focused on describing the essence, nature, and commonalities of the participants who experienced a phenomenon studied (Balls, 2009; Tuffour, 2017). The chapter presented the research setting and participant selection process, purposeful

sampling, which aligned with the study's purpose and research question to provide greater insight and a more in-depth understanding of the phenomenon studied (Bloomberg & Volpe, 2012). Nursing school administrators and nurse educators were selected from a pre-licensure vocational nursing education program located in a small, single-campus of a private institution of higher learning located in a metropolitan city in the state of Texas.

Chapter 3 presented the data collection method of this study. Face-to-face interviews were the selected method to ask study participants semi-structured, open-ended formatted style questions generated by the researcher. Data collection for this study included audiotape recordings and a review of documents related to the context of the phenomenon (Appendix F). Data verification of the study was presented in detail through triangulation and member checking. In this chapter, a detailed description of the nine-step modified van Kaam data analysis approach was provided to demonstrate how the phenomenological qualitative data obtained from individual interviews would be analyzed (Sullivan & Bhattacharya, 2017). Throughout the data collection and analysis process, this researcher used bracketing and intuiting techniques to ensure the accuracy and validity of the study (Applebaum, 2012). This chapter discussed the written approval from both the University of New England's IRB for the Protection of Human Subjects (Appendix A) and the academic institution where the research study took place (Appendix B). A crucial requirement to conduct this research study. Study participants received a detailed description and explanation of the voluntary study's purpose, procedures, and participants' rights. This research study was entirely voluntary. Only participants who provide written, informed consent were allowed to participate in this study.

Chapter 3 presented the potential limitations of the study. They included a lack of generalizability of the data findings due to small sample size, recall bias, and researcher-induced

bias. Recall bias occurs when participants are unable to recollect past experiences accurately (Debois, 2016). Researcher-induced bias refers to a researcher's subjectivity to influence the collection, analysis, and description of the data (Willis, 2014). These biases could lead to problems with methodological rigor, researcher subjectivity, construct and credibility, and transferability of the study (Willis, 2014).

Chapter 4 presents the results of the study. The chapter provides the data analysis and a description of the qualitative data collected and a chapter summary. Chapter 5 provides the conclusion of the study. The chapter describes the study's findings and discusses the implications of this study's findings for practice. Chapter 5 provides recommendations for future research on this topic and a chapter summary.

#### **CHAPTER 4**

#### **RESULTS**

The purpose of this qualitative phenomenological study was to explore and gain a better understanding of the lived experiences of nursing school administrators' and nurse educators' utilizing an integrated learning intervention practice system throughout a pre-licensure vocational nursing education program in a metropolitan city in Texas. The focus of this study was to determine whether an integrated learning intervention practice system that includes proactive strategic remediation approaches can provide significant differences in students' academic performance and learning outcomes. The study focused on one research question to explore the phenomenon. What are the experiences of nursing school administrators and nurse educators with utilizing a fully integrated learning intervention system that includes proactive remediation efforts throughout a pre-licensure vocational educational program?

This chapter provides a detailed description of the recruitment process, the data collection process, the data analysis process, the results, and findings of the research and provides a chapter summary. The qualitative methodology used to explore and understand the phenomenon studied included audio-taped recorded face-to-face, and one-on-one interviews with semi-structured, open-ended interview questions. Data was gathered from interviews of six nonsupervisory employees actively involved in the development and or the implementation of the integrated learning intervention practice system and the proactive strategic remediation efforts in the nursing program/curricula during the 2018-2019 academic school year at the chosen VN program. Supporting documents related to the phenomenon studied brought by participants during individual interviews were also reviewed.

Chapter 4 presents a detailed description of the data analysis. The data presented were

manually analyzed using the modified van Kaam data analysis model adapted from Moustakas. This model helped to provide meaning to the qualitative phenomenological data collected from individual interviews (Statistics Solution, 2019; Sullivan & Bhattacharya, 2017). The chapter discusses three main categories and eleven central themes emerged from this data analysis. Chapter 4 concludes with a summary of the results and findings of the research.

## Description of the Sample, Recruitment, and Saturation

Recruitment. The recruitment process lasted for approximately four weeks. The researcher was the director of nursing education and allied health programs at the selected prelicensure VN education program study setting during the 2018-2019 academic school year. Therefore, the researcher was familiar with and had access to the school's pool of prospective nursing school administrators, and nursing educator participants involved with the development and implementation of the fully-integrated learning intervention practice system and the proactive strategic remediation efforts during the VN program's 2018-2019 academic school year.

Purposive sampling was used to select study participants. The specific target population and all the study participants were employed by the school that implemented the integrated learning intervention practice system, including the proactive strategic remediation approaches (Bloomberg & Volpe, 2012). Eligible study participants were nursing school administrators and nurse educators who currently worked and taught at the VN program chosen at the research site. Each study participant was either involved in the development and/or the implementation of the fully-integrated learning intervention practice system at the selected VN program during the 2018-2019 academic school year. Study participants held a state-recognized active RN license and had a bachelor's of science in nursing degree or higher. All participants had more than two

years' experience of teaching in nursing education. Selected study participants had more than two years' experience working with nursing students at-risk and high-risk for failure. All eligible participants had at least one year of experience actively utilizing student learning intervention practices and remediation in nursing programs and nursing curricula.

Study participants selected were those who could appropriately answer the study's research question. Ten individuals responded to the email request for in-depth interviews.

Following the initial email contact, one respondent no longer wanted to participate in the study. They were no longer employees at the academic institution. Thus, they did not meet the participant inclusion criteria. Three of the respondents did not meet the inclusion criteria. They did not have at least two or more years of teaching experience in nursing education in a vocational nursing program. Also, the three respondents did not have at least two or more years of experience of teaching students at-risk and at-high risk for failure in nursing education. The recruitment of study participants continued until saturation was achieved (Creswell, 2015). Six participants accepted and completed the interview process.

Participant Descriptions. Two of the study participants were employed full-time, and four nursing faculty were part-time employees at the selected VN program. Demographically, participants' ages ranged from 32 to 65 years old. Four of the study participants were female, and two were male. Two participants were African-American, two were Asian, and two were Caucasian. They have worked in the nursing profession between 5 to 30 years, with the majority having between 4 to 15 years of teaching experience in nursing education. Study participants had between 4 to 15 years of teaching experience working with nursing students who were at-risk and at high-risk of failure. Table 1 shows pertinent demographic data obtained from study participants. Study participants' demographic characteristics data collected included gender,

race/ethnicity, highest degree earned, the number of years in the nursing profession, years teaching in nursing education, and years of experience teaching students at-risk and at high-risk of failure.

Table 1
Study Participants Demographic Characteristics

Participants	Gender	Race/ Ethnicity	Degrees Earned	#Years in Nursing	#Years Taught in Nursing Education	#Years Taught Students At- risk /High-risk for Failure
A	Male	White	MSN/MSHA	5	4	4
В	Female	Black	BSN/MSN	10	5	5
С	Female	Black	PhD/MPH/BSN	20	10	10
D	Female	White	BSN	30	15	15
Е	Male	Asian	BSN/MSN	14	7	7
F	Female	Asian	BSN/MSN	9	7	7

<sup>\*</sup>Bachelors of Science in Nursing (BSN), Masters of Science in Nursing (MSN), Masters of Science in Healthcare Administration (MSHSA), Masters in Public Health (MPH), Doctor of Philosophy (PhD)

### **Data Collection Process**

Interview dates, times, and the location were scheduled between the researcher and study participants using email, at the convenience of each participant. All six interviews were conducted face-to-face in the VN program's main conference room, after business work hours. It was a location that was easily accessible, convenient, and comfortable for participants. The area provided study participants complete privacy and confidentiality as it was quiet and reduced any possibility of interruptions during interviews and recording process. The familiar location allowed participants to focus on the interview questions asked. The researcher thanked each participant at the beginning of each meeting for volunteering to participate in this study (Balls, 2009). Before each interview and journaling process began the researcher reviewed with participants the purpose of the study, the risks and benefits of the study, the duration of the

interview process, participants' rights, usage of information collected from interviews, and "the availability of a summary of the study when the research is complete" (Creswell, 2015, p. 220).

The informed consent form and confidentiality process were reviewed as well with participants before the start of each interview. Each participant was encouraged to ask any questions about the consent form. The researcher informed each participant that he or she had the option to withdraw from the study at any time. Before the start of each interview, participants were asked to sign the consent form approved by the UNE IRB and provide it to the researcher (Appendix D). Participants were assigned pseudonyms to ensure each participant's identity was protected, and to guarantee his/her data would be kept confidential throughout the study.

Assigned aliases included: Participant A, Participant B, Participant C, Participant D, Participant E, and Participant F. Before the start of each interview participants were informed of the researcher's intent to audio-tape record their conversations. Each participant had the option to accept or decline being recorded during interviews. All six participants verbally agreed to have their meetings audio-recorded.

Face-to-face, one-on-one audio-taped recording of interviews was the primary mode of data collection, supplemented with manual notes taken in a separate research journal by the researcher (Englander, 2012). The study's 15 semi-structured, open-ended interview questions were used as an interview guideline to address the research question and explore the meaning of each participant's lived experiences, and perceptions of the phenomenon studied (Appendix G). There were no right or wrong answers. Participants had the option to answer all, some, or none of the interview questions asked. The open-ended interview questioning process was conducted in a question and answer format. Participants provided a better understanding of their experiences, utilizing an integrated learning intervention practice system with proactive strategic

remediation approaches within a nursing program (Englander, 2012). An attempt to cross-check participants' responses, in real-time, probing, and follow-up questions asked of participants that allowed participants further clarify and or elaborate on given answers more extensively (Creswell, 2015).

Triangulation occurred through the review of academic documents (such as registrar's 2013/14 to 2018/19 academic years student enrollment rates, drop/withdrawal rates, the attrition rate, cohort graduation rate, NCLEX 1st time passing rates, and standardized VN nursing program syllabus and the VN program's 2018 catalog) brought by the nursing school administrator study participant during their interview. The nurse educator study participants brought with them to their meeting a copy of their standardized VN nursing program syllabus for review. These documents were corroborating evidence to cross-check study participants' accurate description of interview responses as they related to the phenomenon under investigation (Bloomberg & Volpe, 2012). The interview process was interactive and engaging. Participants were encouraged to ask for clarification of interview questions they did not understand to ensure the accuracy of their responses (Balls, 2009). At the end of each interview, the researcher thanked participants for participating in this voluntary study (Balls, 2009).

The researcher conducted interviews throughout May, 2019. During the four-week interview period, scheduling conflicts resulted in rescheduling two interview sessions. The duration of the interviews ranged from 25 minutes to 45 minutes in length. The amount of information each participant wanted to share determined the duration of each interview session. Following each interview, each audio-taped recording was manually transcribed verbatim in Word document, without the assistance of a computer transcription software. Participants received a copy of their signed consent form via emailed. Participants received a copy of their

interview transcripts to review as well. Member checking occurred when participants reviewed their transcribed interview transcript to verify the accuracy of or revise their interview responses. Participants had the opportunity to clarify any discrepancies that did not validate their lived experiences with the studied phenomenon (Creswell, 2015). None of the six participants requested a revision of any portion of his or her interview transcript.

All data collected from audiotapes, research journals, and review documents during this study were manually scrutinized to identify emerging themes. The researcher kept a research journal. During interview sessions, the researcher transcribed words, tone, mood, sounds uttered, and facial expressions made by participants describing their lived experiences with the phenomenon studied (Balls, 2009; Creswell, 2015). The data collected from the research journal provided further insight into participants' lived experiences and perspectives with the phenomenon of study. All consent forms, interview audio files, and the researcher's journal are at the principal investigator's home in a locked cabinet. All electronic correspondences and documents related to this research study are in a computer file named explicitly for this study in a password-protected computer at the principal investigator's home office.

### **Data Analysis Process**

The researcher applied bracketing (or epoché) before the start of and throughout the data collection process and data analysis process. Bracketing ensures that the researcher's previous personal knowledge, assumptions, biases, and or ideas were consciously suspended or withheld regarding the phenomenon being studied (Balls, 2009; Tuffour, 2017). Participants' interview transcripts were manually transcribed verbatim within a 48 to 72-hour period after each interview session to maintain the reliability and credibility of the research study. Following member checking, each of the interview transcripts was ready for coding, and the data analysis

process began. Throughout the data analysis process, the essences or common themes from participants' statements were sought to illustrate deeper "clusters of meaning" of the phenomenon being studied based on the information obtained from participants' lived experiences and perspectives (Balls, 2009; Chamberlain, 2009). The modified van Kaam data analysis model adapted from Moustakas, a nine-step process, was used to analyze and provide meaning to the qualitative phenomenological data obtained from the transcribed interviews from each participant (Statistics Solution, 2019; Sullivan & Bhattacharya, 2017).

Horizontalization. Horizontalization is the first step in the modified van Kaam data analysis model adapted from Moustakas in the phenomenological data reduction process. It consists of listing and grouping the data from every participant transcribed interview (Sullivan & Bhattacharya, 2017). During horizontalization, all data transcribed from each participants' interview are treated with equal value as they relate to the research question (Sullivan & Bhattacharya, 2017). Each participant's audio-taped recorded interviews were reviewed multiple times to ensure that each participant's interview transcriptions were transcribed verbatim. The researcher studied the notes taken from each academic document provided by the study participants and notes taken from the researcher's journal during each participant's interview sessions and included them in the interview transcriptions.

A Microsoft word document contained a master list that included highlighted codes and groupings of all transcribed data from each participant interview transcripts. The master list identified distinct concepts and emerging themes that were relevant to the participant's experiences. The transcription data revealed 390 coded expressions. The 390-coded relevant and grouped expressions provided structural descriptive meaning to each participant's perceptions and experiences as it related to the investigated phenomenon (Sullivan & Bhattacharya, 2017).

The following is a verbatim example of horizontalization from an interview transcription transcribed from a study participant's interview that provides structural descriptive meaning. Each participant's perceptions and experiences had equal value, in terms of each participant's experiences with the integrated learning intervention practice system and proactive use of strategic remediation approaches in the nursing program are relevant and reliable and its significance on nursing students' academic performance.

**Principal Investigator (PI):** How would you describe the currently integrated learning intervention practice system within your nursing program?

Participant A Q8: This vocational nursing program is to be proactive...students need time to digest and absorb all the knowledge provided to them... if a student starts struggling in quarter one and educators do nothing to help them until the end of a four quarter semester, their educational/knowledge gaps will be substantially higher...Leaving student learning interventions or conducting remediation strategies until the end of a quarter or program is not...a proactive process but rather... the traditional reactionary...approaches most nursing programs have...our integrated learning intervention practices within the curriculum ...start early with the remediation approach...having a proactive method in place...has helped to decrease the at-risk and at high-risk student gaps of knowledge by identifying these student's knowledge deficits early during a quarter. This process gives faculty and administrators the time needed during each quarter to tailor strategic remediation approaches according to the learning needs of each student. The learning outcomes of these students are drastically different by the end of each quarter.

Participant A described the integrated learning intervention practice system within the selected vocational nursing program as being proactive. He emphasized the critical importance of nursing schools using more proactive learning intervention practices and strategic remediation approaches earlier and throughout a curriculum and program. It gives both faculty and student the time and opportunity needed to address knowledge gaps and learning deficits early. Faculty have the time to work with each underperforming student to create strategic remediation approaches tailored to fit his or her learning needs. This process allows underperforming students earlier in an academic quarter to make appropriate learning and behavioral changes that result in significant changes to their academic performance and learning outcomes.

Reduction and Elimination. Step two in the modified van Kaam, data analysis model, involved reducing and eliminating the coded data listed as "relevant" or meaning units to the phenomenon experience into categories called invariant constituents. Two questions determined if the transcribed expressions of participants' lived experiences of the phenomenon were considered invariant constituents/meaning units. Question one: "Is this quote important to the participant's lived experience of the phenomenon?" (Statistics Solution, 2019, p. 764). Question two, "Can this quote be reduced to its latent meaning?" (Statistics Solution, 2019, para. 3). A response of no to either question resulted in the removal of a quote (Statistics Solutions, 2019). The researcher discarded all irrelevant, too repetitive, and vague participant expressions found in the highlighted coded data list. The following is an example of reduction and elimination, as the study participant's transcribed expressions did not meet the two question criteria.

**Principal Investigator (PI):** Tell me about your experiences with utilizing an integrated learning intervention and proactive remediation process at all levels of a pre-licensure vocational nursing education program?

**Participant D Q9**: I have experience. This is where I want to be. This is my expertise, and this is my passion. I think it is much harder to teach the LVNs than the RNs.

The quote by participant D was irrelevant to the question asked and vague. Participant D's statements were removed from the coded data list did not provide latent meaning to the phenomena studied. The 390 coded categories found were grouped into individual invariant constituents. The highlighted coded expressions were tested against the phenomenon studied. Coded expressions eliminated could not be labeled. Coded expressions were reduced to 239 condensed coded subcategories. Further reduction and grouping of the invariant constituents reduced the invariant constituent to 12 recurrent interconnected coded themes subcategories.

Clustering and thematizing the Invariant Constituents. The third step of the modified van Kaam data analysis model involved grouping and thematically labeling the invariant constituents, which are the core themes of the experience. The remaining 12 invariant constituents from step two were reviewed looking for more coded patterns and emerging themes in the remaining data of each of the participant's experiences with the phenomenon. The invariant constituents were grouped by interconnected categories that related to the integrated learning intervention practice system and the use of proactive strategic remediation approaches throughout the nursing program. Table 2 presents the 3 major interconnected categories found in this study. It includes 1) organizational leadership and the organizational culture, 2) instructional leadership and the classroom environment, and 3) integrated learning intervention practice systems and proactive strategic remediation approaches.

Reviewing the coded framework for meaning units revealed eleven central emerging themes that supported the research purpose and question. They include:

- (1) Effective leadership and mentorship creates institution-wide transformational changes,
- (2) Improving student academic experiences, performances and learning outcomes is the goal,
- (3) Embrace change, technology, and innovative ideas that help improve and advance the nursing curriculum/ program's flexibility, efficiency, and students' academic success,
- (4) Multi-dimensional teaching styles enhance faculty teaching and student's learning experiences, and learning outcomes,
- (5) Engage often with open, and constructive two-way communication. It builds stronger educator-student relationships, create effective conflict management,
- (6) Integrated learning intervention practice systems and proactive remediation approaches provides holistic teaching and learning approaches,
- (7) A structured and engaging collaborative learning environment promotes active learning and effective communication,
- (8) Tap into educator's expertise with at-risk and at high-risk students and learning interventions and strategic remediation best practices,
- (9) Mandatory student academic advisory assessments, facilitate early identification of underperforming students,
- (10) Educator and student commit and take ownership of educational, academic, and student learning success, and
- (11) Improving the integrated learning intervention, and proactive remediation approaches" (see Table 2).

Checking the Themes Against the Data. In step four, checking the core themes against the data as described by the modified van Kaam model involved validating the datasets emerging themes. A final examination and identification of each relevant invariant constituents (categories) and core themes conducted against each participant's interview transcriptions ensured the representation of each participant's transcribed experiences (Statistics Solutions, 2019). The eleven central themes for each category mentioned explicitly stated in the study participant's transcripts as an overarching theme of nursing school administrators and nurse educators' experiences with utilizing a fully-integrated learning intervention system that includes proactive remediation efforts throughout a VN program. The following is an example of checking the theme against the data. The samples below taken directly from two study participants' transcripts verify that the study participants' transcribed expressions validate the stated categories and core themes found in Table 2.

Table 2

The Central Themes per Category

Categories	Themes		
Category 1: Organizational Leadership and	Effective leadership and mentorship create transformational changes institution-wide.		
Organizational Culture	2. Improving student academic experiences, performances, and learning outcomes is the goal.		
	3. Embrace change, technology, and innovative ideas to ensure educational efficacy		
Category 2: Instructional Leadership and the Classroom Environment	4. Multi-dimensional teaching styles enhance faculty teaching and student learning experiences and learning outcomes.		
	5. Interacting often and constructive two-way communication builds stronger relationships.		

Category 3: Integrated Learning Intervention Practice System and Proactive Strategic Remediation Approaches

- 6. Integrated learning intervention practice systems and proactive remediation approaches provide holistic teaching and learning approaches.
- 7. Collaborative learning environments promote active learning and effective communication.
- 8. Tap into educator's expertise with learning interventions and strategic remediation best practices.
- 9. Mandatory student academic advisory assessments, facilitate early identification of underperforming students.
- 10. Take ownership of student academic and learning success.
- 11. Improving the integrated learning intervention practice system and proactive strategic remediation approach.

Individual Textural Descriptions. "Constructing individual textural descriptions" was the fifth step in van Kaam's data analysis model (Sullivan & Bhattacharya, 2017, p. 764). Individual textural descriptions of the phenomena studied were constructed using verbatim quotes that were taken directly from each study participant's transcribed interview transcripts (Sullivan & Bhattacharya, 2017). The following is an example of individual textural descriptions. Each of the individual textural descriptions constructed provide a greater understanding and captures the essence of each study participants feelings, opinions, and perceptions of their experiences utilizing a fully-integrated learning intervention practice system and proactive strategic remediation approaches at all levels of a VN program/curriculum, and its effect on student academic performance and learning outcomes.

Individual textural description, example 1: Participant A was a nursing school administrator for three years and a nurse educator for four years. He has taught in the BSN, ADN, and LVN programs. He felt that this nursing program lacked protocols to monitor students' academic progress in real-time adequately. He indicated the program lacked adequate

protocols to effectively and efficiently address the at-risk and high-risk students' knowledge gaps or learning deficiencies promptly. He stated:

It was disappointing to see students struggling or failing a course were identified as atrisk or as at-high-risk of failure and offered learning interventions or remediation approaches far too late in each quarter or near end of the program for any learning interventions or remediation efforts to effectively change the student's academic performance or learning outcomes in a timely manner. These students usually either dropped out or failed out of the nursing program.

Participant A defined "a student at high-risk of failure as a student who is barely meeting the minimum competencies, while a student at-risk of failure is a student who is not meeting the minimum standard competencies." Participant A described his experience with the newly implemented integrated learning intervention practice system and the proactive strategic remediation approaches in the VN program as a dynamic and engaging process. The new system encouraged nursing school administrators, nurse educators, and students to see teaching and learning as a multidimensional approach. He stated:

This new integrated learning intervention system and the strategic remediation approaches used throughout our 48-week nursing program is more proactive and we utilize more multi-dimensional interconnected approaches that.... has helped to decrease the at-risk and at high-risk student gaps of knowledge by identifying these student's knowledge deficits early during a quarter. Each faculty tailor strategic remediation approaches according to the learning needs of each student. Our primary goal is to help all our students, meet the minimum academic standard competencies throughout their nursing academic career.

Participant A felt that the new integrated learning intervention practice system and the proactive strategic remediation approaches implemented in the VN program was compatible with his teaching philosophy. He stated:

My teaching philosophy... is that as educational leaders and educators, we must create a scaffolding mechanism for the student to be able to observe and learn in a multidimensional approach the nursing curriculum content.

He described creating an organizational culture of collective educational efficacy that implements innovative ideas or evidence-based educational and learning strategies within the program and curriculum that educators can utilize in the classroom setting that can positively influence student learning experience and academic achievement to help students yielding higher learning outcomes (Donohoo, Hattie, & Eelis, 2018). He described multidimensional approaches used by nursing school administrators and nurse educators in the nursing program that can help students to learn and retain the nursing material taught. He stated:

Creating a collective efficacy in the classroom setting, our nurse educators deliver the nursing content to students using multi-dimensional teaching approaches in a collaborative learning environment help motivate students to be more interactive with each other and the faculty, focused on active learning, knowledge sharing, critical thinking, problem-solving, and effective decision-making. The collaborative learning environment involves peer-to-peer teaching sessions, concept maps, watching a series of clinical nursing videos, simulation lab case studies, and tutoring in groups and individually. The program also has integrated testing and exams into the curriculum such as in-class practice quizzes, ATI testing, HESI specialty exams, in-house standardized

exams, NCLEX type questions (testing and quizzing), NCLEX seminar preparation, and more.

Individual textural description, example 2: Participant C was a BSN prepared nurse. She has been a nurse educator for ten years, primarily working in LVN programs. Participant C felt that the integration of the learning management system (LMS) Moodle, and integration the new learning method S.I.M.P.L.I.C.I.T.Y. into the nursing program/curriculum help changed how school administrators, faculty, and students viewed the nursing curriculum, teaching, student learning, and learning outcomes. She stated:

Well I think the new learning method S.I.M.P.L.I.C.I.T.Y. provided us with a stronger foundation... and acted as a guide for us all to better use the integrated learning intervention system and the proactive strategic remediation approaches more effectively, throughout the VN program.

The LMS Moodle became the nursing programs primary educational technology source. The learning management system permitted school administrators, staff, nurse educators, and students to access school administrative documents and academic and learning resources, and find academic courses/syllabus/learning modules/assignments easily. Faculty used the LMS to conduct testing and quizzing. Students took their tests and quizzes using the LMS. Educators used the LMS to conduct testing and quizzing analysis, and monitor student academic progress. The LMS was used to openly communicate with school administrators, faculty, and other students in real-time from anywhere at any time. Participant D expressed:

The LMS Moodle just made it much easier to facilitate and monitor the integration of the learning intervention system and the proactive strategic remediation approach in our VN program's curriculum.

Individual textural description, example 3: Participant E, a nurse educator for seven years, talked about how the integrated learning intervention practice system and utilizing proactive strategic remediation approaches showed him the importance for nursing school administrators and nursing educators to create a more collaborative learning environment in the classroom setting. He stated:

A collaborative learning environment encourages constant two-way communication. It helps to facilitate the learning process between nursing school administrators, nurse educators, and students.

He expressed that the traditional way of teaching did little to facilitate the learning process, knowledge sharing, critical thinking, problem-solving, or effective decision-making in nursing students. He noted: "traditionally, a teacher would stand in front of the class, lecture, and the students are expected to listen, take notes, and learn through rote memorization. Not many students can retain information and perform well academically from this learning interaction." Participant E stated:

Obviously, in nursing rote memorization alone is not enough. When studying a student must become critical thinkers in terms of clinical decision-making and their reasoning process when confronted with a clinical question. Systematically a student must be able to analyze, apply, understand, and remember what they have learned to ensure that the student effectively attained a good grasp of the subject taught.

He indicated that he was disappointed with the program's one-dimensional mindset. The one-dimensional teaching approach was the only way that the majority of the program's nurse educators knew how to teach. He mentions that the school's leadership, its educators, and students' view of teaching and learning had to change to improve student learning outcomes.

Participant E expressed that his experience with creating a collaborative learning environment in the classroom setting was positive and powerful. He indicated that he has seen collaborative learning environment in the classroom setting has had a positive effect on both teachers and students. He provided an example of how he used the collaborative learning environment in his classroom. He indicated that as a teacher he engages his student's learning by giving class in-class assignments on specific nursing subjects. Students are separated into small groups. Each group is assigned a specific nursing topic and subject to learn and present as a group and discuss with the class as a single group. The group presenting to the class will take and answer questions from the class; this is an example of a peer-to-peer presentation.

Participant E indicated that the nurse educator is in the classroom setting to guide the class discussion and answer questions as well. He stated: "This creates a more collaborative learning environment because the faculty is engaging the students and encouraging them to become active participants in their education."

Individual Structural Descriptions. In step six, the researcher used imagination variations to construct individual structural descriptions for each participant (Sullivan & Bhattacharya, 2017). Imagination variations are the different perspectives on an experience provided by the nurse educators and the nursing school administrator who shared their experiences to offer possible meaning (Tuffour, 2017). The individual structural descriptions give a clearer understanding of participants' experience with the phenomena studied. Using common words and phrases used by participants, the researcher provided a vivid account of their experiences and the impact it had on them. Common words and phrases such as effective, organizational, and instructional leadership, transformational changes, S.I.M.P.L.I.C.I.T.Y., learning management system, collaborative learning environment, frequent two-way

communication, "building stronger teacher-student relationships," "creating a more comprehensive and dynamic approach to teaching and learning," and "take ownership of student academic and learning success."

Individual structural descriptions, example 1: Participant D has worked as a part-time adjunct nurse faculty and a clinical instructor in nursing education for 15 years. She has taught primarily in LVN programs. She expressed her overwhelming frustration with the program's previous administrators. There was a lack of organization, lack of effective communication, lack of support, and guidance for both the faculty and students within the nursing program and curriculum before the implementation of the integrated learning intervention practice system, the proactive strategic remediation approaches, and the integration of the LMS-Moodle, and S.I.M.P.L.I.C.I.T.Y (standardize, introduce, modernize, practice, lasting learning, implementation, critical thinking, integration, transparency, yield).

Participant D indicated that the lack of standardization of the curriculum meant that each faulty was expected to create his or her lesson plans for their respective courses. This practice was extremely time-consuming as information for each lesson plan obtained from multiple resources. Participant D stated that each faculty was expected to keep up with weekly teaching objectives, monitor students at clinical, and deal with constant administrative changes. Each faculty was also expected to use a paper-based system for student testing, grading, recording assignments, quizzes, and test scores. This experience left her always feeling overwhelmed. She felt terrible that, with such a heavy workload, students often received the results of their assignments, quizzes, and tests late in the quarter. Often students did not realize they were athigh-risk or at-risk of failing a course until a few weeks before the end of a 12-week quarter. She indicated that although remediation works, offering reactionary learning interventions or

remediation so close to the end of a quarter had proven to be ineffective for most underperforming students. Participant D stated:

It was unfortunate, but I just knew there was just not enough time or availability to identify and provide my underperforming students the attention they needed to improve their academic areas of weakness before the end of the quarter.

Smiling, Participant D expressed that the implementation of the integrated learning intervention practice system, the proactive strategic remediation approaches, the LMS-Moodle, and the learning method S.I.M.P.L.I.C.I.T.Y. within the nursing program/curriculum helped create a nursing program and curriculum that was standardized and modernized. The uniformity and modernization of the nursing program and curriculum made life and maneuvering throughout the 48-week program more straightforward and less stressful for school administrators, faculty, students, and staff. Participant D specified that:

With everything in the nursing program now computer-based through the LMS Moodle... the new teaching and learning initiatives provided us with the academic, educational, motivational, and technological support and guidance we all need to be successful.

The faculty and school administrators had their hands always on the pulse of student's grades, learning, and development. The LMS ensured that they all had access to the same information from a single source. All school student activities were logged and tracked through Moodle. The nursing program used the LMS Moodle for course activities like the course syllabus, assignments, group discussions, surveys, testing, quizzing, recording, monitoring, and analyzing students' academic progress. School administrators, teachers, and students could easily communicate with each other through Moodle. Participant D stated:

We now can assess and evaluate how each student is progressing, during in-class individual assignments, group assignments, and class discussions in real-time. With LMS we can analyze results of quizzes and tests promptly.

According to Participant D, the integrated learning intervention practice system, the proactive strategic remediation approaches, S.I.M.P.L.I.C.I.T.Y., and the LMS system, provided faculty and students a platform that eliminated learning and educational barriers. Looking relieved, Participant D expressed:

A structured collaborative learning environment, mandatory student advisement twice a quarter, and the LMS Moodle used for testing, quizzing, tracking, monitoring, and reporting students' grades and academic progress made it easier to find each student's areas of weaknesses, sooner.

She was able to intervene early and successfully proactively help underperforming students have a better understanding of nursing concepts and nursing skills taught. Participant D stated:

We are no longer playing catch up with our students. We work together with each student. So, we have the time now to tailor learning interventions and remediation approaches that are more compatible with their learning styles throughout a quarter, not just at the end of it.

Looking back, Participant D saw that this entire experience helped to reduce a lot of stress for faculty members and students. Underperforming students were being given a chance to fill their gaps of knowledge, move forward, and not stay behind.

**Individual structural descriptions, example 2**: Participant E is a master-prepared nurse. He has worked as a part-time adjunct nurse faculty and a clinical instructor in nursing

education for seven years. As a nurse educator, he has worked in both BSN and LVN programs. Participant E described his experience with the integrated learning intervention practice system and the proactive strategic remediation approach in the nursing program as "a very eye-opening experience." Participant E was used to a teaching style culture in the classroom setting that was "one-dimensional." During lectures, he used to stand in front of the class and teach the lesson plan. He had minimal time to interact with students. The dynamic of the nursing program and curriculum changed with under implementation of the integrated learning intervention practice system with a more proactive strategic remediation approach using the learning concept S.I.M.P.L.I.C.I.T.Y. and Moodle. The classroom setting was redesigned to be a more collaborative learning environment that used a multi-dimensional teaching approach to appeal to the student's different styles of learning.

Participant E at first was apprehensive about the implementation of the integrated learning intervention practice system and the proactive strategic remediation approach in the nursing program. He thought it would add more work to his already heavy workload as an educator. But he quickly realized its usefulness as "a powerful tool" that benefited both faculty and students to use more proactive academic and educational approaches to improve student learning. Participant E described his new method of teaching and learning to be "multi-dimensional yet more methodological and more systematic." He feels that he creates a "more global understanding of nursing concepts and nursing skills for his students." His students know what is expected of them to succeed not only in his class but in the nursing program.

Participant E was surprised to see how the new integrated learning system and proactive remediation had changed the whole dynamic of the teacher-student relationship within this program. Faculty and students were communicating with each other more frequently in class and

through Moodle. Using, for example, clinical case studies, simulations, peer-to-peer teaching in a collaborative leaning environment format helped students engage with each other more during in-class discussions. This new system has improved student academic performance. Students no longer were hesitant to seek out help to fill their knowledge gaps. Under this new system, Participant E described his current teaching style as being multi-dimensional. He sees the student learning process as being more interactive. He stated, "I am able to change and adapt my teaching strategy to make sure that my students understand the nursing concepts that I am teaching."

In his previous experience in nursing education, Participant E indicated that student learning interventions and the remediation process were two different processes. He stated, "my traditional remediation approach was simply going over test answers and rationale." With the implementation of the integrated learning intervention practice system and proactive strategic remediation approaches the nursing program strived to improve students' critical thinking, problem-solving, and decision-making skills. Integrated into the nursing curriculum is the inhouse standardized exams, NCLEX type questions, NCLEX Seminar preparation, ATI testing, the HESI Specialty exam, and Greenlight. Participant E agreed that testing students frequently throughout the quarter, rather than just testing students at midterm, and then a final has improved student academic performance tremendously. Frequent testing throughout each quarter, according to Participant E, ensures that students study regularly and stay comfortable with the material taught. It also permits faculty the opportunity to assess and evaluate students' academic progress and readily identifies and proactively intervene to help underperforming students sooner rather than later. Proactive remediation process includes the use of Elsevier Saunders books, Adaptive Learning, and Adaptive quizzing software. Participant E indicated that since the

implementation of the integrated learning intervention practice system and proactive strategic remediation approaches, S.I.M.P.L.I.C.I.T.Y., and Moodle, he felt more interactive with his students. Participant E felt that the nursing curriculum was more systematic; he felt it was helpful and provides more support to his students. He stated, "My students are more excited about learning because they can see that I am invested in their success as students and future nurses."

Individual structural descriptions, example 3: Participant F was a mastered prepared nurse. She worked as a part-time adjunct nurse faculty and a clinical instructor in nursing education for seven years. She has taught in BSN, ADN, and LVN nursing programs. Participant F was pleased to see how the school's new director's new teaching and learning initiatives transformed the nursing program. She felt that it changed the way school administrators, teachers, and students viewed teaching and learning in such a positive way in the past year, since its implementation.

The implementation of the integrated learning intervention practice system within this nursing program and curriculum presented a more comprehensive approach to teaching and learning. It touched every sphere of the faculty and student academic experience. The integrated learning intervention practice system, and the proactive strategic remediation approaches consisted of multiple interconnected components. These interlinked components worked well together within the nursing program and curriculum to yield a successful outcome for all. The integration of the learning management system Moodle and the new concept of learning S.I.M.P.L.I.C.I.T.Y. within this program helped make the implementation of the integrated learning intervention practice system, and proactive strategic remediation approach successful.

Participant F recalled that her teaching style originally consisted of using only

PowerPoint presentations to present daily lesson plans. After utilizing a more collaborative

learning environment in the classroom setting with the integrated learning intervention practice system and the proactive strategic remediation approach, in time, she saw her concept of teaching change. Participant F indicated that her teaching style went from being one-dimensional to one that became a more multi-dimensional approach. In the classroom setting, the faculty's daily lesson plans included PowerPoint presentations, clinical case studies, the live review, role playing between colleagues and students, peer-to-peer teaching, and the concept of escape room scenarios. In the case of the escape room scenario instead of the traditional way of reading the slides or giving students slides to read and understand, faculty members would provide students with clinical scenarios with multiple clues to unfold. This multi-dimensional approach to teaching and learning helped to develop and improve students' critical thinking and judgement skills. It also allowed faculty members the opportunity and time to assess and evaluate in real-time each student's understanding of nursing concepts and clinical skills taught. Those students struggling with a nursing concept and clinical nursing skill received the help they need promptly, before their learning deficits increased to high.

The director of nursing education implementing a mandatory student academic advising at the midpoint and endpoint of each 12-week quarter is critical to the early identification of underperforming students. Each faculty was expected to meet and spend time with each student reviewing their academic progress during a course. Identified at-risk and at-high-risk students received tailored remediation approaches specific to his or her learning style. For those underperforming students who failed a class despite previous attempts of learning interventions and remediation during an academic quarter, the program offered a 10-day remediation process. This option was only available after quarters 1, 2, and 3. Failure to meet the minimum academic progression standards during any one of the 10-day remediation processes meant that the student

was no longer eligible to continue with the nursing program. This process was paramount in improving students' academic and learning outcomes in the program. Participant F believed that this learning intervention practice system and strategic remediation approaches played a significant role in enhancing the relationship between faculty members and students. Students could see that the faculty and the administration were genuinely invested in them meeting their academic progression standards in all phases of the curriculum. Participant F believed that this program's comprehensive, proactive strategic remediation approach yields a better outcome for students, faculty, and the administration.

Composite Textural Descriptions. In step seven, the researcher constructed the composite textural descriptions of participants' experiences and feelings concerning utilizing an integrated learning intervention practice system, that includes proactive strategic remediation approaches throughout a program and curriculum that started with rereading the researcher's journal notes and reviewing each participant's transcribed interview transcripts. The researcher created a table that outlined reoccurring and prominent themes found in participants' transcribed interview transcripts and from notes written in the researcher's journal during each interview. Displayed in Table 3 are the summarized condensed codes, main categories, central themes, and interview questions obtained from participants' transcribed interview transcripts and researcher's journal notes. Next to each central theme is the interview questions that corresponded to that central theme of the phenomena studied.

Composite Structural Descriptions. In step eight, the researcher uses imaginative variation and a narrative format to create composite structural descriptions to summarize the lived experiences of study participants with the phenomena studied. The researcher reread journal notes taken during each interview and reviewed the interview transcripts of each

participant until the meaning of the experiences and feelings of what participants shared as a group with the phenomena studied was realized (Statistics Solutions, 2019). Participants shared their overwhelming frustration with the lack of leadership, support, and guidance received from previous school administrators. The ineffective leadership and lack of support and proper guidance created many barriers that negatively affected nurse educators teaching and student academic performances and learning outcomes within the nursing program and curriculum. Ineffective organizational and instructional leadership led to poor organization, poor communication, lack of transparency, poorly prepared, and ineffective faculty leadership and guidance in the classroom setting. Heavy course loads prevented faculty members from spending adequate time interacting with students. Access to educational resources was inadequate, and faculty members obtained information for lesson plans from various educational resources. The use of a paper-based system to teach, test, grade, track, and monitor student academic progress made moving through the curriculum slow and tedious. This led to inconsistencies with the directions and expectations of the nursing program, and significant deficiencies with the curriculum. There was a lack of continuum of exposure to nursing concepts and skills taught for students throughout the 48-week nursing program. From the top-down, there appeared a lack of commitment and ownership of academic, educational, and learning success.

The integrated learning intervention practice system that included the proactive strategic remediation approaches is made up of multiple interconnected components that work together to improve the student learning experience and academic performance and yield higher learning outcomes. The interlinked components included the following: (a) The learning management system Moodle, (b) A new learning method referred to as S.I.M.P.L.I.C.I.T.Y., (c) A collaborative learning environment in the classroom setting, (d)The integration of standardized

tests and exams in the curriculum, (e) Mandatory academic student advising assessments during week-6 and week-12 of each quarter, (f) Early identification of underperforming students, (g) Remediation processes: During each proactive strategic remediation, students are provided with tailored SMART (specific, measurable, appropriate, reference/resources, timetable) student success plan that focuses on specific areas of academic and clinical skill weakness, study habits, and time management. They are offered teacher and student one-to-one tutoring sessions. A 10-day remediation process is offered after quarter 1, quarter 2, and quarter 3. Faculty using Elsevier's and Saunders Nursing Education Software to perform visual learning in the simulation labs, adaptive learning and quizzing, and essay practice help improve student learning experiences and learning outcomes (see Table 11).

Participants expressed that the integration of the LMS Moodle and the learning method S.I.M.P.L.I.C.I.T.Y. by the new leadership was an effort to help standardize and modernize the nursing program and curriculum. Participants indicated that they supported the standardization of the program and curriculum because it made the vision and the expectations of the nursing program and curriculum clearer, more systematic, methodological, and easier to follow. The LMS Moodle helped to modernize every aspect of the nursing program and curriculum.

Operating under a computer-based system, administrators, faculty, and students had access to the same information from a single source. The LMS Moodle logged and tracked all course and student activities. Activities included communicating, course announcements, course syllabi, assignments, group discussions, surveys, testing, quizzing, recording, monitoring, and analyzing students' academic progress. Participants felt they had more accessibility to all student's grades, learning, and developmental progress in real-time.

Participants felt that the integrated learning intervention practice system, the proactive strategic remediation approaches, S.I.M.P.L.I.C.I.T.Y., and the LMS system transformed the way school administrators, faculty and students viewed the nursing program and curriculum, teaching, learning, communication, and the teacher-student relationship. Students were tested regularly throughout a quarter. Standardized test exams were integrated into the curriculum to help improve student critical thinking, problem-solving, and decision-making skills. Participants indicated that this process ensured students stayed familiar and comfortable with materials taught. It provided participants an opportunity to accurately assess student academic progress, identify underperforming students early, and provide tailored learning interventions as needed.

Participants described the collaborative learning environment as "a powerful tool" that benefits both nurse educators and students. The collaborative learning environment in the classroom setting is a structured, dynamic, and very interactive learning experience where knowledge sharing, effective communication, critical thinking, problem-solving, and effective decision-making are encouraged and support between faculty, students, and their colleagues. Although comfortable with the one-dimensional approach to teaching, many participants see the value that the multidimensional teaching approach brings to enhancing their style of teaching and improving student learning experiences and learning outcomes. Many participants expressed that the collaborative learning environment format inspired and motivated them to explore and adopt multidimensional teaching styles that appealed the most to different student learning styles. Special teaching and learning styles significantly improve student learning experiences and learning outcomes.

Participants indicate that the nurse educator still teaches in the collaborative learning environment, however, nurse educators help to guide class discussions to facilitate active student

participation. Nurse educators felt that they had a better opportunity during peer-to-peer presentations to adequately assess and evaluate each student's understanding of assigned nursing concepts and nursing skills taught. Students identified with knowledge deficits are provided with tailored learning interventions or remediation approaches to help them reduce their knowledge gap in time. Many of the learning intervention and proactive strategic remediation approaches used to enhance interactive teaching and learning in the collaborative learning environment includes but not limited to clinical case studies, live reviews, peer-to-peer teaching, simulation labs, and adaptive learning and quizzing exercises accessed from Elsevier and Saunders Nursing Education Software through LMS Moodle.

Table 3

Composite Description of Study Participants' Transcribed Interview Transcripts

Condensed Codes	Main Categories		Central Themes	Interview Questions
-Effective leadership, organizational culture and transformational changes	Category 1: Organizational	1.	Effective leadership and mentorship create transformational changes institution-wide.	7, 8, 9, 10,11, 12, 14
-Creating shared mission and vision with educators and students	leadership and the organizational culture		Improving student academic experiences, performances and learning outcomes is the goal.	6, 7, 8, 9,10, 11, 12
-Willingness to accept new changes, LMS technology, new learning concepts (S.I.M.P.L.I.C.I.T.Y) to facilitate communication, teaching, testing, and learning		3.	Embrace change, technology, and innovative ideas to ensure educational efficacy.	7, 8, 9, 10, 11, 12, 14
-Flexible Teaching Styles	Category 2:	4.	Multi-dimensional teaching styles	8, 10, 11,
-Educators take ownership of their teaching styles and student learning in the classroom setting	Instructional Leadership,		enhance faculty teaching and student's learning experiences and learning outcomes.	12, 14
-Frequent, constructive two-way communication builds stronger relationships between administrators, teachers, students, and colleagues.	Teaching Style, and the Classroom Environment	5.	Interacting often and constructive two- way communication builds stronger relationships.	7, 8, 10, 11, 12, 14
-Integrated learning intervention practice system and proactive strategic remediation approach, a comprehensive proactive effort, improves the nursing program/	Category 3:  Integrated Learning Intervention	6.	Integrated learning intervention practice systems and proactive remediation approaches provide holistic teaching and learning approaches.	6, 7, 8, 9, 10, 11,12, 14
curriculum's effectiveness, efficiency, student learning experiences, academic performance, and learning	Practice System and Proactive Strategic Remediation Approaches	7.	Collaborative learning environments promote active learning and effective communication.	8, 10, 11,14
-Collaborative learning environment reduce learning		8.	Tap into educator's expertise with learning interventions and strategic remediation best practices.	5, 6, 7, 8, 9, 11
barriers, enhance the student learning experience and learning outcomes		9.	Mandatory student academic advisory assessments, facilitate early identification of underperforming	7, 8, 9, 12
-Mandatory student academic advisory assessments, increase early identification of underperforming students, reduce knowledge deficits, promptly		10.	students.  Taking ownership of student education and learning is key to academic success.	6, 7, 8, 9, 11, 12, 13
-Help students take ownership of his or her learning styles, academic performance, and learning outcomes		11.	Improving the integrated learning intervention practice system and the proactive strategic remediation approach.	15

Composite Structural-textural Description of the Phenomenon Studied. Finally, in step nine, the researcher combined each study participant's composite textural descriptions and composite structural descriptions, constructing a composite structural and textural description that represents study participants as a group (Statistics Solutions, 2019). In this section, the full structural and textual description created provides meaning and essence of the lived experiences of the participants who utilized a fully integrated learning intervention practice system that includes proactive strategic remediation approaches in a vocational nursing education program in Southeast Texas (Statistics Solutions, 2019).

An organization's leadership and organizational culture affected the perceptions, beliefs, and behaviors of all its major stakeholders with the organization. Ineffective leadership often created an organizational culture that was poorly organized, lacked transparency, had no clear direction or expectations, no accountability or responsibility, and fragmented communication from the top-down. Employees were often left overwhelmed, confused, and full of anxiety as they did not know what to expect.

Effective leadership and mentorship create transformational changes organization-wide and in the classroom setting that positively influences educators teaching styles and student learning experiences and learning outcomes. An effective educational leader creates change by being proactive and at the forefront of academic, educational, and learning issues he or she wants to change. However, in a complex adaptive system like nursing education, it is imperative for the successful implementation of a comprehensive and strategic proactive organizational plans that effective leaders gain major educational stakeholders (school administrators, nurse educators, and students) buy-in to a shared vision. By taking ownership of the strategic organizational plan, all major stakeholders agreed to work towards a common goal, student academic, educational,

and learning success. Educational leadership must give educators and students a voice in the decision-making process that will influence their teaching and learning experiences.

Educational leaders providing educators and students in the organizational and classroom setting with adequate academic, educational, and technological resources, infrastructure, support and training create an effectively functioning academic culture that will positively influence faculty members teaching styles and improve student's learning experiences and learning outcomes in the short- and long-term.

In the classroom setting, educators create a collaborative learning environment that facilitates and encourages active learning, interaction, and effective communication with educators and peers. Educators empower students to take ownership of their education and learning outcomes. The implementation of the fully integrated learning intervention practice system, proactive strategic remediation approach, the integration of the LMS Moodle and the learning method S.I.M.P.L.I.C.I.T.Y, and the collaborative learning environment into the nursing program/curriculum changed school administrators', faculty's, and students' view of the nursing curriculum, teaching, student learning, and student learning outcomes. The nursing school administrator and nurse educators described their experiences with the newly implemented integrated learning intervention practice system that includes a proactive strategic remediation approach as dynamic, engaging, compelling, powerful, positive, proactive, eye-opening, and less stressful. Participants experienced increased satisfaction working within an organizational and classroom culture that promotes educational efficacy.

A more robust, rigorous, dynamic, standardized, and modernized nursing program and curriculum that helped reduce communication, educational, learning, and technological barriers between school administrators, the faculty, and students. The standardization and modernization

of the program and curriculum made policies and procedures clear, organized, consistent, and easier to follow. All stakeholders know what to expect from the nursing program and curriculum and know what the program and curriculum expect from them. There are no hidden surprises. The multi-dimensional approaches to teaching and learning, and the LMS Moodle allow educational leaders and educators to work together, be proactive, address students' knowledge gaps and learning deficiencies early, and adapt to diverse learning styles. It enables educational leaders and educators to assess and evaluate students' academic progress in real-time and readily identify and proactively intervene to help underperforming students sooner rather than later.

## **Findings of the Research Study**

The focus of this study was on one research question: To explore what the experiences were like for nursing school administrators and nurse educators who utilized a fully integrated learning intervention practice system that includes proactive strategic remediation approaches at all levels of a pre-licensure vocational educational program located in a metropolitan city in Texas. The researcher used a 15 semi-structured interview question protocol designed to address the research question and gather data on study participants' perceptions and lived experiences with the phenomena studied (Appendix G). The modified van Kaam data analysis model adapted from Moustakas was used to review and thoroughly examine the data collected from participants' transcribed interview transcripts and provide meaning to participants lived experiences with the phenomena studied. This section reveals and discusses the findings of the data analysis. The categories and themes revealed in the analysis provide a better understanding of how participants perceived their experiences with an integrated learning intervention practice system that includes proactive strategic remediation in a VN program that affected them, colleagues, students, and the VN program.

The results of the data analysis revealed three main interconnected categories and eleven core themes that addressed and answered the study's research question. The main categories are: (1) organizational leadership and the organizational culture, (2) instructional leadership and the classroom environment, and (3) integrated learning intervention practice systems and proactive strategic remediation approaches (see Table 2). Each of the eleven core themes revealed in the data analysis came directly from participants' perceptions and experiences with the phenomena studied. The data analysis revealed a significant relationship and strong interconnection between the three main categories and the eleven core themes (See Figure 1). Every category has two or more themes that corresponded to specific questions from the interview question protocol in Appendix G (See Table 3).

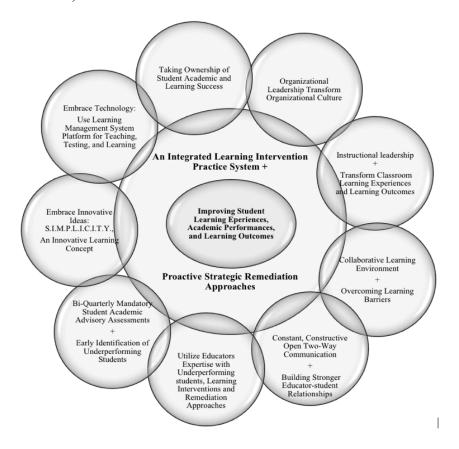


Figure 1. Relationship between the Research Question, Main Categories, and Central Themes

## Category 1: Organizational Leadership and Organizational Culture

This category, organizational leadership and organizational culture provide a greater understanding of the significant relationship between organizational leadership, organizational stakeholders (leadership, school administrators, faculty, staff, and students) and the organizational culture (see Table 3). The research question that guided this study was: What are the experiences of nursing school administrators and nurse educators with utilizing a fully integrated learning intervention system that includes proactive remediation efforts throughout a pre-licensure vocational educational program? Participant responses to research interview questions 6, 7, 8, 9, 10, 11, 12, and 14, revealed three recurring themes that corresponded to this category (see Table 3). This section discusses these three central themes: (1) effective leadership and mentorship create transformational changes institution-wide, (2) improving student academic experiences, performances, and learning outcomes is the goal, and (3) embrace change, technology, and innovative ideas to ensure educational efficacy.

Table 4

Category 1, Central Themes, and Interview Questions

Category	Themes	Interview Questions
Category 1:	1. Effective leadership and mentorship create transformational changes institution-wide.	
Organizational leadership and the organizational	Improving student academic experiences, performances and learning outcomes is the content of the content o	6, 7, 8, 9,10, 11, 12
culture	goal.	7, 8, 9, 10, 11, 12, 14
	3. Embrace change, technology, and innovat ideas to ensure educational efficacy	ive

Theme 1: Effective Leadership and Mentorship Creates Transformational Changes Institution-Wide. Findings from this study suggest there exists a strong correlation between an organizational leader's attitude, behavior, beliefs, and values, and its effect on organizational stakeholders, and its influences on how an organizational culture behaves. The organizational leadership and organizational culture where study participants were employed affected their perceptions and experiences with the phenomena studied (see Table 14 and Table 15). Many participants indicated the need for effective change in the nursing program to promote adequate growth, development, and success for students, faculty, the program, and the school. Participants agreed that changing an organizational culture resistant to change is challenging. All participants agreed that effective leadership and mentorship at the school administration level and the classroom level created effective transformational change that can significantly improve academic, educational, and learning outcomes for students, faculty, school administrators, and the program.

All six participants noted that transformational changes started to take effect within the program under the direction of the program's new director of education. Participant B stated:

The new director quickly recognized the need for change within the program and curriculum was vital to improve our student's academic performances and learning outcomes, and for the survival of our nursing program.

Participant E expressed that he was completely surprised by the director. He explained: "The new director his first week as director of the program had a meeting with the faculty body and with the student body." Participant E stated:

He asked us about our opinions of the nursing program and the curriculum. He asked us to be specific. Then asked us what did we need from leadership to help improve the program, to help faculty and students be successful." He stated, "I did not think he was going to accomplish much here. But I was willing to listen to what he had to say and wait and see what he did.

Most participants of the study described some degree of frustration and disappointment with the nursing program, curriculum, and previous school leadership. Participant D stated:

The nursing program and curriculum are not standardized. The program's policies and procedures lack transparency. The rules and schedules change around here constantly, there lack consistency and adequate organization.

Participant C added: "There is lack accountability and responsibility by leadership." Participants described an organizational culture that was resistant to change. Participant E expressed: "we have issues with poor communication from the higher-ups." All participants agree that communication top-down is fragmented.

All participants expressed that faculty and students need access to an IT infrastructure that is easily accessible to them, not just the administration. At the time, they operated primarily using a paper-based system to test, evaluate, grade, monitor, and track students' academic progress, manually. Participant B explained: "We work with limited access to in-house educational, technological resources. So, we have to go find outside resources to look for information." Participant D stated: "the support and guidance we receive from school leadership is not enough." All participants indicated that they managed heavy course loads. They created their course lesson plans manually. Participants said they often felt overwhelmed and stressed out. Participants indicated that faculty members did not have adequate time to work with each student. This affected student learning experiences and learning outcomes. Participants indicated

that the program did offer remediation to students who failed a course. Participants described the remediation process as reactionary, one-dimensional, and limited (see Table 5).

Participant A described the new director as a change agent. Participant F stated:

The new director was being proactive...he advocated for organizational and instructional changes.... He introduced new policies, processes, guidelines, and programs to help shape, guide, and move our faculty, students, and the nursing program forward to be successful.

Nearly all participants indicated that they were pleased that the program's new leadership intentionally allowed faculty members and students to have a voice about the changes that were taking place in the program and curriculum. Participant A stated:

Leadership welcomed constructive feedback from nurse educators and students on an ongoing basis in almost all decision-making processes." Participant A shared: "as a leader, it is important to be transparent about the new vision and policies of the program. We must ensure that both the faculty and students feel that their input has value, and they are in "control" of the outcomes of this new program vision and practices that impact their lives.

All participants agreed that everyone working toward one common goal would ensure that student learning experiences and learning outcomes significantly improve.

## Participant C stated:

I was surprised. The director listened to our concerns about needing access to educational resources, better IT infrastructure, ineffective paper-based system, tedious faculty workload, low academic performances, poor learning experiences, low learning outcomes, and the reactionary and one-dimensional remediation efforts.

## Participant A stated:

To change the institutional culture, it was important to start by standardizing the VN program with systematic and methodological policies and procedures that were easier to follow. The nursing program and curriculum were now aligned with the Texas State Board of Nursing's differential nursing competencies. A computer-based system, the learning management system (LMS) Moodle, and a learning concept method called S.I.M.P.L.I.C.I.T.Y. was implemented to modernize, standardize, and advance the nursing program and curriculum. The new director created S.I.M.L.P.L.I.C.I.T.Y. to improve faculty teaching and learning philosophies and to help students better understand and learn nursing concepts by increasing their level of critical thinking (see Table 5).

Participant A indicated that leadership implemented within the nursing program and curriculum, a fully-integrated learning intervention practice system with a proactive strategic remediation approach focus that provides a more comprehensive and strategic proactive approach to teaching and learning. All participants indicated that the new teaching and learning initiatives required faculty to change their teaching style in the classroom setting from a one-dimensional teaching style to a multi-dimensional teaching approach. Faculty classrooms function as a collaborative learning environment that offers students more structured and more engaging learning experience. All participants agreed that faculty could actively evaluate student learning and understanding of nursing concepts taught and identify underperforming students promptly and address their areas of academic weakness appropriately. Participant E stated:

This new integrated learning system took some time for me to adjust to it and accept. But I soon realized its usefulness as a powerful tool and its benefits for both students and faculty. It was an eye-opening experience.

Theme 2: Improving student academic experiences, performances, and learning outcomes is the goal. The data analysis from participants' transcribed interview transcripts and notes taken from the researcher's journal revealed an interconnected relationship between the three main categories and the eleven core themes. However, all the categories and central themes relationships center around one core theme, improving student academic experiences, performances, and learning is our primary goal (see Figure 1). Participant A expressed that all the changes implemented within the nursing program and curriculum are student-oriented. Organizational and instructional leadership are all focused on providing academic, educational, and technological support and guidance that help facilitate student's personal and professional growth and development.

Table 5

Faculty Opinions of the Organizational Leadership and Organizational Culture Before and After Implementation of the Integrated Learning Intervention Practice System and Proactive Strategic Remediation Approach

Opin	Participant # (N=6)				
Organizational Leadership and Organizational Culture Before After					
Organizational Leadership					
Ineffective, reactive, and fragmented, inadequate support or guidance of employees and students	Transformational, proactive, motivational, transparent, provides support and facilitates professional growth and academic development	6			
Policies and Procedures Policies and procedure disorganized and confusing	Policies and procedures standardized, systematic, and easier to follow	6			
<b>Transparency</b> Poor organizational transparency	Program and curriculum aligned with State Board of Nursing differential competencies	6			
Communication Between Stakehold Communication top-down, limited, fragmented, and ineffective	ders Frequent, constructive feedback and open honest two-way communication, effective	6			
Access to Educational and Testing Limited	Resources  LMS Moodle permit unlimited access to educational and testing resources	6			
IT Infrastructure Limited, primarily a paper-based system					
Organizational Culture Resistant to change Lacked organization and consistency	Embraced technology and innovative ideas that enhanced learning outcomes	6			
Remediation process Reactionary, one dimensional, insufficient	Proactive, strategic, multidimensional, effective	6			

Participant D stated: "We must show our students compassion and understanding, whatever they are going through." Participant E stated: "There are many reasons why students perform poorly academically. We know this because we now take the time to discuss with students' core issues that create challenges for them to learn and achieve academic success."

All participants indicated that school administrators and faculty members established an open-door policy that encourages continuous engagement that has helped to build stronger educator-student relationships. Participant F indicated that improving student learning experiences, academic performance, and learning outcomes should starts by providing both faculty members and student an academic environment with no communication, educational, learning, and technological barriers. Participant C stated: "Policies, procedures, teaching and learning practices and approaches adopted within the nursing program and curriculum should be methodological, systematic, clear and easy to follow."

All participants agreed that faculty members and student expectations and guidelines must be specific and clear. Helping the faculty and students, respectively, realize set teaching and learning objectives, improve student learning experiences, increase academic performances, and to help students achieve academic success.

Theme 3: Embrace change, technology, and innovative ideas to ensure educational efficacy. Findings in this study showed that this theme corresponds to most participants' responses to interview questions 7, 8, 9, 10, 11, 12, 14, and 15 (see Table 3). Participants agreed that change, technology, and innovative ideas is inevitable and they must be embraced. Every facet of the healthcare system uses technology to enhance productivity, efficiency, and effectiveness of its workforce and services. All NCLEX-PN and NCLEX-RN exams for licensing of nurses are computerized. Participant F stated: "We cannot continue working,

teaching, and learning using primarily a paper-based system, this is no longer a viable option for this nursing education program and our students." Participant A explained:

We live, work, and play in a highly technological and competitive environment. It is vital to the survival and success of our nursing program and curriculum that our leadership help stakeholders view change, technology, and innovative ideas to enhance and advance efficiency and effectiveness. Organizational leaders must provide adequate resources, support, and training to better prepare faculty and students to be technologically fluent and competent. We must stay relevant and competitive with other local vocational nursing programs. Implementing the right technology can transform and facilitate the nursing program and curriculum, faculty, and students to have the highest potential for continuous growth and development.

Participants F expressed:

Using the SIMPLICITY learning methodology has helped teachers and students to stay focused on teaching and learning skills involving effective communication, collaboration, knowledge sharing, problem-solving, critical thinking, and effective decision making.

Participants indicated that the integration of the S.I.M.P.L.I.C.I.T.Y. learning methodology within the integrated learning intervention practice system created a teaching and learning environment for both the faculty and student that was more proactive. All participants indicated that as an innovative learning method, all components of S.I.M.P.L.I.I.C.I.T.Y. were practical and most useful for faculty and supported student's growth, development, and success (see Table 6). Participants agreed that (S) standardizing and (M) modernizing the nursing program, curriculum, and testing increase clarity, organization, and operational effectiveness and efficiency. (P) Practice continuously. Participant D stated: "We know to improve student

learning repetition works, so we use simulation labs, adaptive quizzing and learning, and comprehensive test reviews," this ensures, (L) lasting learning. All participants indicated that (C) critical thinking capabilities enhance problem-solving and decision-making. Participants also agreed that (I) introducing new concepts of teaching and learning, (I) implementing and (I) integrating of evidence-based teaching and learning student-centered strategies is essential to (Y) yield, positive teaching, and learning outcomes. Participant C expressed that (T) transparency within an organization and leadership is crucial. She stated: "Leadership established policies and procedures that have a clear vision, guidelines, and expectations we all can follow to work toward to attain student, faculty, and program success."

Participant D was the only study participant not to mention transparency in her transcribed interview transcripts or researcher journal notes as an essential component in the learning method S.I.M.P.L.I.C.I.T.Y. Participant D felt that "the Moodle platform has made the integrated learning intervention practice system seamless." Most participants agreed that The LMS provides both faculty and students the technological support and resources needed to support the integrated learning intervention practice system and proactive remediation approach. Participants indicated the LMS facilitated communication between educators and students, and between peers and colleagues. All participants agreed that access to the LMS Moodle technology helped to eliminate learning and educational barriers that previously hindered student academic performances, learning outcomes, and prevented students from meeting minimum academic progression standards.

With the current integrated learning intervention system with the LMS (Moodle) and the proactive strategic remediation approaches, students are exposed to more educational resources to help students better understand nursing concepts. These resources include Elsevier Evolve

visual learning, adaptive quizzing, and adaptive learning, essay practice questions, Saunders comprehensive review questions, with NCLEX type practice questions. A student has access to the material through the LMS (Moodle) in-real time, for as long as the student requires it to fill their gaps of knowledge and have a good understanding of the nursing concept taught.

Participant D indicated that "The LMS platform allows educators to have all the academic and educational resources at our fingertips and in one place" (see Table 7). Participant A stated: "The use of integrated learning intervention practice system and Moodle LMS platform made it easier for nurse educators to identify a student at-risk and high-risk of failure early."

Using the LMS Moodle platform helps faculty to store, track, and report all course and student activities. Participants agreed that identifying a student academic area of weakness was easier. The LMS software allowed faculty members to analyze student academic progress overall, on tests, and quizzes. Faculty members and school administrators can intervene at a much faster rate to provide proactive strategic remediation approaches that best fit the learning needs of each student (see Table 7).

Only two participants mentioned the cost-effectiveness of the LMS Moodle technology in comparison to other LMS online software. Participants all agreed that technology and innovative ideas make communicating, teaching, and learning more accessible and more straightforward for everybody. Five participants agreed that Moodle was instrumental in enhancing students' and teachers' technological experience and learning. Participant A indicated that leadership must be mindful that not every student, faculty member, or staff have the same technological competence or comfortability with the Moodle platform. The availability of training with Moodle and technical support to troubleshoot technical issues ease the stress and concerns with this technology a little.

Table 6

Components of S.I.M.P.L.I.C.I.T.Y. Faculty Found Most Useful

Components of S.I.M.P.L.I.C.I.T.Y.		Participant # (N=6)
S -	Standardizing the nursing curriculum, testing, and program to provide structure and consistency	6
Ι-	Introduce innovative ideas/concepts to the nursing curriculum and program to enhance teaching and learning	6
M -	Modernize the nursing curriculum, testing, and program	6
P -	Practice continuously what is learned	6
L-	Lasting learning	6
I -	Implementing innovative ideas/concepts into the nursing curriculum and program to enhance teaching and learning	6
<b>C</b> -	Critical thinking enhances problem-solving and decision-making skills	6
I -	Integrate innovative ideas/concepts into the nursing curriculum and program	6
Т-	ensure Transparency of the nursing curriculum and program	5
Y -	Yielding positive teaching and learning outcomes	6

Table 7

Components of LMS Moodle technology Faculty Found Most Useful

Opinions	Participant # (N=6)
A powerful and useful educational technological tool	6
Facilitated the seamless integration of the integrated learning intervention practice system and the proactive strategic remediation approaches within the nursing program curriculum	6
Instrumental in modernizing and digitalizing the current nursing curriculum and program	6
Eliminates learning and educational barriers	6
Allows access to the same information from a single source	6
Everything we need is in Moodle	6
Improves individuals' technological experiences and skills	6
Permits communication with others at anytime and anywhere	6
Compatible with nursing teaching and testing products from Elsevier and Saunders Nursing Education Software	6
Enhanced faculty-student interaction	6
Supports, transforms, and facilitates teaching, testing and learning via Moodle	6
Store, track, monitor, and report all course activities: course syllabus, course announcements, assignments, group discussions, surveys, testing, quizzing, and students' grades.	6
Log and track all student activities.	6
Facilitated early identification of students at-risk and high-risk of failure, analyze students' academic progress and find areas of weaknesses faster	6
Enhanced faculty teaching and student learning	5
Improve student computer testing-taking skills	5
Moodle is a cost effective LMS	2

## Category 2: Instructional leadership, Teaching Styles, and the Classroom Environment

This category explores instructional leadership and its impacts on teaching styles, empowerment, and fostering stakeholder commitment to facilitate, support, and guide ongoing growth and development in teaching and learning in the classroom setting. Instructional leadership helps facilitate moral support, technological support and provides both the teacher and student a learning environment where he or she can thrive. This category addresses the study's research question: What are the experiences of nursing school administrators and nurse educators with utilizing a fully integrated learning intervention system that includes proactive remediation efforts throughout a pre-licensure vocational educational program? Participant responses to research interview questions 7, 8, 10, 11, 12, and 14, revealed two recurring themes that corresponded to this category (see Table 8). This section discusses two core themes: (4) Multi-dimensional teaching styles enhance faculty teaching and student's learning experiences, and learning outcomes, and (5) Interacting often and constructive two-way communication builds stronger relationships.

Table 8

Category 2, Central Themes, and Interview Questions

Category	Themes	Interview Questions
Category 2:		
Instructional Leadership, Teaching Style,	4. Multi-dimensional teaching styles enhance faculty teaching and student's learning experiences, and learning outcomes.	8, 10, 11, 12, 14
and the Classroom Environment	5. Interacting often and constructive two-way communication builds stronger relationship	

Theme 4: Multi-dimensional teaching styles enhance faculty teaching and student **learning experiences and learning outcomes.** The findings in this study showed that faculty members who used multi-dimensional teaching approaches helped students with learning barriers have a better chance to understand, learn, and retain the material taught. This theme was one of the recurring themes revealed from participants' transcribed interview transcripts and the researcher's journal notes in response to interview questions 8, 10, 11, 12, and 14. All participants indicated that before the implementation of the integrated learning intervention practice system that included a proactive strategic remediation approach, S.I.M.P.L.I.C.I.T.Y., and LMS Moodle, they possessed a one-dimensional traditional teaching style. In the past, participants mentioned the faculty were given teaching objectives per course to cover. Participants indicated their teaching styles consisted of preparing course lesson plans from various educational resources, standing in front of students, and presenting the lesson plan. Students sat, listened, and took notes during class, with limited interactive communication between faculty and students. Participant D stated, "the course teaching objectives I had to complete for each class was so much, I had very limited time for in-depth interactions with my students." Participant F stated, "there was little structure or consistency in the development of those lesson plans."

Participants indicated that their experiences with the integrated learning intervention practice system, the proactive strategic remediation approach, the learning method S.I.M.P.L.I.C.I.T.Y., and LMS Moodle had helped significantly improved their teaching style. Participant D stated, "We as educators, we set the tone for students in the classroom setting." Participants C added:

The more interactive and more engaging we are with students in the classroom setting, the more students are likely to become active participants in their education. Finding appropriate academic resources in a timely manner to overcome knowledge gaps in real time.

Five out of six participants indicated that adopting a multidimensional teaching approach was essential to improving student learning experiences and learning outcomes (see Table 9).

Participant E expressed,

As an educator adapting my teaching style to enhance my student learning makes me interact more with my students. It has been an eye-opening experience for me discovering which teaching style best fits the learning needs of my students. The subject matter I am teaching seems more interesting to my students and me. I feel more hands-on and more supportive of students' learning experiences and overall academic success.

Participant D indicated that the LMS Moodle and the Elsevier Evolve nursing education software allows interactive videos to go with each lesson plan. Students can watch live illustrations of nursing concepts, diseases, and ailments to help retain information taught. She stated further, "the interesting thing is ...in time knowledge sharing between faculty and student and colleagues was occurring inside and outside the classrooms." Participant D indicated that she noticed students coming to class more prepared to share information with the class. All participants expressed that in the interactive class, students no longer appeared bored during class lectures, students were not afraid to ask a question to clarify doubts, they can apply and retain information that they learn.

Theme 5: Interacting often and constructive two-way communication builds stronger relationships. This theme related to the research question. Participants' responses to

interview questions 7, 8, 10, 11, 12, and 14 addressed open and constructive two-way communication between teachers and students that builds stronger relationships. All participants agreed that developing and nurturing continuous, open two-way communication between teacher and student, and students and their colleagues was an essential and valuable skill to possess.

Table 9

Faculty feelings on Instructional leadership, Teaching Styles, and the Classroom Environment

Feelings	Participant # (N=6)
Instructional Leadership	
Effective instructional leadership is paramount to help guide students learning and academic success	6
A standardized nursing program and curriculum provides clear and transparent direction and expectations for all to follow	6
Teaching Style	
Adopting a multidimensional teaching approach is essential to improving student learning experiences and learning outcomes	5
Traditional one-dimensional teaching style is challenging for students who respond to different teaching and learning styles	5
Faculty prior experience with at-risk and high-risk students make it easier to identify them	5
The Classroom Environment	
A more collaborative learning environment in the classroom encourage students to be active participants in their own education	6
Faculty feel more hands on, interactive and supportive of students	6
A structured collaborative learning environment make early identification of students struggling with certain nursing concepts and skills much easier	6
A collaborative learning environment facilitates and encourages knowledge sharing, improves critical thinking, problem-solving, and effective decision-making skills.	5

Participant D stated: "effective communication between teachers and students in the classroom setting creates an overall positive learning experience for students." Participants indicated that effective communication helped teachers and students develop active listening and verbal communication skills. The ability to express oneself adequately when sharing information helps to develop, strengthen, and facilitate successful building relationships with others. All participants agreed that poor and fragmented communication creates barriers in communication and learning, lack of trust, frustration, and tension between administrators and teachers, administrators and students, teachers and students, and students with their peers. Participants indicated that in the classroom setting, poor communication minimized the teaching capabilities of teachers and hindered the learning potential and academic performance of students.

Participant A indicated that every aspect of the integrated learning intervention practice system, the proactive strategic remediation approach, S.I.M.P.L.I.I.C.I.T.Y., and the LMS Moodle supported and facilitated effective two-way communication and building stronger faculty-student relationships. Participant D explained that leadership and faculty established an opened door policy allowing students to come to speak to teachers when they felt that they needed help with a course, assignment, to review their academic progress, and learning options. The integrated learning intervention practice system provided faculty members the time and opportunity to assess and determine where students are and where they are supposed to be per the expectations of the course and meeting the minimum academic progression standards.

Participants E expressed that students seek the assistance of a faculty member and school administrators for professional and personal help when the need arises. Participant F stated, "our students know when they come to meet with us; they are in a safe, positive, and judgment-free environment." Students are encouraged to speak candidly about the problems and barriers he or

she experiences that is negatively impacting their academic progress. The modernization of the nursing curriculum with the LMS platform has improved the mode, frequency, and the time in which school administrators and teachers and students, and teachers-students, and colleagues communicate. Participant enthusiastically stated, "there exist no boundaries with communication with the LMS Moodle. We can communicate with each other anytime and from anywhere."

# Category 3: Integrated Learning Intervention Practice Systems and Proactive Strategic Remediation Approaches

Category three explores the different components of the integrated learning intervention practices system and the proactive strategic remediation approach and its effect on teaching and learning approaches. This category addressed the study's research question: What are the experiences of nursing school administrators and nurse educators with utilizing a fully integrated learning intervention system that includes proactive remediation efforts throughout a prelicensure vocational educational program?

Participant responses to research interview questions 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, and 15 revealed six recurring themes that corresponded to this category (see Table 10). This section discusses six central themes: (6) Integrated learning intervention practice systems and proactive remediation approaches provide holistic teaching and learning approaches, (7) Collaborative learning environments promote active learning and effective communication, (8) Tap into educator's expertise with learning interventions and strategic remediation best practices, (9) Mandatory student academic advisory assessments, facilitate early identification of underperforming students, (10) Taking ownership of student education and learning success is the key to academic success, and (11) Improving the integrated learning intervention practice system and the proactive strategic remediation approach (see Table 10).

Table 10 Category 3, Central Themes and Corresponding Research Interview Questions

Category	Themes	Interview Questions
Category 3:		
	6. Integrated learning intervention practice systems and	6, 7, 8, 9, 10,
Integrated	proactive remediation approaches provide holistic	11,12, 14
Learning	teaching and learning approaches.	
Intervention		
Practice System and Proactive Strategic	7. Collaborative learning environments promote active learning and effective communication.	8, 10, 11,14
Remediation Approaches	8. Tap into educator's expertise with learning interventions and strategic remediation best practices.	5, 6, 7, 8, 9, 11
	9. Mandatory student academic advisory assessments, facilitate early identification of underperforming students.	7, 8, 9, 12
	10. Taking ownership of student academic and learning is the key to academic success.	6, 7, 8, 9, 11, 12, 13
	11. Improving the integrated learning intervention practice system and the proactive strategic remediation approach.	15

Theme 6: Integrated learning intervention practice systems and proactive remediation approaches provide holistic teaching and learning approaches. This theme addresses the research questions. This theme offers insight into how participants felt that the integrated learning intervention practice system and proactive strategic remediation approach affected faculty teaching and student learning in the selected VN program. This theme was referenced often in participants' transcribed interview transcripts and the researcher's journal notes in response to interview questions 6, 7, 8, 9, 10, 11, 12, and 14 (see Table 10).

The findings of this study revealed that the integrated learning intervention practice system was a multi-component inquiry-based teaching and learning system. It encourages faculty

members to adopt multi-dimensional teaching approaches to enhance their teaching styles and student learning experiences. In turn, faculty members help students be accountable and responsible for their education. Students are taught to seek out effective ways to build on prior knowledge or fill knowledge gaps due to a deficiency in learning. The multi-components of the integrated learning intervention practice system consists of a collaborative learning environment, integration of standardized tests and exams into the curriculum, mandatory student academic advising assessments, proactive strategic remediation approaches, the new learning method S.I.M.P.L.I.C.I.T.Y., modernization of the curriculum and computerized testing with the LMS Moodle, and the use of the simulation lab using visual learning and nursing education software for adaptive learning and adaptive quizzing (see Table 11).

All six participants agreed that the integrated learning interventions practice system's multi-component teaching and learning method created a more robust, rigorous, and dynamic nursing curriculum. Participants reported that the implementation of the integrated learning interventions practice system facilitated the standardization of the program and curriculum. The entire nursing curriculum is standardized per the vocational nursing essentials and Elsevier Evolve nursing education textbooks. It created a program and curriculum with a methodological and systematic learning environment that touched every sphere of the academic experience. Only five participants reported that this system made the curriculum easier to follow (See Table 12).

Participants shared that the integrated learning interventions practice system established an institution-wide collaborative learning environment that enhances faculty teaching and student learning experience and learning outcomes. The collaborative learning environment facilitates more interaction and active learning between faculty, students, and colleagues. It helped reduce communication, educational, and learning barriers. Educators were able to adopt multi-

dimensional teaching approaches and adapt their teaching strategies to help students learn and retain what was taught better. In the collaborative learning environment, participants shared that they were able to spend sufficient time interacting and evaluating students to help students improve their learning experiences, academic performances, and learning outcomes.

According to participants, the implementation of the integrated learning intervention practice system helped align the LMS Moodle and learning method S.I.M.P.L.I.C.I.T.Y within the nursing program and curriculum cohesively. The LMS Moodle helped to modernize the nursing program and curriculum. The LMS Moodle allowed the integration of computerized standardized testing and examination into the curriculum. Thus, made developing, administering, storing, tracking, monitoring, and reporting student tests and quiz grades easier for the faculty and nursing school administrators. Five participants commented that frequent testing of students on nursing concepts throughout a quarter promoted regular studying to increase understanding and comfortability with nursing concepts taught. Participant D mentioned that frequent testing and faculty assessments of students' knowledge of nursing concepts make it easier to identify students at-risk and high-risk of failure earlier and provide the necessary academic assistance promptly to overcome current knowledge gaps in real-time.

All participants agreed that the bi-quarterly mandatory student academic advising assessment ensured early identification of underperforming students, especially if knowledge deficits went unnoticed in the classroom setting. Only five participants indicated that bi-quarterly mandatory student academic advising demonstrated to students that faculty members and school administrators were invested and committed to students' academic success. Participants felt under this new system; faculty members have sufficient time to identify and address student gaps of knowledge promptly and appropriately. Participants indicated that faculty members and

student usage of standardized educational resources and exams such as the simulation lab and Elsevier's nursing education software tests that reinforced information taught instrumentally improved student learning experiences and learning outcomes. Two participants mentioned that their experience with the integrated learning intervention practice system and proactive strategic remediation was an eye-opening experience (see Table 12).

All six participants indicated that the proactive strategic remediation phases throughout each quarter provided students with an adequate amount of time to remediate, fill knowledge gaps, and meet minimum academic progression standards (See Table 14). Participants shared that the proactive strategic remediation process initiates after a student undergoes the mandatory student academic advisory assessment and is identified as at-risk or at high-risk of failure. Proactive strategic remediation in this program was conducted throughout the nursing curriculum, twice per quarter, based on the needs of early identified underperforming students and the areas of academic weakness. Participants explained that the nursing program was composed of four quarters; each quarter was 12 weeks in duration. At week six of each quarter, students undergo mandatory student academic advising assessment; each students' academic progress were reviewed, and identified underperforming students were provided with proactive strategic remediation. At week 12, all students' academic progress in a course was re-evaluated. Students who have failed a course will undergo a mandatory ten-day remediation period. The ten-day remediation period is offered three times during the 48 weeks, the end of quarter 1, the end of quarter 2, and the end of quarter 3 (see Table 13). Participant F added: "students who failed any of the ten-day remediation processes are not permitted to matriculate to the next quarter and dismissed from the program."

Six participants agreed that the proactive strategic remediation approach was a more effective, efficient, and time-sensitive remediation approach than the traditional reactionary remediation approach (See Table 14). Participant A stated: "in this program, the traditional remediation efforts were always reactionary. After failing a course, a student only had one opportunity to undergo remediation." Typically, the programs traditional remediation provided students who failed a course, at the end of a course, academic support for a short period to manage knowledge deficits. Participant E mentioned his experience with traditional remediation involved: "going over test questions and providing the rationale for the correct answers at the end of a course or quarter." Students then had a second chance to retest to pass the failed course.

Participants shared the fact that the proactive remediation approach in this program provides identified underperforming students' academic support at the mid-point and at the end of a nursing course in each quarter made this process much more strategic and impactful.

Participant E added:

I do not just go over the rationale of correct answers with students. This does little to help improve students' critical thinking, problem-solving, and effective decision-making when confronted with clinical scenarios on the test or class exercises.

During the proactive strategic remediation process, students take in-house standardized exams, were exposed to NCLEX type clinical case questions, and Elsevier nursing education software's visual learning, adaptive learning, and adaptive quizzing to help students fill in gaps of knowledge of nursing concepts studied. Participants shared that they felt that the proactive strategic remediation approach yielded higher learning outcomes (see Table 14). Participants believed that this approach significantly contributed to increased students' and faculty members' rates of satisfaction with the nursing program. Participants D stated compared to other VN

programs they were previously employed; this vocational nursing program's proactive strategic remediation approach provided a much more comprehensive remediation approach. She stated: "It yields better academic and learning outcomes short-term and long-term for students, teachers, school administrators, and the VN program." Participants indicated that tailoring remediation strategies allowed faculty members to meet the specific learning needs of an underperforming student. Participant C stated: "during the proactive strategic remediation process, faculty members work with underperforming students to help identify areas where the student is academically weak." A participant mentioned that both the faculty and the underperforming student choose the best course of action to address his or her academic and learning needs to ensure that he or she meets the level of competency required in each course to academically progress.

Theme 7: Collaborative learning environments promote active learning and effective communication. This theme was revealed in participants transcribed interview transcripts and the researcher's journal notes in response to interview questions 8, 10, 11, and 14. Establishing a collaborative learning environment in the classroom setting was an integral component of the integrated learning intervention practice system and proactive strategic remediation approach. This theme provided insight into participants' lived experiences and perceptions with the phenomena studied. This theme helped address the research questions (see Table 9).

The collaborative learning environment is an integral component of the integrated learning intervention practice system and the proactive strategic remediation approach. All participants indicated that establishing a collaborative learning environment and the integration of the LMS Moodle as part of the program and curriculum, drastically improved the two-way

communication and learning process between leadership, faculty, and students and colleagues significantly. In the classroom setting, the collaborative learning environment increased the level of interaction between faculty members and students and students and their peers during in-class discussions. Each participant mentioned that in a collaborative learning environment, they felt more hands-on and more supportive of students learning experiences and learning outcomes. Students learned to become active participants in their education and learning (see Table 9).

Table 11

Components of the Integrated Learning Intervention Practice System

# **Integrated Learning Intervention Practices**

- Collaborative Learning Environment
  - o Peer-to-peer sessions (active learning)
  - Tutoring
- Integration of Test and Exam into Curriculum:
  - o ATI Testing
  - HESI Specialty Exam
  - o In-house standardized exams
  - NCLEX type questions (testing and quizzing)
  - NCLEX Seminar Preparation
- Mandatory Academic Student Advising Assessment offered week-6 and week-12 of each quarter: q1, q2, q3, q4
  - o Early Identification of Underperforming Students
  - Tailored SMART (specific, measurable, appropriate, reference/resources, timetable) Student Success Plan: focused on academic/clinical skill weak areas, study habits, time management.
  - o Teacher -student one-to-one sessions
  - o Tutoring
- Modernization and Integration of the Learning Management System (Moodle) into the curriculum/program
- S.I.M.P.L.I.C.I.T.Y. (a learning method: Standardize the curriculum/program, introduce new concepts/ideas, Modernize the curriculum/program, Practice (repetition), Lasting learning, Integration, Critical (thinking), Implementation, Transparency, Yield.)
- Simulation Lab (Using Elsevier's Visual Learning)
- Elsevier Evolve's Nursing Education Software (Adaptive Learning and Adaptive Quizzing, Essay Practice)

Table 12

Faculty Opinions About the Integrated Learning Intervention Practice System

Opinions	Participant # (N=6)
This multi-component teaching and learning method creates a more robust, rigorous, and dynamic nursing curriculum.	6
The collaborative learning environment enhances faculty members teaching and student learning experience.	6
Creates a methodological and systematic learning environment.	6
Aligns LMS Moodle and S.I.M.P.L.I.C.I.T.Y within the nursing program and curriculum cohesively.	6
Increase student learning outcomes.	6
The collaborative learning environment facilitates more interaction between faculty members, students, and colleagues.	6
Reduces communication, learning, and educational barriers.	6
Touches every sphere of the academic experience.	6
Ensures sufficient time is spent improving student's learning experiences, academic performances, and learning outcomes.	6
Multi-dimensional teaching approaches help faculty adopt teaching strategies that help students learn and retain what is taught better.	6
Bi-quarterly mandatory student academic advising facilitates early identification of underperforming students.	6
Curriculum easier to follow.	5
Frequent students testing, promote regular studying to increase understanding and comfortability with nursing concepts taught.	5
Faculty have sufficient time to identify and address student gaps of knowledge, promptly and appropriately.	5
Standardized educational resources and exams reinforce information taught, improves student learning experiences, and learning outcomes.	5
In-class group assignments facilitate peer-to-peer teaching.	5
Help build stronger teacher and student relationships.	5
An eye-opening experience.	3

Table 13

Components of the Proactive Strategic Remediation Approaches

## **Remediation Activities**

- Mandatory Academic Student Advising Assessment offered week-6 and week-12 of each quarter: q1, q2, q3, q4
  - o Early Identification of Underperforming Students
  - o Tailored SMART Student Success Plan (specific, measurable, appropriate, reference/resources, timetable): focused on academic/clinical skill weak areas, study habits, time management.
  - o Teacher -student one-to-one sessions
  - Tutoring
- 10-day Remediation process offered three times a year; between quarters: q1-q2; q2-q3; q3-q4
  - o Remediation: Tailored SMART Student Success Plan (specific, measurable, appropriate, reference/resources, timetable); focused on academic/clinical skill weak areas, study habits, time management.
  - o Teacher -student one-to-one sessions
  - o Tutoring
  - o ATI Testing
  - o HESI Specialty Exam
- Simulation Lab (Using Elsevier's Visual Learning)
- Elsevier Evolve's Nursing Education Software (Adaptive Learning and Adaptive Quizzing, Essay Practice)

Table 14

Faculty Opinions on the Proactive Strategic Remediation Approaches

Opinions	Participant # (N=6)
Multiple remediation phases throughout each quarter allow students more time to remediate, fill knowledge gaps, and meet minimum academic progression standards.	6
A more effective, efficient and time-sensitive approach than the traditional reactionary remediation approach	6
Tailoring remediation strategies allows the faculty to meet specific learning needs of an underperforming student	6
Yields greater learning outcomes	6
Increases students and faculty rate of satisfaction	5

The findings in this study revealed that the collaborative learning environment facilitated active learning in students when a student was engaged in knowledge sharing exercises with others. It helps enhance critical thinking and problem-solving that leads to effective decision-making. Participant B stated: "It is important for faculty and students functioning within a collaborative learning environment to realize that everyone's input in the collaborative learning environment is valuable." Participants agreed that during collaborative knowledge sharing and problem-solving sessions active listening skills, faculty members and students showing and receiving respect and understanding for one another's perceptions, value systems, and expertise, was significant.

Participants all agreed that a structured collaborative learning environment made it easier to evaluate students' understanding and grasp of nursing concepts and nursing skills.

Participants indicated that the collaborative learning environment facilitated the early identification of students struggling with certain nursing concepts and skills. Participants F shared that during collaborative knowledge sharing sessions (i.e., peer-to-peer presentation), faculty had the time and opportunity needed to thoroughly assess each student's understanding of assigned nursing concepts. For students identified as having a weak understanding of a given concept, the faculty finds the time to meet with these students to find the appropriate learning approach needed to help the student fill that learning gap(s) on the nursing concept taught.

Almost all participants agreed that a collaborative learning environment facilitates and encourages knowledge sharing, improves critical thinking, problem-solving, and effective decision-making skills. One participant noted:

Not all students will feel comfortable speaking up or sharing their thoughts and opinions with others. Educators should be cognizant of that and find strategic ways to get them comfortable with the idea of collaborating with peers.

Educators may need to have several one-to-one sessions with these students to appropriately ascertain their understanding and grasp of nursing concepts and nursing skills taught before the first-course exam.

Theme 8: Tap into educator's expertise with learning interventions and strategic remediation best practices. This recommendation was another one of the central themes revealed from the review of participants' transcribed interview transcripts and the researcher's journal notes in response to interview questions 5, 6, 7, 8, 9, and 11 (see Table 10). This theme relates to the research question as it addresses participants' level of experience with at-risk and at-high-risk students, learning interventions and remediation practices in nursing education. All participants agreed that nurse educators with prior experience with varied student learning interventions and remediation approaches use evidence-based approaches to maximize student learning to help underperforming students to achieve academic success.

Three participants mentioned it was not enough for a nurse educator to have past experiences with underperforming students, learning interventions, and remediation efforts. For an educator to effectively assist an at-risk and high-risk student, the educator had to have a fundamental understanding of the difference between the student at-risk of failure and the student at high-risk of failure. Identifying an underperforming student allows the educator to provide the most appropriate academic and learning support to help the student fill their knowledge gaps to meet minimum academic progression standards.

Participants' definition of the student at-risk of failure and students at high-risk of failure were very similar, with small differences. Participant A stated:

A student that is at-high risk of failure is a student who is barely meeting the minimum competencies, while a student at-risk of failure is not meeting the minimum standard competencies. High-risk students must be careful because they are at the borderline of failing a course or the nursing program.

## Participant B stated:

The high-risk student meets the required minimum passing rate for a course and the school grading criteria.....the at-risk student is not passing the course or the program and has a high possibility of dropping out of the nursing program.

Participant C stated, "At-risk students are failing or will fail a course or program. The high-risk student has a high possibility of failing a course." Participant E defined, the student high-risk of failure, "as a student who is barely passing the course, while the at-risk student of failure students is not passing the course." Participant C has ten years of experience as a nurse educator in nursing education. She mentioned that for nurse educators to have a significant impact on the learning outcomes of students at-risk and high-risk for failure, they must have the experience and capability to communicate effectively, work, build, and sustain trusting and stable relationships with underperforming students. Participant C stated: "Educators must help at-risk and high- risk students set realistic and attainable goals to overcome challenges and obstacles that prevent students from progressing academically."

Participant B with five years of experience as a nurse in nursing education, stated:

Educators must encourage underperforming students to adopt behaviors and study habits that promote actions geared towards collaborative knowledge sharing, problem-solving, critical thinking, and evidence-based decision-making process.

Participant D has 15 years of experience working with underperforming students in nursing education. Participant D stated: "Nursing educators should expect to encounter students at-risk and high-risk for failure in every student cohort." Participant D indicated that underperforming students require additional guidance and academic support to meet minimum academic progression standards. Participant F has seven years of experience as a nurse educator in nursing education. She recommended that nurse educators better prepare themselves by utilizing proactive, evidence-based learning intervention and remediation practices to adequately address the academic and learning needs of identified underperforming students more readily.

Theme 9: Mandatory student academic advisory assessments, facilitate early identification of underperforming students. This theme was another theme revealed from participants' transcribed interview transcripts and notes taken from the researcher's journal. This theme was revealed from participants' responses to interview questions 7, 8, 9, and 12 (see Table 10). This theme relates to the research question as it addressed participants' experiences with mandatory student academic advisory assessments and early identification of underperforming students utilizing the integrated learning intervention practice system and proactive strategic remediation approaches.

Early identification of underperforming students within the nursing program and curriculum by the nursing school administrator and nurse educators facilitated and supported the use of the collaborative learning environment in the classroom setting, the LMS Moodle to track

and monitor student course activities, and the mandatory student academic advising assessment periods. Participant A explained that leadership established the bi-quarterly mandatory student academic advising assessment period in all four quarters to act as the nursing program and curriculum academic progression checkpoints. All participants agreed that the mandatory student academic advising assessment periods helped to facilitate and confirm the identification of student at-risk for failure, and students at high-risk of failure early (see Table 12). Participants reported that the nursing program offers bi-quarterly mandatory student advisory assessment meetings between faculty, and each student occur week six and week twelve of every quarter of the 48-week program.

Nurse educators meet with each student to review and discuss the student's academic progression in that quarter and address educational and learning deficits in real-time. Participants were clear that the mandatory student academic advisory assessment initiates the proactive strategic remediation process after a student is identified as an at-risk or at high -risk student of failure in a course. Nurse educators provide the student with the most appropriate academic and learning methods and resources to ensure that he or she realizes the learning objectives and meets the minimum progression standard. Participant B stated:

The regular faculty-student one-to-one mandatory student academic advisement meetings at week-6 and week-12 of each quarter to evaluate each students' academic progress are critical to maintaining effective communication with our students.

Participant B explained: "during mandatory student advisory meetings, we form collaborative partnerships with our student." Nurse educators and students are engaged in proactive activities involving knowledge and resource sharing to help students reduce or eliminate educational and learning barriers. Nurse educators and students create realistic and

tailored remediation SMART (specific, measurable, appropriate, reference/resources, timetable) weekly student success plans. These student success plans focus on academic and clinical skill weak areas, tutoring services, incorporating proper study habits, and proper time management plan that reflects each student's daily schedule (see Table 11 & 13). Participant A stated:

The goals here is to provide underperforming students with the most appropriate academic and learning methods and resources to fill student gaps of knowledge adequately. To improve their academic performance, learning outcomes, and overall student success to ensure that he or she realizes learning objectives and meets minimum academic progression standards.

## Participant B revealed:

Sometimes there are students who have no family or work issues that act as a barrier to their school success. Some students just have poor study habits and thus have problems passing their quizzes, tests, and fail the overall nursing course.

Participant B recommended that throughout each quarter, teachers have open and honest communications with underperforming students about their study habits and time management skills. She added: "Observing and assessing the student in the classrooms is essential to see how they learn and determine if their learning is style working for the student." If not, the nurse is in a position and have access to educational resources to help the underperforming student to find the best learning style that can improve their study habits to maximize his or her learning outcomes.

Participants indicated that the mandatory student advisory assessment period was also a time for nurse educators and nursing school administrators to receive honest feedback from students about the students overall learning experience with the nursing program and curriculum. These regular mandatory meetings are crucial to improving student academic performance and

overall student success. Students are asked to complete anonymous course evaluation online surveys on LMS Moodle quarterly. The survey is generated by the nursing school administrator. Student are asked to provide honest feedback on nursing program leadership, nursing program, and curriculum policies that effective teaching and learning experience, nurse educators teaching approaches, and student learning experiences and outcomes.

Theme 10: Taking ownership of student education and learning is the key academic success. This theme was another theme revealed from participant's transcribed interview transcripts and notes taken from the researcher's journal. This theme was noted several times in participants' responses to interview questions 6, 7, 8, 9, 11, 12, and 13 (See Table 10). This theme relates to the research question as it addresses participants' experiences and perceptions of educators' commitment and taking ownership of student education and academic success as it related to the integrates learning intervention practice system and proactive strategic remediation approaches.

The findings of this study demonstrated that school administrators, teachers, and students' commitment and taking ownership of students' educational and learning processes is vital to a students' academic success. Participant A mentioned that nursing school administrators (organizational leaders) and nurse educators (instructional classroom leaders) are in an ideal position as an educational leader to create shared vision and meaning with students that allow all stakeholders to work together to achieve a common goal. That is, improving the student learning experience, student academic performances, learning outcomes, and, ultimately, achieve academic success.

Participant D pointed out, the establishment of the collaborative learning environment, educational leaders created a learning environment that empowers students to take ownership of

their education under proper guidance and academic support. Through the collaborative learning environment educators can help encourage students to become active participants of their learning experiences and learning outcomes under the guidance of a skilled and knowledgeable nurse educator. The nurse educator assigns a group of students a nursing concept to learning and present during the peer-to-peer sessions. During the peer-to-peer session students actively interact with their peers discussing the clinical case. Afterward, engaging in active two-way communication, the student presenter receives constructive and reinforced feedback on their knowledgeability of the assigned subject from their teacher. Participant F stated:

For the two-way communication constructive /reinforced feedback process to be useful for both parties involved; it must be transparent, honest, and respectful of others' opinions to enhance the students' learning experience.

Participants all agreed that a student taking ownership of his or her learning and education means he or she is accepting total accountability and responsibility for their learning and education. Participant F added: "Taking ownership of ones' learning and education means the person is intrinsically motivated to becoming a lifelong learner." Setting goals to learn or master a skill to achieve personal growth, development, and success. Participant F explained:

This type of student, when aware of their knowledge gaps or have set goals they want to achieve, take necessary steps to find the right resources or become part of a learning environment that can enhance and advance their learning experience. They work hard to find the right mentor, educational, and learning resources to improve their learning outcomes to achieve success.

# Participant A stated:

Educators and student should always seek to create or be part of learning environments that stimulate and enhances your intellectual, personal, and professional growth and development. We do not know it all.

All participants referenced that mastering a skill requires exposure to mentors and expertise in said field or discipline to learn, practice, and grow. Active learning is a dual learning process. There is always a giver and receiver of information. Participants added that an environment where continuous two-way communication, welcomes regular constructive feedback reinforce knowledge helps facilitate knowledge sharing, and problem-solving. It encourages and provides proper guidance and direction for growth, development, and success.

Theme 11: Improving the integrated learning intervention practice system and the proactive strategic remediation approach. This theme addresses the research question.

Participants' responses to interview question 15 provides insight on participant opinions of their experience the integrated learning intervention and the proactive strategic remediation approaches by providing a recommendation on how it can be improved (see Table 15). All six participants recommended keeping the foundation of the integrated learning intervention practice system, the proactive strategic remediation approaches, and the learning method S.I.M.P.L.I.C.I.T.Y., the same.

Participants agreed that the integrated learning intervention practice system, the proactive strategic remediation approaches, and the learning method S.I.M.P.L.I.C.I.T.Y., were successful at achieving their objectives, improving student learning experiences, academic performances, learning outcomes, to achieve academic success. Participants all agreed that leadership should

fine-tune complex concepts within the integrated learning intervention practice system, the proactive strategic remediation approaches, and the learning method S.I.M.P.L.I.C.I.T.Y., to accommodate new student cohorts, as needed. Two participants recommended that educators make necessary adjustments to the curriculum to present nursing concepts from a simple (novice) to the complex (expert) approach and to treat each cohort uniquely.

Five participants recommended that leadership establish quarterly professional development training workshops to help faculty enhance and maintain fluency, competencies, and skills. Participants suggested ongoing faculty developmental training and workshops in best-practices of integrated learning intervention practices, proactive strategic remediation approaches, mandatory student academic advising assessments, early identification of at-risk and high-risk student strategies, Moodle (LMS) technology, and the learning method S.I.M.P.L.I.C.I.T.Y. (see Table 15). Participant D stated:

School leadership must provide the faculty and students with ongoing educational and technological support and training. We must have the ability to continue to build on the knowledge we acquired and stay current on the best practices of integrated learning intervention practice system, proactive strategic remediation process, the LMS Moodle, and the learning method S.I.M.P.L.I.C.I.T.Y.

Many of the nursing program's students are non-traditional students, and some find it a challenge to work and attend school fulltime to maintain a home and family. Five participants recommended that the nursing program offer students ongoing access to academic development workshops, resources, and services. The academic workshops, resources, and services recommended include, but are not limited to: counseling, stress management skills, effective student study habits, test-taking strategy skills, time management skills, and tutoring services.

Participant E pointed out, "school leadership must provide students access to qualified counselors who can provide students with the assistance they need that are beyond a nurse educators' scope of practice." Participant A recommended that this VN program's current admission process adopt the robust and rigorous admissions criteria of other VN programs across the nation. Thus, ensuring that the VN program has greater access to qualified VN candidates. He stated: "A qualified VN candidate is more likely to be committed to their studies as students and invested in becoming superior quality nursing professionals."

Table 15

Recommendations to improve the integrated learning intervention practice system and proactive strategic remediation approaches in the nursing program

Recommendations	Participant # (N=6)
Keep the integrated learning intervention practice system and the proactive strategic remediation approaches as it is	6
Continue providing access to academic and technological educational resources that enhance teaching and learning	6
Fine tune intricate concepts within S.I.M.P.L.I.C.I.T.Y. to accommodate new student cohorts and faculty, as needed	6
Provide faculty professional development training and workshops, ongoing, in:  - Integrated learning intervention practice system,	5

- Proactive strategic remediation approaches,
- Mandatory student academic advising assessments,
- Early identification of at-risk and high-risk students,
- Moodle (LMS) technology, and
- S.I.M.P.L.I.C.I.T.Y.

Provide student academic development workshops and services, ongoing:

- Counseling,
- Stress management skills,
- Student study habits,
- Test-taking strategy skills,
- Time management skills, and
- Tutoring services.

Present nursing concepts/skills from simple (novice) to complex (expert)

2

5

# **Summary**

This chapter discussed the results and findings of the study. The nine-step modified van Kaam data analysis model adapted from Moustakas was used to analyze and identify emerging themes from the phenomenological data collected. The collected data was coded, grouped, and analyzed manually by the researcher. Chapter four discussed and provided detailed examples of each of the nine-steps of the modified van Kaam data analysis of each participant's interview transcripts. The collected data was color-coded, labeled, and grouped during horizontalization, then reduced or eliminated based on its relevancy to participants' lived experience with the phenomenon studied. The reduced data was grouped once more to find meaning units and invariant constituents that showed themes patterns validated against the data from participant's transcribed interview transcripts. The data analysis was presented in detail with examples: individual textural descriptions, individual structural descriptions, composite textural descriptions, composite structural descriptions, and a composite structural-textural description to create meaning and essence of the lived experiences of a nursing school administrator and five nurse educators using a fully integrated learning intervention practice system that includes proactive strategic remediation approaches to address the academic, educational, and learning needs of students in a pre-licensure vocational nursing education program. Direct quotes were used from participants' interview transcripts to validate the study's findings.

Data analysis revealed three main categories and the eleven central themes with strong interconnecting relationships related to the research question. Thus, it depicted the lived experiences of a nursing school administrator and five nurse educators using the integrated learning intervention practice system and the proactive strategic remediation approach in a

vocational nursing education program to address student's learning experiences, academic performance, and learning outcomes.

All study participants had previous experience working with students at-risk and highrisk of failure. All participants had prior experience utilizing learning interventions and remediation efforts, but only as two separate processes. The lived experiences of study participants with the phenomena studied are unique. The results revealed that participants described their experience with the fully integrated learning intervention practice system that includes proactive strategic remediation approaches as a dynamic, engaging, compelling, powerful, positive, proactive, eye-opening, and less stressful experience. The results showed that participants experienced increased satisfaction working within an organizational and classroom culture that promotes educational efficacy. Study findings also showed that, in a collaborative learning environment implemented institution-wide, participants felt that educational leaders, educators, and students all had a voice in the decision-making process that respectively, affected their teaching and learning outcomes. The results showed that participants described being more supportive, more hands-on, more interactive in the classroom setting, and more involved in student learning experiences and learning outcomes. Participants described a learning environment that promoted active learning, taking ownership of student education, and learning to achieve desired outcomes.

Participants described a more robust, rigorous, dynamic, standardized, and modernized nursing program and curriculum that helped reduce communication, educational, learning, and technological barriers. Participants reported that the new program and curriculum infrastructure made the program easier to follow, facilitated identifying and addressing student gaps of knowledge, promptly and appropriately much faster, decreased the faculty workload, anxiety,

and stress level amongst faculty members. Results showed that nurse educators adopting multidimensional teaching styles enhanced faculty teaching styles led to seeing improvements in student learning experiences and learning outcomes. Participants reported building stronger faculty-student relationships.

The findings of this study show that educational efficacy for underperforming students in a nursing education program and the classroom setting requires educational leaders and educators to work together, be proactive, and be at the forefront of academic and instructional issues when advocating for change. Educational leaders and educators must use evidence-based innovative academic, educational, learning, and technological methods to effectively address students' knowledge gaps, learning deficits, and diverse learning styles. Thus, these methods could have a positive influence on student learning experiences, academic performances, learning outcomes, and student achievement.

Chapter five presents a detailed discussion of the interpretation of the findings from the data presented in chapter four. The chapter also discusses the implications of this study's findings for practice. This chapter presents the limitations of the study. Chapter five also provides recommendations for future research. Chapter five presents the conclusion of the study.

## CHAPTER 5

#### CONCLUSION

The findings of this descriptive phenomenological study revealed that the lived experiences of the nursing school administrator and nurse educators utilizing the fully integrated learning intervention practice system that includes proactive strategic remediation approaches, to address student knowledge deficits, learning experiences and learning outcomes within a vocational nursing program and curriculum, to be unique. This study aimed to provide a detailed, in-depth description of nursing school administrators and nurse educators' experiences with utilizing a fully integrated learning intervention system that includes proactive remediation approaches at all levels of a selected VN program and curriculum activities. This chapter gives a detailed discussion of the interpretation of the findings from the data presented in chapter four. The chapter will also discuss the implications of this study's findings for practice, the limitations of the study, recommendations for future research, and provide a conclusion of the study based on the results presented from the data.

#### **Statement of the Problem**

Nursing students failing to meet the minimum academic progression standards to complete and graduate the nursing program is a significant concern for many nursing education programs (Cherkis & Rosciano, 2015; McGann & Thompson, 2008; Pennington & Spurlock, 2010). Ineffective leadership and unclear policies, procedures, and regulations at both the organizational level and in the classroom-setting often contribute to educational leaders and educators' inability to adequately identify, address, and overcome inconsistencies, and deficiencies within the nursing program, nursing curriculum, faculty teaching, and student learning. These academic, educational, and learning inconsistencies and deficiencies within the

nursing program and curriculum, teaching, and learning processes have adversely influenced students' learning experiences, academic performances, and learning outcomes (Dube & Mlotshwa, 2018). Nursing educational leaders implementing proactive and strategic learning intervention practices and remediation approaches integrated within the nursing education program, and curriculum provides both nurse educators and students the opportunity to have access to academic, educational, learning, and technological support and resources needed to help students achieve academic success in the short and long-term (Dube & Mlotshwa, 2018; Horton, Polek, & Hardie, 2012).

## **Statement of the Purpose**

The purpose of this descriptive phenomenological study was to explore and gain greater insight on the lived experiences of a nursing school administrator and five nurse educators using a fully integrated learning intervention practice system that includes proactive strategic remediation approaches to address nursing student's academic, educational, and learning needs at all levels of a pre-licensure vocational nursing education program. This research study sought to determine the effectiveness of the implementation of a fully-integrated learning intervention practice system, and proactive strategic remediation approaches into a nursing program and curriculum had on early identification of students at-risk and high-risk for failure, improving students' learning experiences, academic performances, learning outcomes, and NCLEX readiness. The following research question provided the guiding framework for this study: What are nursing school administrators' and nurse educators' experiences with utilizing a fully-integrated learning intervention practice system that includes proactive remediation efforts throughout a pre-licensure vocational nursing education program?

## **Summary of the Study**

Chapter 1 introduced the research study. The chapter presented the purpose of the study. The focus of this study was to explore and gain insight into a fully-integrated learning intervention practice system with proactive strategic remediation approaches at all levels in a pre-licensure vocational educational nursing program from the perspectives and lived experiences of nursing school administrators and nurse educators. Chapter 1 included a statement of the problem of the study and the research question. The chapter presented the theoretical framework that helped to focus and guide the study. Chapter 1 included information on the assumptions, delimitations, and potential limitations of the study. This chapter provided a detailed discussion of the rationale and significance of the study. The chapter also included a list of relevant definitions of terms used throughout the study.

Chapter 2 focused on the review of the literature. The chapter provided a detailed review of relevant research literature that correlates directly with the study's statement of the problem, the purpose of the study, and the research question. The chapter presented a review of nursing education-related literature that helped to explore the phenomenon investigated: pre-licensure nursing education program nursing programs and curriculum, predictors of student readiness for nursing school and the NCLEX readiness, integration of teaching and learning intervention practices, strategic remediation approaches, nursing educators teaching and nursing student learning styles, early identification of at-risk and high-risk students for failure, and improving student performance and learning outcomes. The chapter presented in detailed the theoretical framework that guided the study: systems theory of teaching and learning.

Chapter 3 presented the methodology of this research study. The chapter provided a detailed description of the methodological research design used in this study. The qualitative

descriptive phenomenological study design was selected as the appropriate research design because it helped describe the essence, nature, and commonalities of the participants who experienced the phenomenon studied (Balls, 2009; Tuffour, 2017). The chapter presented the research setting: a pre-licensure vocational nursing education program in a small, single-campus, private institution of higher learning located in a metropolitan city in the state of Texas. The chapter included a detailed discussion on the recruitment process and participants' rights. The study required written approval before any recruitment or data collection from study participants from both the University of New England's IRB for the Protection of Human Subjects (Appendix A) and the academic institution where the research study took place (Appendix B). The study recruited participants through a single informational meeting at the research site and emails. Study participants received a detailed description of the study, its voluntary nature, its purpose and procedures, inclusion criteria, informed consent, and study participation rights. Only participants with signed informed consent were permitted to participate in this study.

Chapter 3 included a detailed description of the study's participant selection process and sample method. Purposeful sampling was used to select study participants. Study participants for this study were a nursing school administrator and nurse educators who were currently employed by the school, taught, and were actively involved with the implementation of the fully integrated learning intervention practice system and the proactive strategic remediation approach during the 2018-2019 academic school year. All interviews took place at a location easily accessible, convenient, and comfortable for participants, the VN program's main conference room.

Chapter 3 presented the data collection method. Data collection in this study was conducted using audio-recorded face-to-face, one-on-one in-depth semi-structured, open-ended interview question format generated by the researcher, researcher journal notes, and review of

documentation. Each participant brought to each interview session a copy of their curriculum vitae and course syllabi. Demographic information and educators teaching methods were obtained from these documents. All audio recorded interviews were transcribed verbatim. Chapter 3 presented in detail the process of bracketing and intuiting techniques, external auditing, member checking, and triangulation used to check the accuracy, credibility, and validity of the collected data and the analysis process. In this chapter, a detailed description of the nine-step modified van Kaam data analysis model adapted from Moustakas used to analyze and identify emerging themes from the qualitative phenomenological data collected from individual interviews. Also discussed in Chapter 3, was the potential limitations of this study: a lack of generalizability and accuracy, recall bias, and researcher-induced bias.

Chapter 4 discussed the results and findings of the study. All data collected from each of the six participants' transcribed interview transcripts were coded, grouped, and analyzed manually by the researcher. Chapter four discussed and provided detailed examples of each of the nine-step modified van Kaam data analysis model adapted from Moustakas used to analyze, identify emerging themes, and provided complex meaning to the qualitative phenomenological data collected (Statistics Solution, 2019; Sullivan & Bhattacharya, 2017). The nine-step modified van Kaam data analysis model includes: These nine steps include the processes of (a) horizontalization, (b) reduction and elimination, (c) clustering and thematizing the invariant constituents, (d) checking the themes against the data, (e) creating individual textural descriptions, (f) creating individual structural descriptions, (g) creating composite textural descriptions, (h) creating composite structural descriptions, and (i) creating a composite structural-textural description of the phenomenon being studied (Statistics Solutions, 2017; Sullivan & Bhattacharya, 2017). The data analysis presented provided direct quotes from

participants' transcribed interview transcripts. It validated the study's findings and provided meaning and essence of the lived experiences of a nursing school administrator and four nurse educators using a fully integrated learning intervention practice system that includes proactive strategic remediation approaches to address the academic, educational, and learning needs of students in a pre-licensure vocational nursing education program.

In chapter four, the data analysis revealed three main categories and eleven central themes with strong interconnecting relationships related to the research question. Themes identified in the literature review in chapter 2. The findings showed that the lived experiences of study participants with the phenomena studied were unique. The findings revealed that the lived experiences of study participants' using the integrated learning intervention practice system and the proactive strategic remediation approach in the vocational nursing education program and the curriculum were influenced by the organizational leadership and organizational culture, and the instructional leadership in the classroom setting. It significantly affected nurse educators' teaching styles, the learning environment, student learning experiences, academic performance, and learning outcomes. The findings from this study added to the existing studies in nursing education, the integration of learning interventions and strategic remediation approaches into the nursing program and curriculum, nurse educators adopting and adapting teaching styles to help identify and address students' knowledge deficits early, and improve student learning experiences, academic performances, and learning outcomes.

Chapter five provides a detailed discussion of the interpretation of the findings from the data identified in chapter four. Chapter 5 discusses the main categories and the central themes of the study presented in chapter four. The chapter also discusses the implications of this study's findings for practice. Chapter five reveals the limitations of the study. The chapter presents the

recommendations for future research and provides a conclusion of the study based on the results presented from the data.

# **Interpretation of the Findings and Conclusion**

Based on the perspectives of the lived experience of a nursing school administrator and nurse educators utilizing a fully integrated learning intervention practice system that includes proactive remediation efforts at all levels of the selected pre-licensure VN program, the study's findings showed that participants had a positive experience. Educational leaders and educators adopting and adapting evidence-based innovative academic, educational, teaching and learning, and technological methods into the nursing program and curriculum provides educators with the necessary support and guidance to effectively address students' knowledge gaps, learning deficits in a timely manner, and support diverse learning styles. The fully integrated learning intervention practice system that includes proactive strategic remediation approaches positively influenced educator's teaching experiences and significantly impacted student learning experiences, academic performances, learning, and achievement outcomes. The findings of this study show that educational efficacy for underperforming students in a nursing education program and the classroom setting is attainable. When advocating for change and successful outcomes within the nursing program and curriculum, it is imperative that nursing school administrators and nurse educators continue to work together with students in collaborative partnerships, and be proactive by staying at the forefront of academic, communication, educational, instructional, and learning issues that may arise.

The research question that guided this study was: What are the experiences of nursing school administrators and nurse educators with utilizing a fully integrated learning intervention system that includes proactive remediation efforts throughout a pre-licensure vocational

educational program? The results of the data analysis revealed a significant relationship and interconnection between three main categories and eleven central themes that addressed and answered the study's research question. The main categories found were: organizational leadership and the organizational culture, (2) instructional leadership, teaching styles, and the classroom environment, and (3) integrated learning intervention practice systems and proactive strategic remediation approaches. Category 1 provides a greater understanding of the relationship between organizational leadership, primary education organizational stakeholders (leadership, school administrators, faculty, staff, and students) and the organizational culture, and the influence they have on each other's beliefs, attitudes, and behaviors. Category 2 describes the impact the use of the fully integrated learning intervention practice system and proactive strategic remediation approaches in all facets of the nursing program and curriculum had on educator's instructional leadership, teaching styles and student learning styles and experiences, and outcomes in the classroom setting. Category 3 provides the different components of the integrated learning intervention practices system and the proactive strategic remediation approach and its effect on teaching and learning approaches.

Category 1 included: (1) effective leadership and mentorship create transformational changes institution-wide, (2) improving student academic experiences, performances, and learning outcomes is the goal, and (3) embrace change, technology, and innovative ideas to ensure educational efficacy. Category 2 included: (4) multi-dimensional teaching styles enhance faculty teaching, and student's learning experiences, and learning outcomes, and (5) interacting often and constructive two-way communication build stronger relationships. Category 3 included: (6) integrated learning intervention practice systems and proactive remediation approaches provide holistic teaching and learning approaches, (7) collaborative learning

environments promote active learning and effective communication., (8) tap into educator's expertise with learning interventions and strategic remediation best practices, (9) mandatory student academic advisory assessments, facilitate early identification of underperforming students, (10) taking ownership of student academic and learning is the key to academic success, and (11) improving the integrated learning intervention practice system and the proactive strategic remediation approach. The six participants provided detailed, in-depth descriptions of their lived experiences utilizing the fully integrated learning intervention practice system and proactive strategic remediation approaches in the VN program.

Theme 1: Effective leadership and mentorship create transformational changes institution-wide. Effective nursing educational leaders are change agents that see the need for change within a nursing education program and takes proactive steps to inspire, motivate, and creates changes within a nursing program culture that is vital to its survival and success in the long and short terms. Gaining buy-in from major educational stakeholders is crucial for the successful implementation of new program policies, protocols, or procedures within a nursing education program or school. Effective educational leaders must include the perspectives of nurse educators and students during the brainstorming and decision-making process, on program and curriculum policies that will affect their teaching and learning experiences, respectively. Participant A shared: "as a leader, it is important to be transparent about the new vision and policies of the program. We must ensure that both the faculty and students feel that their input has value, and they are in "control" of the outcomes of this new program vision and practices that impact their lives."

Organizational leader's behavior and values have a direct effect on their major educational stakeholders and influence the behaviors of its nursing education culture. An

ineffective leadership style can negatively impact educators' teaching experience and students learning experiences. The new educational leadership provided nurse educators with the academic, educational, and technological resources to facilitate and support the integration of a fully-integrated learning intervention practice system, proactive strategic remediation approaches, the collaborative learning environment, the learning method S.I.M.P.L.I.C.I.T.Y., and LMS Moodle within the nursing program. It provided educators with a more comprehensive, evidence-based, and proactive strategic approach to teaching and learning in the classroom setting. It supported, guided, and helped enhanced educators' teaching styles and teaching experiences within the classroom setting, which positively influenced student learning experiences, academic performances, and learning outcomes.

Theme 2: Improving student academic experiences, performances, and learning outcomes is the goal. Providing students with quality education and the necessary academic, educational, and technological resources and tools to be successful is the primary goal.

Educational leadership implementing a student-centered educational infrastructure that has a system of standards that sets and supports a structured curriculum schedule, standardized testing, and assignments that are per state board of nursing set guidelines and expectations, and enables educators to improve their quality of teaching, ensures that students achieve their academic and learning outcomes. A standardized educational infrastructure system allows school administrators, faculty members, and students to know the goals, objectives, and expectations of the program and courses beforehand, during, and after the course is completed. This educational environment significantly minimizes communication, educational, learning, and technological barriers. It promotes transparency, encourages autonomy and accountability, facilitates effective two-way communication. This educational environment can significantly help to facilitates,

supports, and enhances educators' teaching experiences and improve students' overall learning experiences, academic performance, and learning outcomes, long-term.

Theme 3: Embrace change, technology, and innovative ideas to ensure educational efficacy. A nursing education program and curriculum is a part of a dynamic complex adaptive system. Adjustments must be made to it to maximize its effectiveness and efficiency to ensure that the needs, quality, safety, and value of students, faculty members, and institution are addressed satisfactorily. The healthcare system is a highly technologically connected work environment driven by innovative ideas and continuously changing. A competent nursing workforce is a crucial component of any healthcare system to function effectively and efficiently. It is of utmost importance that educational leaders create an organizational culture within a nursing education program that facilitates and supports building faculty capacity in teaching and student capacity in learning to help produce academically and technologically qualified and competent nurses for the healthcare system (Buumbwe, 2016).

Participants agreed that the use of the learning method, S.I.M.P.L.I.C.I.T.Y., and the LMS software Moodle within this nursing program and curriculum was a powerful and flexible educational tool that changed the nursing program's school administrators, faculty, and students view of the nursing curriculum, educators teaching experiences, and student learning experiences, academic performances, and learning outcomes. The learning method S.I.M.P.L.I.C.I.T.Y. provides all major educational stakeholders an opportunity and time to listen and learn from each other, and grow actively together. Adjustments are made to the process as needed since this process is not static but rather is a dynamic process that keeps on developing to ensure its quality and value. The LMS Moodle platform allowed faculty members to test, assess, evaluate, store, track, report, and analyze all course and student activities.

Participant A indicated: "The use of integrated learning intervention practice system and Moodle LMS platform made it easier for nurse educators to identify a student at-risk and high-risk of failure early." Participant A stated: "embracing technology and innovative ideas will improve our nursing program and curriculums flexibility, effectiveness, and efficiency." All participants agreed that embracing technology and innovative ideas will permit students, faculty members, and nursing programs to be more competitive with other vocational nursing schools in the area.

Theme 4: Multi-dimensional teaching styles enhance faculty teaching and student's learning experiences and learning outcomes. Most participants viewed the one-dimensional or traditional teaching styles and teaching experiences not as student-centered as the multidimensional teaching style. Educators recalled focusing more on completing the lesson plan and having limited in-depth teacher-student interaction in the classroom setting using the one-dimensional teaching approach. With the implementation of the integrated learning intervention practice system, educators were encouraged, supported, and provided with academic, educational, and technological resources to adopt and adapt multi-dimensional teaching styles to help enhance the student learning experience and learning outcomes.

Participants reported as an educator; the multidimensional teaching approach allowed them the opportunity and time to be "more interactive and more engaging with students in the classroom setting." Students had a chance to view different nursing concepts from various angles. Participants reported using a more proactive strategic teaching approaches that included using Elsevier Evolve nursing education software on Moodle (LMS), clinical case studies, live reviews, role-playing between colleagues and students, peer-to-peer teaching, simulation lab clinical case studies, and the use of escape room scenarios help students develop and improve critical thinking, and judgment. Participants C indicated: "the more interactive and more

engaging we are with students in the classroom setting, the more students are likely to become active participants in their education. Finding appropriate academic resources in a timely manner to overcome knowledge gaps in real-time."

Theme 5: Interacting often and constructive two-way communication builds stronger relationships. All aspects of the integrated learning intervention practice system, the proactive strategic remediation approach, S.I.M.P.L.I.C.I.T.Y., and the LMS Moodle support and facilitate effective two-way communication and building stronger faculty-student relationships between educational leaders, educators, and students, and their colleagues. It is an essential and valuable skill to possess. The integration of the LMS Moodle eliminated the physical boundaries of communication that previously existed between educators and students outside the classroom setting. Participant enthusiastically stated, "with the LMS Moodle... We can communicate with each other anytime and from anywhere." The study showed that school administrators and educators had an opened door policy, allowing students to come to speak candidly to educators about the school, work, and life issues. Within the classroom setting, educators use effective communication strategies to create "an overall positive learning experience for students." Participant F stated, "our students know when they come meet with us; they are in a safe, positive, and judgment-free environment." Building stronger teacher-student relationships through continuous effective two-way communication allow for respectful, open, and honest feedback or dialogue to occur during collaborative problem-solving and decision-making processes, interactions, or circumstances to achieve desired outcomes.

Theme 6: Integrated learning intervention practice systems and proactive remediation approaches provide holistic teaching and learning approaches. The integrated learning intervention practice system involves an inquiry base learning system that encourages

students to be responsible and accountable for their education by seeking out new ways to build on prior knowledge or fill knowledge gaps due to deficits in learning. The study revealed that participants found that the integrated learning intervention practice system as a process was surprisingly instrumental in helping students study to learn and combine knowledge acquired during classroom learning and clinical experiences and apply these nursing concepts taught to real-world clinical scenarios. The aim is to help educators assist students in developing learning styles and study habits that enhance their critical thinking and problem solving to apply what they learn effectively and not study to memorize concepts to pass a test. The integrated learning intervention practice systems consist of multiple interchanging components. That includes the proactive strategic remediation approach, collaborative learning environment, mandatory academic advising for students, 10-day remediation process offered after quarters one, two and three, the LMS Moodle, and the learning method S.I.M.P.L.I.C.I.T.Y.

The integrated learning intervention practice system allows educators to keep a hand on the pulse of students' grades, academic progress, and identify students underperforming (at-risk or high-risk of failure), in real-time. The bi-quarterly mandatory student advisory assessment periods are checkpoints (mid-point and end-point) within each quarter allowing, the nursing school administrators and nurse educators to assess if student is meeting the minimum academic progression standards. The proactive strategic remediation process is an attempt to help the identified underperforming student meet the nursing competency level required in each course to progress academically. The proactive strategic remediation approach process involves an educator working together with the identified underperforming student to create a tailored success learning plan that best fits the academic and learning needs of the student to fill their knowledge gap. The S.I.M.P.L.I.C.I.T.Y. learning method allows for the VN program to provide

an integrated multi-disciplinary approach to teaching and learning that helped provide school administrators, faculty, and students find different ways to improve the nursing program and curriculum actively, educators' teaching styles and students' learning styles to achieve desired outcomes. Moodle (LMS) is an open-source online learning platform that provides convenience, consistency, and flexibility for school administrators, educators to provide students access to the academic courses and educational materials and resource services at anytime and anywhere, that will aid and support them to achieve academic success.

Theme 7: Collaborative learning environments promote active learning and effective communication. The collaborative learning environment is a vital component of the integrated learning intervention practice system and the proactive strategic remediation approach. In the traditional classroom setting, educators seemed overwhelmed with meeting teaching objectives, and students struggling to grasp or understand nursing concepts or course materials taught. The collaborative learning environment and the LMS platform allow for constant access to open two-way communication between education leaders, educators, and students. The collaborative learning environment in the classroom setting is student-centered, facilitating and supporting active learning, active listening, and effective communicating between educators and students and students and their and peers. Participant B stated: "It is important for faculty and students functioning within a collaborative learning environment to realize that everyone's input in the collaborative learning environment is valuable." The collaborative learning environment allows both faculty and student to come to the classroom prepared to engage often and interactively with colleagues and teachers in knowledge sharing and critical thinking exercises when attempting to solve clinical nursing scenarios for case studies, simulations, or answering NCLEX-type questions.

Theme 8: Tap into educator's expertise with at-risk and at high-risk students and learning interventions and strategic remediation best practices. As educational leaders and educators, it is essential to instill within our organizational culture and in the classroom setting that we do not know it all. We can always learn from others' expertise. It takes all of us working together to achieve desired outcomes. Participant D stated: "nursing educators should expect to encounter students at-risk and high-risk for failure in every student cohort." Educators with prior experience with students at-risk and a-high-risk of failure and varied learning practices and remediation approaches should be utilized to help underperforming students maximize the learning experience and learning outcomes. The ability to accurately define a student's academic status helps educators to identify the at-risk, and high-risk student for failure promptly is significant. Having been a collaborative learning partnership, these students in the classroom setting the educator can work with underperforming students effectively to provide the most appropriate academic and learning support to help fill their knowledge gaps. The goal is to improve the students' learning experience, learning outcomes, and ensure they meet the program's minimum academic progression standards. Participant C stated: "educators must help at-risk and high-risk students set realistic and attainable goals to overcome challenges and obstacles that prevent students from progressing academically."

Theme 9: Mandatory student academic advisory assessments, facilitate early identification of underperforming students. Mandatory student academic advisory assessment was conducted twice each quarter, week six, and week 12, to determine students' academic progress in a course. A 10-day remediation period was established at the end of quarters one, two, and three to provide underperforming students another opportunity to meet the minimum academic progression standards. These regular one-to-one mandatory student advisory

assessments meetings were a crucial time for both the educator and student to engage in open and honest dialogue about a students' academic progression. Educators provided students with an opportunity to become engaged and be proactive in their education, learning outcomes, and academic progress. Participant A stated: "the goal here is to provide underperforming students with the most appropriate academic and learning methods and resources to fill student gaps of knowledge adequately. To improve their academic performance, learning outcomes, and overall student success to ensure that he or she realizes learning objectives and meets minimum academic progression standards."

Each mandatory student advisory assessment period, students were asked to complete a mid-point and end of course evaluation online survey on the LMS Moodle voluntarily. During the mandatory student advisory assessment periods, nurse educators and nurse leaders receive honest feedback from students about their overall experiences with the nursing program leadership, nursing program, and curriculum policies that effective teaching and learning experience, nurse educators teaching approaches, and student learning experiences and outcomes.

### Theme 10: Take ownership of student education, and learning is the key to success.

All study findings suggest that taking ownership of students' educational and learning processes is crucial to a students' academic success. Nursing education leaders at the organizational level and nursing educators in the classroom setting are well-positioned to ensure that all major educational stakeholders within a nursing program are committed to working towards a shared vision. Creating an academic and learning environment focused on improving student learning experiences, student academic performances, and learning outcomes will ensure academic success. The study showed that taking ownership of one's learning and education means taking

initiatives to seek out the right support system, mentors, educational and technological resources, and learning environment to master a skill. In nursing education, taking ownership of student education and learning means that all major educational stakeholders hold some accountability and responsibility for improving student learning experiences and outcomes. Participant A stated: "educators and students should always seek to create or be part of learning environments that stimulate and enhances your intellectual, personal, and professional growth and development. We do not know it all."

Theme 11: Improving the integrated learning intervention practice system and the proactive strategic remediation approach. Overall, the study's findings showed that participants had a positive experience with the fully integrated learning intervention practice system, the proactive strategic remediation approaches, the LMS Moodle, and the learning method S.I.M.P.L.I.C.I.T.Y. The recommendation from participants was to keep its core components intact. Participants suggested that nursing school leadership provide its educators with quarterly faculty development training and workshops to enhance and maintain fluency, competencies, and skills with integrated learning intervention practices, proactive strategic remediation approaches, mandatory student academic advising assessment techniques, early identification of at-risk and high-risk students strategies, Moodle (LMS) technology, and the learning method S.I.M.P.L.I.C.I.T.Y techniques. Many students find it challenging to balance work, family, school, and life. Participants suggested that the nursing program offers students ongoing access to academic development workshops, resources, and services. Provide ongoing access to counseling, stress management skills, effective student study habits, test-taking strategy skills, time management skills, and tutoring services. Nursing school administrators of this

vocational nursing education program were advised to adhere to more rigorous admissions criteria to ensure the VN program has access to qualified VN candidates.

### **Implications**

This qualitative, descriptive phenomenological research study was designed to use the perspectives and the lived experiences of nursing school administrators and nurse educators and add to the existing literature the benefits and challenges of incorporating a fully-integrated learning intervention practice system with a more proactive strategic remediation approach at all levels of a pre-licensure vocational nursing education programs' curriculum to address the academic and learning needs of nursing students. The findings from this study revealed that nursing students struggling or failing to meet minimum academic progression standards to progress to the next quarter, complete, and graduate the nursing program successfully, and lack of NCLEX-PN readiness are significant ongoing concerns for VN educational programs (Carrick, 2011; Dube & Mlotshwa, 2018; McGann & Thompson, 2008).

The study's findings demonstrated that the implementation of the fully integrated learning intervention practice system and the proactive strategic remediation approach, at all levels of the nursing program and curriculum, permitted nurse educators to establish collaborative learning environments in the classroom setting that exposed students to multi-dimensional teaching and learnings styles. This learning environment facilitated active learning and encouraged students to take ownership of their learning experiences and learning outcomes. In the collaborative educational environment, nurse educators had the opportunity and time to adequately evaluate and assess students' basic knowledge of nursing concepts and nursing skills, and address and minimize students' gaps promptly.

The findings of this study showed that the integrated learning intervention practice system permitted nurse educators to identify underperforming students throughout multiple checkpoints in a student's academic progression in the nursing program (Cherkis & Rosciano, 2015). Students identified as at-risk or at high-risk of failure were provided with tailored remediation approaches that met their specific learning needs promptly to ensure he or she meets the minimum academic progression standards to move on. Nursing educational leaders and nurse educators can use this study's findings to gain greater insight on the effects of a fully integrated learning intervention practice system that includes proactive strategic remediation on student learning experiences, academic performances, and learning outcomes.

Theoretical Implications. The systems theory of teaching and learning, a multidisciplinary systems theory for a complex adaptive system like the nursing education system, was the theoretical framework that guided this study. Nursing education consists of two complex interdependent systems. The nursing education that consists of the academic institution, the nursing program, nursing school administrators, and nurse educators at the macro-level, whereas nursing student learning is at the micro-level. The results of this study align with the systems theory of teaching, as described by Chen and Stroup (1993). The main categories and central themes revealed in this study showed a strong correlation between collaborative interactions in the establishment of quality nursing education within a program and curriculum that involves inquiry-based learning approaches, effective organizational and instructional-classroom leadership, the growth and development of educators' teaching styles and students' learning styles, academic performances, and overall learning outcomes.

*Implications of the Findings for Practice.* Nursing educational leaders are not only the leaders of a learning organization but the driving force of learning within their organizational

culture. Nurse educators are leaders within the classroom setting that guide, shape, and reinforce learning with students. The findings from this study demonstrated that Effective leadership and mentorship create transformational changes institution-wide. Nursing educational leaders and nurse educators, understand their position and the influence they have over the beliefs, behaviors, habits, and outcomes within their organizational culture and classroom setting, respectively. The establishment of an organization-wide knowledge sharing system creates a collaborative learning partnership between nursing educational leaders, nurse educators, and students on vertical and horizontal levels. Participants in this study recognized and understood that to acquire, retain, sustain, and maintain educational, learning, and institutional success, all major educational stakeholders (educational leaders, educators, and students) must be committed to the fact that taking ownership of student education and learning is the key to academic success. This collaborative learning partnership ensures that all major educational stakeholders are committed to a shared vision: improving student academic experiences, performances, and learning outcomes is the goal. Educational leaders, educators, and students mutually agree to work together and resources sharing to achieve a common goal.

The findings of this study showed that nursing educational leaders take proactive actions to inspire, motivate, and engage nursing educators and students in meaningful ways across the academic institution. The nursing educational leader's establishment of a collaborative learning environment institution-wide enables nurse educators' and students' voices to be heard in all decision-making matters within the academic institution that will impact the educators' teaching and students' learning experiences and outcomes. Including educators' and students' voices in academic and classroom setting decision-making matters is crucial. It ensures that educators and students are engaged in the decision-making process and offer a well-balanced approach to the

design and implementation of the new nursing program and curriculum policies or initiatives based on their feedback.

This process of inclusion, transparency, valuing, and respecting others' opinions fosters trust and builds strong relationships between school administrators, educators, and students. This enables educational leaders to inspire, motivate, shape, and transform organizational culture to *embrace change, technology, and innovative ideas to ensure educational efficacy* throughout the academic institution. The study's findings revealed that embracing change, learning management technology systems, and innovative ideas to help improve and advance the quality of nursing education delivered, enhances the nursing program and curriculum's flexibility and efficiency, increases the competencies of nurse educators and nursing students, and ensure students' academic success.

The establishment of the integrated learning intervention practice system and proactive remediation approaches provide a holistic approach to teaching and learning at all levels of the nursing program and curriculum. The implementation of the fully integrated learning intervention practice system that includes proactive strategic remediation approaches, integration of the collaborative learning environment, the learning method S.I.M.P.L.I.C.I.T.Y., and the introduction of the LMS Moodle are student-centered approaches. They have been instrumental in helping educational leaders and educators significantly reduce and, in some cases, eliminate academic, communication, education, learning, and technological barriers to teaching and learning. Invaluable tools to assist educational leaders, educators, and students with conflict management at the organizational level and in the classroom setting. The implementation of the fully integrated learning intervention practice system that includes proactive strategic remediation approaches, integration of the collaborative learning environment, the learning

method S.I.M.P.L.I.C.I.T.Y., and the LMS Moodle helps to bridge teaching and learning gaps between nursing educational leaders, educators, and students. It enabled major educational stakeholders to take control of their teaching and learning. Each quarter enacting frequent mandatory student academic advisory assessments facilitates early identification of underperforming students. It permits student knowledge deficits to be addressed promptly and appropriately with remediation approaches tailored to the specific learning needs of each underperforming student to be able to achieve desired outcomes.

The collaborative learning environment promotes active learning and effective communication in the organizational and classroom setting. Participants expressed their appreciation for the collaborative learning environment. It allows educational leaders, educators, and students to "capitalize on the expertise of each other," involved in constant sharing of knowledge, critical thinking, problem-solving, to make effective decisions on academic, educational, and learning issues (Buumbwe, 2016, p. 320). Educators' use of multidimensional teaching styles enhances (both) faculty teaching and student learning experiences and learning outcomes. In a complex adaptive system such as nursing education, major educational stakeholders interacting often and constructive two-way communication (to build) stronger relationships that are a critical factor in the development of an effective and functioning organizational culture focused on improving student learning outcomes in the short and long-term.

### **Nursing School Administrators and Nurse Educators Recommendations**

This section presents study participants recommendations for *improving the integrated* learning intervention practice system, and the proactive strategic remediation approaches implemented within the vocational nursing program and curriculum the research study took

place. The recommendations came from the nursing school administrator and nurse educators who utilized the fully integrated learning intervention practice system and the proactive strategic remediation approaches during the 2018-2019 academic school year.

# **Faculty Development Recommendations**

The following actionable recommendations were agreed upon by study participants.

Study participants recommended that educational leaders establish ongoing quarterly faculty professional development support and training for nurse educators to enhance and maintain fluency, competencies, and skills. Participant D stated: "ongoing educational and technological support and training," will allow educators to continue to build on acquired knowledge to stay relevant with best practices of integrated learning intervention practices, proactive strategic remediation approaches, collaborative learning environment strategies, and the LMS Moodle.

Integrated learning intervention practice system support. All nursing school administrators and nurse educators, regardless of teaching experience and prior experience with learning intervention practices and remediation approaches, must undergo faculty development training with approved evidence-based best practices in integrated learning intervention practices and proactive strategic remediation approaches to improve the academic and learning competencies and skills of nurse educators. During these professional development training sessions all components of the integrated learning intervention practice system will be reviewed: the collaborative learning environment, mandatory student academic advising assessments, and early identification of at-risk and high-risk students, the learning method S.I.M.P.L.I.C.I.T.Y, and the LMS Moodle course and student activities. All professional development training workshops must be offered on-campus, face-to-face at a date and time date convenient for all faculty members or online.

Mandatory student academic advising assessments and early identification of at-risk and at high-risk students. Nurse educators to have bi-quarterly evaluations of mandatory student academic advising assessment policies and procedures and ongoing evaluation and support of early identification of at-risk and high-risk students processes. Ensuring that nurse educators have all the academic, educational, and technological resources needed to assess and evaluate students' academic progress accurately, and proactively address the learning needs promptly, when a student is identified as underperforming. Nurse educators must undergo training and evaluation bi-quarterly on remediation activities, and the development and implementation of the tailored SMART (specific, measurable, appropriate, reference/resources, timetable) student success plan provided to identified underperforming students.

Learning management systems support. All major educational stakeholders must have ongoing educational and technological support and training to learn how to navigate the learning management system (Moodle) effectively. An IT specialist should be made readily available to help school administrators, staff, educators, and students troubleshoot any problems that may arise with the LMS technology. Innovative ideas. Innovative ideas adopted by the nursing program within the curriculum should have metrics that nursing education leadership can use to assess and evaluate nurse educators' performance using them. Nursing faculty members must be individually trained and evaluated on these skills on an ongoing basis.

Faculty Recommendations for Student Development. Participants indicated that many students are struggling in the nursing program because they have the challenge of working, maintaining a home, and family while attending school fulltime. To further facilitate and support the work that educators are doing with students in the classroom setting, it is recommended that school administrators provide students with ongoing access to academic and development

workshops, resources, and services. They include counseling and stress management skills, effective study habits and test-taking strategy skills, time management skills, and tutoring services.

Student Counseling. The study revealed that many nursing students in this VN program are non-traditional students who are balancing work, family, school, and everyday life. Often these students find it challenging to manage their work, school, and other life stresses effectively. Participants recommend that school administrators employ a licensed clinical psychologist on staff with experience in 'common everyday psychological problems and severe mental health issues.' The school psychologist must work collaboratively with students and educators, to help them manage academic, behavioral, daily life, social, and stress management issues effectively to achieve desired learning outcomes. Participant E pointed out: "school leadership must provide students access to qualified counselors who can provide students with the assistance they need that are beyond a nurse educators' scope of practice."

Effective student study habits and time management skills. Adopting good study habits and effective time management early prepares students to achieve success and reduces unnecessary stress. The administration and educators must offer all students an opportunity to create a SMART (specific/sensible, measurable/motivating, appropriate/achievable, reference/resources, timetable/time-sensitive) student success plan during the first week of each quarter of the program. Each student's SMART success plan goals must be clear, attainable, and focused on the specific study habits and schedule of the student. Students identified as underperforming during week six and week 12 of every quarter will create a tailored SMART student success plan that focuses on the students' specific academic and or clinical skill areas of

weakness, revised study habits, and time management. This is an attempt to ensure that all students have an opportunity to achieve set goals.

Test-taking strategy skills. Studying to learn and master a nursing concept or skill is essential. Students being able to apply what he or she mastered effectively on a test is paramount. The nursing program should offer students ran opportunity to regularly take multiple practice tests, and continuous exposure to NCLEX type questions on course materials taught. This will facilitate and support the teaching and learning strategies provided by educators in the classroom setting. Students should be provided with best practices for test preparation, test-taking skills, evaluation of test performance, and strategies to better manage test anxiety.

Tutoring services. The administration and educators must offer students access to tutoring services to improve their understanding of course materials. Each educator in the nursing program should offer scheduled group tutoring after school hours twice a week. Students can schedule one-to-one educator-student tutoring-sessions or peer-to-peer sessions.

Administrative Recommendations. No two-student cohorts are ever the same, and thus each cohort should be treated uniquely. That said, nurse educators mentioned that they noticed many students have a difficult time understanding the nursing concepts as they are presented in each course. So, to facilitate student learning and to ensure a greater understanding of nursing concepts and nursing skills, it is recommended that the nursing curriculum presented in the classroom setting present nursing concepts and nursing skills from a simple-to-complex or the novice-to-expert approach. Another recommendation is for the vocational nursing program to review its current admission process and to adopt the robust and rigorous admissions criteria of other VN programs across the nation. Only the most qualified vocational nursing student candidates who exceed the minimum entry level requirement should be admitted to the program.

Participant A stated: "A qualified VN candidate is more likely to be committed to their studies as students and invested in becoming superior quality nursing professionals."

### **Limitations of the Study**

As presented in Chapter 1, there were four limitations identified in this qualitative study.

Lack of generalizability. The first limitation of this qualitative phenomenological study is the lack of generalizability of the data collected and analyzed. This study was limited to a small sample population of six participants from a single research site. The sample population consisted of a nursing school administrator and five nurse educators. Study participants were currently employed, taught, and actively involved with the implementation of the fully integrated learning intervention practice system and the proactive strategic remediation approach during the 2018-2019 academic school year. The research site was a pre-licensure vocational nursing education program in a small, single-campus, private institution of higher learning located in a metropolitan city in the state of Texas. Data collected from participants' interview transcripts provided a rich, in-depth, and contextualized meaning and essence of the nursing school administrator and nurse educators' experiences utilizing a fully integrated learning intervention practice system and the proactive strategic remediation approach throughout all levels of a VN program to address students' academic and learning needs and improve learning experiences, academic performance, and learning outcomes. Study participants' varied feelings, beliefs, and perceptions of their lived experiences with the phenomena studied were unique to that single site. Thus, the findings from this qualitative study cannot be generalized to all nursing education programs (Willis, 2014).

Lack of accuracy. The second limitation of this phenomenological qualitative study was the accuracy of the data collected and analyzed. The accuracy of this study's qualitative data

findings cannot be validated or predicted with 100% certainty (Willis, 2014). As discussed in chapter 3, data collected from a phenomenological study based on participants' beliefs, opinions, perceptions, and lived experiences of a phenomenon, cannot be subjected to statistical analysis, cannot be validated, are not reliable, and therefore cannot be generalized (Chamberlain, 2009; Halls et al., 2016; Willis, 2014).

Recall bias. The third limitation of this qualitative phenomenological study was study participants' recall bias. The data collected in this research study was dependent on participants responding honestly to open-ended interview questions that required recall of past experiences with the phenomenon studied. The researcher could not control participants' responses to research questions (Debois, 2016). Participants intentionally or unintentionally providing erroneous responses to interview questions asked regarding their experiences with the phenomenon of interest would skew the results of the collected data (Debois, 2016). It is essential to keep in mind that all responses to interview questions provided by participants are his or her individual beliefs, feelings, opinions, perceptions, and experiences with the phenomenon of interest studied.

Research-induced bias. The fourth limitation of this qualitative phenomenological study was researcher-induced bias. The researcher was familiar with the phenomenon of interest and study participants; thus, the researcher's subjectivity may come into question. This researcher was the director of nursing education and allied health programs at the research site at the time this study was conducted. The researcher of this study had an academic, professional, and non-supervisory relationship with each study participant. The researcher helped with the implementation of the fully integrated learning intervention practice system and the proactive strategic remediation approach throughout the vocational nursing education program and

curriculum at the research site. The researcher was the founder and creator of the learning method S.I.M.P.L.I.C.I.T.Y. and implemented it into the VN program and curriculum. The researcher applied bracketing and intuition throughout this research study to address subjectivity and to ensure the validity of the data collection, data analysis, and the description of the data (Applebaum, 2012; Moxham & Patterson, 2017; Willis, 2014).

### **Recommendations for Future Research**

This study explored the lived experiences and the effects of utilizing a fully integrated learning intervention practice system and proactive strategic remediation approaches throughout all levels of a vocational nursing educational program. The participants in this study were an LVN nursing school administrator and LVN nurse educators. More qualitative research is needed to ascertain what are the experiences like for other nursing school administrators and nurse educators using a fully integrated learning intervention practice system that includes a proactive strategic remediation approach throughout all levels a nursing program and curriculum. The experiences of ADN, BSN, and MSN nursing school administrators and nurse educators with a fully integrated learning intervention practice system that includes a proactive strategic remediation approach throughout all levels of a nursing program and curriculum should be explored at multiple program sites. Further qualitative research studies of this phenomenon of interest would fill some gaps in the body of knowledge in nursing education.

Another recommendation for future research is to explore and gain insight from the perceptions and lived experiences of nursing students attending vocational, associate degree, baccalaureate, diploma, and graduate nursing program with fully integrated learning intervention practice system and proactive strategic remediation approaches throughout all levels of a vocational nursing educational program. The focus will be to determine the effectiveness of the

integrated learning intervention practice system and proactive strategic remediation approaches to identify and address the academic and learnings needs of underperforming students promptly and appropriately. From the nursing students' perspective, to determine the impact the integrated learning intervention practice system and proactive strategic remediation approaches had on student learning experiences, academic performance, learning outcomes, and NCLEX readiness in the short and long-term. The knowledge obtained from these qualitative studies would provide nursing school administrators and nurse educators helpful feedback on how to better design and implement learning intervention practices and proactive strategic remediation approaches within their nursing programs. These will enhance student learning experiences and strengthen learning outcomes. The knowledge acquired from such qualitative studies can help advance the body of knowledge on integrated learning intervention practices and proactive strategic remediation efforts in nursing education.

### Conclusion

The aim of this descriptive qualitative phenomenological study was to explore and gain greater insight on the lived experiences of nursing school administrators and nurse educators using a fully integrated learning intervention practice system and proactive strategic remediation approaches at all levels a pre-licensure vocational nursing education program to address nursing students' academic, educational, and learning needs. This study's findings provided a greater understanding of the study participants' experiences with the studied phenomenon. Nursing education systems and nurse educators are familiar with learning intervention practices and remediation efforts being two separate processes. The use of the fully integrated learning intervention practice system that includes proactive strategic remediation approaches, the integration of the collaborative learning environment, the learning method S.I.M.P.L.I.C.I.T.Y.,

and the introduction of the LMS Moodle into a nursing program and curriculum in nursing education program is not the standard.

This study added to the body of knowledge in current literature of innovative integrated learning intervention practices and proactive strategic remediation approaches used in nursing education programs. The knowledge obtained from this study will provide other nursing programs, nursing educational leaders, and nurse educators with a greater understanding from the perspective of the nursing school administrator and nurse educator. From the design and implementation standpoint, a fully integrated learning intervention practice system that includes proactive strategic remediation approaches use of evidence-based innovative academic, educational, learning, and technological methods maximizes educational efficacy, student learning experiences, academic performances, learning outcomes, and student achievement. A fully integrated learning intervention practice system that includes proactive strategic remediation approaches implemented throughout all levels of a selected vocational nursing program and curriculum reduced academic, communication, educational, and technological barriers to teaching and learning. More research is required to provide a greater understanding of utilizing a fully integrated learning intervention practice system that includes proactive strategic remediation approaches at all levels of a nursing program and curriculum to assist nursing school administrators and nurse educators to effectively address student learning deficits, and improve student learning experiences and learning outcomes.

#### References

- Almajed, A., Skinner, V., Peterson, R., & Winning, T. (2016). Collaborative learning: Student's perspectives on how learning happens. *The Interdisciplinary Journal of Problem-Based Learning*, 10(6), 1-18. doi:https://doi.org/10.7771/1541-5015.1601
- Anderson, C. (2010). Presenting and evaluating qualitative research. *American Journal of Pharmaceutical Education*, 74(8), 141, 1-7. doi:https://doi.org/10.5688/aj7408141
- Applebaum, M. (2012). Key ideas in phenomenology: The reduction. *Saybrook University: Unbound*. Retrieved from https://www.saybrook.edu/unbound/phenomenology-the-reduction/
- Balls, P. (2009). Phenomenology in nursing research: Methodology, interviewing and transcribing, *Nursing Times*, *105*(31), 1-10. Retrieved from https://www.nursingtimes.net/clinical-archive/leadership/phenomenology-in-nursing-research-methodology-interviewing-and-transcribing/5005138.article
- Biggs, J. B. (n.d.). Student approaches to learning & studying. Retrieved from http://web.cortland.edu/andersmd/learning/Biggs.htm
- Bloomberg, L. D., & Volpe, M. (2012). Completing your qualitative dissertation. A road map from beginning to end. Washington DC: Sage.
- Breckenridge, D. M., Wolf, Z. R., & Roszkowski, M. J. (2012). Risk-assessment profile and strategies for success instrument: Determining pre-licensure nursing students' risk for academic success. *The Journal of Nursing Education*, *51*(3), 160-166. doi:10.3928/01484834-20120113-03.

- Buumbwe, T. (2016). Enhancing nursing education via academic-clinical partnership: An integrative review. *International Journal of Nursing Sciences*, *3*(2016), 314-322. http://dx.doi.org/10.1016/j.ijnss.2016.07.002
- Carrick, J. A. (2011). Student achievement and NCLEX-RN success: Problems that persist.

  Nursing Education Perspectives, 32(2),78-83. doi:10.5480/1536-5026-32.2.78
- Chamberlain, B. (2009). Phenomenology: A qualitative method. *Clinical Nurse Specialist*, 23(2), 52-53. Retrieved from https://www.nursingcenter.com/pdfjournal?AID=844810&an=00002800-200903000-0003&Journal ID=54033&Issue ID=844804
- Chen, D., & Stroup, W. (1993). General system theory: Toward a conceptual framework for science and technology education for all. *Journal of Science Education and Technology*, 2(3), 447-459.
- Cherkis, F., & Rosciano, A. (2015). The effectiveness of a structured remediation program to pass the NCLEX-RN examination. *Open Journal of Nursing*, *5*(3), 210-217. doi:10.4236/ojn.2015.53025
- Cleland, J., Leggett, H., Sandars, J., Costa, M. J., Patel, R., & Moffat, M. (2013). The remediation challenge: Theoretical and methodological insights from a systematic review. *Medical Education*, 47(3), 242-251. doi:10.1111/medu.12052
- Cleland, J., Mackenzie, R. K., Ross, S., Sinclair, H. K., & Lee, A. J. (2010). A remedial intervention linked to a formative assessment is effective in terms of improving student performance in subsequent degree examinations. *Medical Teacher*, 32(4), e185-e190. doi:10.3109/01421591003657485

- Court, D. (2013). What is the truth in qualitative research? Why is this important for education? Educational practice and Theory, 35(2), 5-14. doi:10.7459/ept/35.2.02
- Creswell, J. W. (2015). Educational research: Planning, conducting, and evaluating quantitative and qualitative research. Boston, MA: Pearson
- Crouch, S. J. (2015). Predicting success in nursing programs. *Journal of College Teaching & Learning*, 12(1), 45-54. doi:https://doi.org/10.19030/tlc.v1211.9069
- Davenport, N. C. (2007). A comprehensive approach to NCLEX-RN success. *Nursing Education Perspectives*, 28(1), 30-33. Retrieved from https://www.ncbi.nlm.nih.gov/pubmed/17380959
- Debois, S. (2016). 9 advantages and disadvantage of questionnaires. *Survey Any Place*. Retrieved from https://surveyanyplace.com/questionnaire-pros-and-cons/
- de Lima Guimarães, G., de Oliveira Viana, L., de Matos, S. S., Carvalho, D. V., de Almeida Lima Baroni, F. C. (2013). The truth value in nursing education a phenomenology study. *Revista Gaúcha de Enfermagen*, 24(1),133-139. Retrieved from http://dx.doi.org/10.1590/S1983-1447201300001000017
- Department of Health, Education, and Welfare. (1979). The Belmont report. Retrieved from https://www.hhs.gov/ohrp/sites/default/files/the-belmont-report-508c\_FINAL.pdf

- Donohoo, J., Hattie, J., & Eelis, R. (2018). *The power of collective efficacy; Leading the Energized School*, 75(6), 40-44 Retrieved from http://www.ascd.org/publications/educational-leadership/mar18/vol75/num06/The-Power-of-Collective-Efficacy.aspx
- Dube, M. B., & Mlotshwa, P. R. (2018). Factors influencing enrolled nursing students' academic performance at a selected private nursing education institution in KwaZulu-Natal.

  \*Curations, 419(1), a1850 Retrieved from https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6131719/pdf/CUR-41-1850.pdf
- Englander, M. (2012). The interview: Data collection in descriptive phenomenological human scientific research. *Journal of Phenomenological Psychology*, 43, 13-35. doi:10.1163/156916212X632943
- Evans, C. J., & Harder, N. (2013). A formative approach to student remediation. *Nurse Education*, 38(4), 147-151. doi:10.1097/NNE.0b03e318296ddd0f
- Frank, T., & Scharff, F. V. (2013). Learning contracts in undergraduate courses: Impacts on student behaviors and academic performance. *Journal of the Scholarship of Teaching and Learning*, 13(4), 36-53.
- Häggyman-Laitila, A., Mattila, L., & Melender, H. (2016). Educational interventions on evidence-based nursing in clinical practice: a systematic review with qualitative analysis.

  \*Nurse Education Today, 43, 50-59. Retrieved from http://dx.doi.org/10.1016/j.nedt.2016.04.023
- Hall, E., Chai, W., & Albrecht, J. A. (2016). A qualitative phenomenological exploration of teachers' experience with nutrition education. *American Journal Health Education*, 47(3),136-148. doi:10.1080/19325037.2016.1157532

- Hammarberg, K., Kirkman, M., & de Lacey, S. (2015). Qualitative research methods: When to use them and how to judge them. *Human Reproduction*, *31*(3), 498-501. doi:10.1093/hurep/dev334
- Healy, M., Flint, A., & Harrington, K. (2014). Engagement through partnership: students as partners in learning and teaching in higher education. Retrieved from https://www.heacademy.ac.uk/system/files/resources/engagement\_through\_partnership.p df
- Horton, C., Polek, C., & Hardie, T. L. (2012). The relationship between enhanced remediation and NCLEX success. *Teaching and Learning in Nursing*, 7, 146-151. Retrieved from https://doi.org/10.1016/j.teln.2012.06.002
- Hyland, J. R. (2012). Building on the evidence: Interventions promoting NCLEX success. *Journal of Nursing*, 2, 231-238. doi:10.4236/ojn.2012.23036
- Johnson, T., Sanderson, B., Wang, C., & Parker, F. (2017). Factors associated with first-time NCLEX-RN success: A descriptive research study. *Journal of Nursing Education*, *56*(9), 542-545. doi:10.3928/01484834-20170817-05
- Khan, B. A., Hirani, S. S., & Salim, N. (2015). Curriculum alignment: The soul of nursing education. *International Journal of Nursing Education*, 7(2), 83-86. doi:10.5958/0974-9357.2015.00080.X
- Lamadrid-Figueroa, H., Castillo-Castillo, L., Fritz-Hernández, J., & Magaña-Valladares, L. (2012). Admissions criteria as predictors of students' academic success in master's degree programs at the National Institute of Public Health of Mexico. *Public Health Reports*, 127(6), 605-611. doi:10.1177/003335491212700612

- Llamas, J. V. (2018). The influence of phenomenology on nursing research. *Minority Nurse*.

  Retrieved from https://minoritynurse.com/the-influence-of-phenomenology-on-nursing-research/
- Malterud, K. (2012). Systematic text condensation: A strategy for qualitative analysis. Scandinavian Journal of Public Health, 40, 795-805 doi:10.1177/1403494812465030.
- McGann, E., & Thompson, J. M. (2008). Factors related to academic success in at-risk senior nursing students. *International Journal of Nursing Education Scholarship*, *5*(19), 1-15. doi:https://doi.org/10.2202/1548-923X.1465
- Mee, C. L., & Schreiner, B. (2016). Remediation in nursing education today: Review of the literature and consideration of future research. *Journal of Nursing Regulation*, 7(1), 37-45. Retrieved from https://doi.org/10.1016/S2155-8256(16)31040-7
- Merkley, B. R. (2015). Student nurse attrition: A half-century of research. *Journal of Nursing Education and Practice*, 6(3), 71-75. doi:10.5430/jnep.v6n3p71
- Michel, N. J., Cater, J., & Varela, O. E. (2009). Active versus passive teaching styles: An empirical study of student learning outcomes. *Human Resource Development Quarterly*, 33(1), 55-67. doi:10.1002/hrdq.20025
- Moxham, L., & Patterson, C. F. (2017). Why phenomenology is increasingly relevant to nurse researchers. *Nurse Researchers*, *25*(3), 6-7. doi:10.77748/nr.25.3.6.s2
- National Council of States Board of Nursing. (2014). 2013 NCLEX statistics: 2013 number of candidates taking NCLEX examination and percent passing, by type of candidate.

  Retrieved from https://www.ncsbn.org/Table\_of\_Pass\_Rates\_2013.pdf

- National Council of States Board of Nursing. (2017). 2017 NCLEX statistics: 2017 number of candidates taking NCLEX examination and percent passing, by type of candidate.

  Retrieved from https://www.ncsbn.org/Table\_of\_Pass\_Rates\_2017.pdf
- National Council of State Board of Nursing. (2018). 2017 NCLEX examination statistics.

  Retrieved from https://www.ncsbn.org/2017\_NCLEXExamStats.pdf
- National Council of State Boards of Nursing. (n.d.a.). Creating the NCLEX & passing standard.

  Retrieved from https://www.ncsbn.org/9011.htm
- National Council of State Boards of Nursing. (n.d.b.). History. Retrieved from https://www.ncsbn.org/history.htm
- National Council of State Boards of Nursing. (n.d.c.) How the NCLEX works. Retrieved from https://www.ncsbn.org/9009.htm
- National Council of State Boards of Nursing. (n.d.d.). Passing standard. Retrieved from https://www.ncsbn.org/2630.htm
- National League for Nursing. (2016). Number of basic programs in the United States, region and program type: 2016. *NLN Biennial Survey of Schools of Nursing*. Retrieved from http://www.nln.org/docs/default-source/newsroom/nursing-education-statistics/percentage-of-qualified-applications-turned-away-by-program-type-2016-(pdf).pdf?sfvrsn=0.
- Newington, L., & Metcalfe, A. (2014). Factors influencing recruitment to research: Qualitative study of the experiences and perceptions of research teams. *BMC Medical Research Methodology*, 14, 1-11. doi:10.1186/147-2288-14-10
- Nursing Licensure Requirements in Texas. (2018). Retrieved from https://www.nursinglicensure.org/state/nursing-license-texas.html

- O'Connor, H., & Gibson, N. (2003). A step-by-step guide to qualitative data analysis. *A Journal of Aboriginal and Indigenous Community Health*, *I*(1), 64-90. Retrieved from https://www.researchgate.net/publication/292432218\_A\_Step-By-Step\_Guide\_To\_Qualitative\_Data\_Analysis
- Oermann, M. H., & Gaberson, K. B. (2014). Evaluation and testing in nursing education. New York, New York: Springer.
- Pennington, T. D., & Spurlock, D. (2010). A systematic review of the effectiveness of remediation intervention to improve NCLEX-RN pass rates. *Journal of Nursing Education*, 49(9), 485-492. doi:10.3928/01484834-20100630-05
- Randolph, P. K. (2017). Standardized testing practices: Effect on graduation and NCLEX pass rates. *Journal of Professional Nursing*, *33*(3), 224-228. doi:10.1016/j.profnurs.2016.09.002
- Reinhardt, A. C., Keller, T., Summers, L. O., & Schultz, P. (2012). Strategies for success: Crisis management model for remediation of at-risk students. *Journal of Nursing Education*, 51(6), 305-311. doi:10.3928/01282834-20120409-03
- Serembus, J. F. (2016). Improving NCLEX-first-time pass rates: A comprehensive program approach. *Journal of Nursing Regulation*, 6(4), 38-44. doi:https://doi.org/10.1016/S21555-8256(16)31002-X
- Shustack, L. M. (2019). A qualitative case study of high performing practical nursing program in Pennsylvania. *Teaching and Learning in Nursing*, *14*, 15-20. Retrieved from https://doi.org/10.1016/j.teln.2018.08.003
- Statistics Solutions. (2019). Modified Van Kaam analysis. Retrieved from https://www.statisticssolutions.com/modified-van-kaam-analsis/

- Stout, K., & Haidemenos, K. (2016). Eight remediation strategies to improve test performance.

  Nursing, 46(4), 21-22. doi:10.1097/01.NURSE,0000481435.17425.88
- Sullivan, B., & Bhattacharya, K. (2017). Twenty years of technology integration and foreign language teaching; A phenomenological reflective interview study. *The Qualitative Report*, 22(3), 757-778. Retrieved from https://nsuworks.nova.edu/tqr/vol22/iss3/6
- Teräs, M. (2016). How would you describe 'imagination variation' in phenomenology?

  Retrieved from

  https://www.researchgate.net/post/How\_would\_you\_describe\_Imaginative\_Variation\_in\_

  Phenomenology
- Texas Board of Nursing. (2018a). National Council Licensure Examination-PN (vocational nurse) / past 5 years. Retrieved from https://www.bon.texas.gov/pdfs/education\_pdfs/education\_programs/VN%205YR-17.pdf
- Texas Board of Nursing. (2018b). Education dashboard. Retrieved from https://www.bon.texas.gov/education\_school\_resultsDashboard.asp
- Texas Higher Education Coordinating Board. (2008). A new curriculum model for licensed vocational nursing (LVN) education. Retrieved from http://www.thecb.state.tx.us/reports/PDF/1649.PDF?CFID=93278692&CFTOKEN=4364 2791
- Tierney, W. G., & Garcia, L. D. (2011). Remediation in higher education: The role of information. *American Behavioral Scientist*, 55(2), 102-120. Retrieved from https://doi.org/10.1177/0002764210381869

- Tuffour, I. (2017). A critical overview of interpretive phenomenology analysis: A contemporary qualitative research approach. *Journal of Healthcare Communications*, 2(52), 1-5. doi:10.4172/2472-1654.100093
- University of Oxford. (n.d.). Paper 2: Student approaches to learning. Retrieved from https://www.learning.ox.ac.uk/media/global/wwwadminoxacuk/localsites/oxfordlearningi nstitute/documents/supportresources/lecturersteachingstaff/resources/resources/Student\_
  Approaches\_to\_Learning.pdf
- Willis, B. (2014). The advantages and limitations of a single case study analysis. Retrieved from https://www.e-ir.info/2014/07/05/the-advantages-and-limitations-of-single-case-study-analysis/

# APPENDIX A

# UNE INSTITUTIONAL REVIEW BOARD FULL APPROVAL LETTER



Institutional Review Board Mary DeSilva, Chair

**Biddeford Campus** 

11 Hills Beach Road Biddeford, ME 04005 (207)602-2244 T (207)602-5905 F

Portland Campus 716 Stevens Avenue Portland, ME 04103

To: Nikolaos Moraros

Cc: Carey S. Clark, Ph.D.

From: Lliam Harrison, M.A., J.D. CIM

Date: April 24, 2019

Project # & Title: 19.04.12-010

The Institutional Review Board (IRB) for the Protection of Human Subjects has reviewed the materials submitted in connection with the above captioned project and has determined that the proposed work is exempt from IRB review and oversight as defined by 45 CFR 46.104(d)(2).

Additional IRB review and approval is not required for this protocol as submitted. <u>If you wish to change your protocol at any time, including after any subsequent review by any other IRB, you must first submit the changes for review.</u>

Please contact Lliam Harrison at (207) 602-2244 or wharrison@une.edu with any questions.

Sincerely,

William R. Harrison, M.A., J.D. CIM Director of Research Integrity

IRB#: 19.04.12-010 Submission Date: 04/08/19

Status: Exempt, 45 CFR 46.104(d)(2)

Status Date: 04/22/19

# APPENDIX B

LETTER OF INTENT TO CONDUCT RESEARCH STUDY AT RESEARCH SITE

# **Letter of Intent**

Nikolaos S. Moraros, MSHA, MSN, RN, PHN
March 28, 2019
Subject: Letter of Intent to Conduct Research Study Interviews at
Dear Mr.
I am a doctoral candidate at The University of New England. In partial fulfillment of my dissertation, the research study that I am currently undertaking is entitled "Nurse Educators' Experiences with Integrated Learning Intervention Practice Systems and Learning Outcomes." I am writing this letter to request permission to conduct my research study interviews at two vocational nursing program's nursing school administrators and nurse educators who have actively participated in the development and or the implementation of the fully-integrated learning intervention practice system and used proactive strategic remediation efforts at your VN program during the 2018-2019 academic school year.
The purpose of this research study is to gain insight from nursing school administrators' and nurse educators' experiences of using a fully-integrated learning intervention practice system at all levels in a pre-licensure vocational educational nursing program. This study also seeks to obtain nurse educators' lived experiences with utilizing proactive strategic remediation efforts to address the learning and academic needs of identified at-risk and high-risk students throughout various points in these student's academic progression in a pre-licensure vocational nursing education program's curriculum.
Prospective study participant's participation in this study is strictly voluntary. The identities of the academic institution and the study participants will remain anonymous. Any information obtain during the interview process will be solely used for the purposes of this research study and kept confidential. A copy of the completed research study will be provided to you once it is available. Findings from this research study is expected to provide nursing school administrators and nurse educators with greater insight into the benefits and challenges of implementing a fully-integrated learning intervention practice system with a proactive strategic remediation approach process at all levels of a pre-licensure VN program from admissions to graduation and its effects on improving nursing students' learning experiences, academic performances, learning outcomes, and improving graduates' NCLEX readiness.
Your approval of my request is greatly appreciated. If you have any questions, concerns, or require further clarification, please contact me at <a href="mailto:nmoraros@une.edu">nmoraros@une.edu</a> .
Thank you for your assistance with this matter. I look forward to hearing from you.
Sincerely,
Nikolaos S. Moraros, MSHSA, MSN, RN, PHN, Principal Investigator Director of Nursing Education and Allied Health at Doctoral Candidate at University of New England

# $\label{eq:appendix} \mbox{APPENDIX C}$ $\mbox{APPROVAL LETTER FROM RESEARCH SITE}$

Houston, TX 77082 Date: April 1, 2019 Subject: Research Study Site Approval Letter To: The University of New England's Institutional Review Board/UNE IRB This letter acknowledges that I have received and reviewed a request by Mr. Nikolaos S. Moraros, a doctoral student at the University of New England, to conduct a research project entitled "Nurse Educators' Experiences with Integrated Learning Intervention Practice Systems and Learning Outcomes" at Pre-licensure Vocational Nursing program. I approve of this research to be conducted at our facility. When the researcher receives approval for his research project from the University of New England's Institutional Review Board/UNE IRB, I agree to provide access for the approved research project. If we have any concerns or need additional information, we will contact Mary Bachman DeSilva, Sc.D., the Chair of the University of New England's IRB at (207) 221-4567 or irb@une.edu. Sincerely, Staff Designee for the Campus Director T: C: F: 3 E-Mail:

# APPENDIX D

RECRUITMENT EMAIL TO PROSPECTIVE STUDY CONTENT EXPERT REVIEWER TO REVIEW STUDY INTERVIEW QUESTIONS

# Recruitment Email to Prospective Study Content Expert Reviewer To Review Study Interview Questions

Dear Nursing School Administrators and Nurse Educators,

My name is Nikolaos S. Moraros. I am a doctoral candidate at the University of New England. I am conducting a research study entitled "Nurse Educators' Experiences with Integrated Learning Intervention Practice Systems and Learning Outcomes." The purpose of this study is to gain insight on the lived experiences of nursing school administrators' and nurse educators' who used a fully-integrated learning intervention practice system and utilized proactive strategic remediation efforts at all levels in a pre-licensure vocational educational nursing program. The research study involves asking study participants 15 semi-structured open-ended questions in a face-to-face, one-on-one interview format.

Based on your years of experience with learning intervention practices and the use of remediation strategies in nursing education, I am emailing you to ask for your assistance as a content expert reviewer to review the 15 semi-structured open-ended interview questions, generated by the study's principal investigator, to determine whether these interview questions could help answer the research question. Corrections will be made to the study's interview questions as suggestions are made by the content expert reviewers.

If you are interested in participating in this study as a content expert reviewer, please contact me at <a href="mailto:nmoraros@une.edu">nmoraros@une.edu</a> or call me at <a href="m

If you are not interested in participating in this study as a content expert reviewer, I thank you for your time.

Sincerely,

Nikolaos S. Moraros, MSHSA, MSN, RN, PHN, Principal Investigator Director of Nursing Education and Allied Health at Doctoral Candidate at University of New England

# APPENDIX E

INITIAL INFORMATIONAL MEETING RECRUITMENT SCRIPT TO PROSPECTIVE STUDY PARTICIPANTS
(NURSING SCHOOL ADMINISTRATORS AND NURSE EDUCATORS)

# Initial Informational Meeting Recruitment Script to Prospective Study Participants (Nursing School Administrators and Nurse Educators)

Hello Everyone,

I am Nikolaos S. Moraros, a doctoral candidate at the University of New England. I am conducting a research study to gain insight on the lived experiences of nursing school administrators' and nurse educators' who used a fully-integrated learning intervention practice system and utilized proactive strategic remediation efforts at all levels in this pre-licensure vocational educational nursing program during the 2018-2019 academic school year with the 2018 VN student cohort. The research study consists of prospective study participants being asked 15 semi-structured open-ended questions in a face-to-face, one-on-one interview format. Each study participant's interview should take approximately one to two hours to complete. All study interviews will be conducted by the principal investigator, Nikolaos S. Moraros

Your participation in this study is strictly voluntary. The identities of the academic institution and study participants will remain anonymous. Any information obtain during the interview process will be solely used for the purposes of this research study and kept confidential. A copy of the completed research study will be provided to you once it is available.

I am meeting with you today, to ask if you would be willing to allow me to interview you for this study. Please check your email for an official invitation to the research study in the next few days. The email sent to you will have enclosed a UNE Consent for Participation in Research form that must be read carefully. It will include a detailed description of the study and study purpose and procedures, a detailed list of the inclusion criteria, an explanation of the voluntary nature of the study and informed consent/ research participation consent form, and study participation rights. Please note that written informed consent is required before study participants can participate in this research study.

If you are interested in participating in this study, please contact me at mmoraros@une.edu so we can set up a date, time, and location convenient for you and I to meet for the interview. I thank you for your help. Your participation in this study is greatly appreciated.

If you are not interested in participating in this study, I thank you for your time.

# APPENDIX F CONSENT FORMS

APPROVED FOR USE BETWEEN

UNIVERSITY OF NEW ENGLAND INSTITUTIONAL REVIEW BOARD

Version 8.22.18

# UNIVERSITY OF NEW ENGLAND CONSENT FOR PARTICIPATION IN RESEARCH

**Project Title:** Nurse Educator's Experiences with Integrated Learning Intervention Practice Systems and Learning Outcomes

Principal Investigator: Nikolaos S. Moraros, MSHSA, MSN, RN, PHN

#### **Introduction:**

- Please read this form. You may also request that the form is read to you. The purpose of this form is to give you information about this research study, and if you choose to participate, document that choice.
- You are encouraged to ask any questions that you may have about this study, now, during or after the project is complete. You can take as much time as you need to decide whether or not you want to participate. Your participation is voluntary.

### Why is this research study being done?

You are invited to participate in this research study conducted by Principal Investigator, Nikolaos S. Moraros. The purpose of this research study is to gain insight from nursing school administrators' and nurse educators' experiences of using a fully-integrated learning intervention practice system at all levels in a pre-licensure vocational educational nursing program. This study also seeks to obtain nurse educators' lived experiences with utilizing proactive strategic remediation efforts to address the learning and academic needs of identified at-risk and high-risk students in a pre-licensure vocational nursing education program's curriculum. This research study is looking to determine the effectiveness of an integrated learning intervention practice system and the use of a proactive strategic remediation approach on improving nursing students' learning experiences, academic performance, learning outcomes, and improving graduates' NCLEX readiness.

# Who will be in this study?

The inclusion criteria for this study are specific. Eligible participants for this study must have the following:

- Be a nursing school administrator or a nurse educator who currently works and teaches at the selected prelicensure vocational nursing education program;
- Hold a state-recognized active RN license where this study will take place;
- Hold a bachelor's of science in nursing degree or higher;
- Actively participated in the development and or the implementation of the fully-integrated learning intervention practice system at the selected pre-licensure VN program during the 2018-2019 academic school year;
- Have at least two or more years of experience of teaching in nursing education;
- Have at least two years of experience with at-risk and high-risk students in nursing education, and;
- Have at least one year of experience actively utilizing student learning intervention practices and remediation in nursing programs and nursing curricula.

## What will I be asked to do?

If you are interested in voluntarily participating in the study, you are invited to contact the researcher via the researcher's email. The researcher will then email you a copy of the informed consent form. You must complete and

sign the consent form and return it to the researcher before participating in the study A signed consent form signifies that you give voluntary informed consent to participate in this research study.

The researcher will contact you via email to schedule a convenient time and place for a face-to-face, one-on-one interview. As a study participant, your participation will involve you providing a response to 15 semi-structured, open-ended questions asked by the Principal Investigator during a face-to-face, one-on-one sit-down interview. Three demographic questions will be asked concerning current employment status and role at the nursing school, level of education and years of practice in nursing education. Twelve interview questions will address your perceptions and lived experiences with the implemented fully-integrated learning intervention practice system with the use of a more proactive strategic remediation approach during the 2018-2019 academic school year at the selected pre-licensure vocational nursing educational program. Each study participant's interview should take approximately one to two hours to complete. All study interviews will be conducted by the researcher, the principal investigator.

# What are the possible risks of taking part in this study?

There are no known risks associated with this research as you will be discussing your experiences with utilizing a fully-integrated learning intervention practice system that includes proactive remediation efforts throughout a prelicensure vocational nursing education program, from the perspective of a nursing school administrator or a nurse educator at this particular VN program.

# What are the possible benefits of taking part in this study?

It is not expected that you will directly benefit from your participation in this research. Findings from this research study will provide nursing school administrators and nurse educators with greater insight on the benefits and challenges of implementing a fully-integrated learning intervention practice system with a proactive strategic remediation approach process at all levels of a pre-licensure vocational nursing education program.

### What will it cost me?

There is no compensation or cost to you associated with your participation in this research.

### How will my privacy be protected?

Throughout this research study, no identifying characteristics of any person(s) will be displayed. You will be assigned a pseudonym, to preserve and guarantee your anonymity and confidentiality in this study.

### How will my data be kept confidential?

Every effort will be made by the researcher to keep your interview responses and correspondences private, secure, and safe. As per University of New England's IRB protocol, all collected data from this study, written and audio materials, will be kept for a period of three years at the principal investigator's home in a locked cabinet, then destroyed.

### What are my rights as a research participant?

- Your participation is voluntary. Your decision to participate will have no impact on your current or future relations with the University.
- Your decision to participate will not affect your relationship with the <u>Academic Institution research site or</u> the Principal Investigator of this Study.
- You may skip or refuse to answer any question for any reason.
- If you choose not to participate there is no penalty to you and you will not lose any benefits that you are otherwise entitled to receive.
- You are free to withdraw from this research study at any time, for any reason.
  - o If you choose to withdraw from the research there will be no penalty to you and you will not lose any benefits that you are otherwise entitled to receive.

- You will be informed of any significant findings developed during the course of the research that may affect your willingness to participate in the research.
- If you sustain an injury while participating in this study, your participation may be ended.

## What other options do I have?

• You may choose not to participate.

# Whom may I contact with questions?

- The researcher conducting this study is: Nikolaos S. Moraros
  - o For more information regarding this study, please contact: nmoraros@une.edu
- If you choose to participate in this research study and believe you may have suffered a research related injury, please contact Dr. Carey S. Clark, PhD, RN, AHN-BC, Lead Advisor, UNE Doctoral Program in Educational Leadership at cclark14@une.edu
- If you have any questions or concerns about your rights as a research subject, you may call Mary Bachman DeSilva, Sc.D., Chair of the UNE Institutional Review Board at (207) 221-4567 or <a href="mailto:irb@une.edu">irb@une.edu</a>.

# Will I receive a copy of this consent form?

You will be given a copy of this consent form.	
Participant's Statement	
I understand the above description of this research and the risks participation as a research subject. I agree to take part in the re	· · · · · · · · · · · · · · · · · · ·
Participant's signature or Legally authorized representative	Date
Printed name	<u> </u>
Researcher's Statement	
The participant named above had sufficient time to consider the questions, and voluntarily agreed to be in this study.	information, had an opportunity to ask
Researcher's signature	Date
Printed name	

# APPENDIX G RESEARCH STUDY INTERVIEW QUESTIONS

# RESEARCH STUDY INTERVIEW QUESTIONS

**Project Title:** Nurse Educator's Experiences with Integrated Learning Intervention Practice Systems and Learning Outcomes

Principal Investigator: Nikolaos S. Moraros, MSHSA, MSN, RN, PHN

Participant: [Insert Letter Sequence A, B, C, D etc.]	
Date:	

Interview questions to study participants will include:

- 1. What is the highest degree that you hold?
- 2. How long have you worked in nursing education?
- 3. What is your current role and/or status at the pre-licensure vocational educational nursing school?
- 4. What is your level of experience working with at-risk and high-risk students in nursing education?
- 5. What is your understanding of a student at-risk of failure versus a student at high-risk of failure?
- 6. What is your level of experience with student learning interventions and remediation programs in nursing education?
- 7. In your experience, what level of importance does a proactive strategic remediation approach versus a traditional remediation approach play in improving students' academic performance and learning outcomes?
- 8. How would you describe the current, integrated, learning intervention practice system within your vocational nursing education program?
- 9. Tell me about your experiences with utilizing an integrated learning intervention system and proactive remediation process at all levels of a pre-licensure vocational nursing education program?
- 10. Tell me about your instructional approach and teaching style in the classroom before and after the implementation of the fully-integrated learning intervention practice system in the pre-licensure vocational nursing education program?
- 11. Tell me about the proactive strategic remediation approaches you use that have been the most effective to improve student learning and student performance?
- 12. How do you feel that the implementation of this integrated learning intervention practice system and strategic remediation approach in the VN program has affected the teacher-student relationship and student academic performance and learning outcomes?

- 13. How does this year's student retention rate compare with past student retention rates since the implementation of the fully-integrated learning intervention practice system and proactive remediation process at all levels of the vocational nursing education program?
- 14. How does this pre-licensure vocational educational program's fully-integrated learning intervention practice system approach and proactive remediation strategy approach compare with the learning intervention and remediation processes you have experienced as a nurse educator in other nursing programs?
- 15. Based on your current and past experiences with at-risk and high-risk nursing students, what recommendations would you suggest to improve the new integrated learning intervention practice systems and proactive strategic remediation approaches at the vocational nursing education program? What new practices and strategic approaches regarding learning intervention and remediation efforts would you keep or discard?

# $\label{eq:appendix} \mbox{APPENDIX H}$ RESUME OF RESEARCHER

# CURRICULUM VITAE

# NIKOLAOS S. MORAROS

# LICENSURE

State	Year
Texas State Board of Nursing, Licensed Registered Nurse 951176	6/30/2019
State of New York, Licensed Registered Nurse (RN) #691559	05/2020
District of Columbia, Licensed Registered Nurse #RN1041581	06/2018
Maryland, Licensed Registered Nurse R224156	06/2019

# EDUCATION

Degree	Discipline	Institution	Year
Doctor of Education in Educational Leadership	Education	University of New England	Graduation Anticipated 2019
Master of Science in Nursing in	Nursing	D'Youville College	05/2016
Community Health Nursing / Master of	Health Service		
Science in Health Service Administration, GPA, 3.847	Administration		
Bachelors of Science in Nursing,	Nursing	Niagara University	05/2014
GPA 3.83, with distinction			
Bachelors of Science,	Biology	University of Maryland	05/2007
GPA 3.72, magna cum laude		at Eastern Shore	

# PROFESSIONAL EXPERIENCE

Nursing Education Administrative Experience Title Director of Nursing Education and Allied Health Programs Associate Director of Nursing and Allied Health Programs	Institution Bell Tech Career Institute Houston, Texas Ana G. Mendez University Systems, Capital Area Campus Wheaton, MD	Year 01/2018 -present 06/2017 - 01/2018
Nursing Education Teaching Experience Title LMS (Blackboard & Moodle) Nursing Curriculum Consultant	Institution Bell Tech Career Institute Houston, Texas	Year 01/2018 - present
Assistant Professor of Nursing/NCLEX Success Coordinator	Ana G. Mendez University Systems, Capital Area Campus Wheaton, MD	06/2017 - 01/2018
Assistant Professor  Adjunct Instructor/Clinical Instructor	Trinity Washington University Washington DC Trocaire College Buffalo, NY	06/2016 - 06/2017 12/2015 - 05/2016

Nursing Clinical Experience		
Title	Institution	Year
Registered Nurse - Spanish Speaking Nursing Case Manager	Iona Senior Services	01/2017 -
	Washington DC	06/2017
Registered Nurse - Public Health Nurse/Clinical Manager	Trinity Washington University	06/2016 -
	Health and Wellness Clinic	01/2017
	Washington DC	
Registered Nurse - SP Public Health Nurse - Case Manager	Erie County Department of	02/2015 -
	Public Health Buffalo, NY	06/2016
Registered Nurse Correctional Health	Erie County Department of	04/2015 -
	Health	06/2016
	Erie County Correctional Health	
	Services Alden, NY	
Registered Nurse Correctional Health	Erie County Department of	04/2015 -
	Health	06/2016
	Erie County Correctional Health	
	Services - Youth Detention	
	Center – Buffalo, NY	
Interventional RN - Neuro-Stroke Telemetry Unit	Buffalo General Medical Center	10/2014 -
	<ul> <li>Kaleida Health Buffalo, NY</li> </ul>	03/2015

#### NURSE EDUCATION ADMINISTRATIVE EXPERIENCE

#### Institution/ Title

Bell Tech Career Institute Director of Nursing Education and Allied Health Programs

### Administrator Expertise

- Ensure that the nursing programs comply with all requirements of both the Board of Registered Nursing and CCNE.
- Ensure evaluation and development for faculty and staff.
- Facilitate articulation of nursing programs with other institutions and develops partnerships with external agencies.
- Continuous leadership and coordination in effective curriculum development and evaluation, including the establishment and assessment of student learning outcomes and the use of instructional technologies.
- Determine guidelines pertaining to admission, retention and recruitment of students.
- Serve as a liaison between the Nursing department and multiple external agencies.
- Provide leadership and coordination in the use of instructional facilities in support of the Nursing programs.
- Maintains standards of professional conduct and ethics appropriate to the professional position as Director, Nursing Programs.
- Coordinate, administer, and direct all activities in developing, implementing, and managing the Nursing programs including fiscal planning, grants, and other funding sources.

Ana G. Mendez University Systems, Capital Area Campus Associate Director of Nursing and Allied Health Programs

- Coordinating the nursing program at the Capital Area Campus to ensure compliance of all state and national accreditation and licensure standards.
- Ensuring that the organization's curriculum meets all applicable regulatory or accreditation standards
- Assisting the Director of Nursing and Allied Health Programs in the development and administration of academic programs, implementation of the Discipline-Based Dual Language Immersion Model® and the establishment of community relations.

Ana G. Mendez University Systems, Capital Area Campus Associate Director of Nursing and Allied Health Programs

- Additional responsibilities include: developing the curriculum, staffing the department, assisted with clinical adjunct faculty & full-time nursing faculty orientation reviewing faculty performance, and creating an atmosphere conducive to scholarly pursuits.
- Departmental Activities:
  - Multiple course alignments,
  - Course redesigning & course syllabus development,
  - Test development reflecting QSEN competencies,
  - Implementation and improvement of meeting CCNE Standards,
  - Improving NCLEX minimum performance standards,
  - Redesigning course syllabus and presented at the College Committee level
- Assisted with the redesigning of Nursing Department academic curriculum in accordance with SUAGM and Maryland Board of Nursing's mission and expectations.
- Policy Creation & Implementation:
  - · Student Remediation Policy and Form
  - Student Test Question Challenge Policy and Form
  - Online Secure Testing Policy and Implementation
  - Hybrid Course Development Policy and Implementation
- Community Events: Community Health Awareness (Cancer-Breast, Cervical, Prostate; Diabetes, Hypertension, Obesity, Opioid addiction)
- Prior to my leadership NCLEX Report: 4th Quarter FY 2017 April -June 33%
- Under my leadership as NCLEX success coordinator NCLEX Report:
  - 1st Quarter FY2018 increased from 33% to 100%.
  - 2nd Quarter FY 2018 maintained 100%
- Expansion of Clinical Affiliation:
  - · National Institute of Health
  - Montgomery County Department of Health & Human Services
  - Heritage Care Inc.
  - · VA MD DC
  - · Sibley Memorial Hospital Johns Hopkins Medicine

#### NURSE EDUCATION TEACHING EXPERIENCE

#### Institution/ Title

Bell Tech Career Institute LMS (Blackboard & Moodle) Nursing Curriculum Consultant

### Teaching Expertise

- Founder of S.I.M.P.L.I.C.I.T.Y as a teaching method within Higher Education.
- N.C.L.E.X Preparation Courses such as: Fundamentals Medical Surgical - Pharmacology.
- Provide ongoing faculty orientation and training to HESI Test reports and how to utilize data to measure student success.
- Compile analytical reports and data analysis of all NCLEX testing
- Meet with at-risk students on a regular basis to monitor utilization of remediation strategies.
- Early identification of at-risk students and oversight of strategies to promote student success on NCLEX exam on the first attempt.

Ana G. Mendez University Systems, Capital Area Campus Assistant Professor of Nursing/NCLEX Success Coordinator  Course Load: HESI Exit Preparation Course with emphasis on Nursing content areas: Fundamentals, Pharmacology, Medical Surgical Trinity Washington University Assistant Professor

#### Course Load Fall & Spring

- Med Surge I & Lab & Clinical / Med Surge II & Lab & Clinical
- Community Health Nursing Lecture
- Community Health Nursing Clinical
- Nursing Informatics

#### Supervise & Manage:

Adjunct Faculty for the Med Surge I & II Clinical component.

#### Departmental Activities:

- Assisted in multiple course alignments
- Assisted in course redesigning & course syllabus development
- Assisted in test development reflecting QSEN competencies
- Assisted in the implementation and improvement of meeting Middle State Standards
- Assisted in improving NCLEX minimum performance standards above 80%
- Assisted in redesigning course syllabus and presented at the College Committee level for review with successful implementation
- · Implementation of Learning Contracts

#### Policy Creation & Implementation - Member of Departmental Committees

- Student Remediation Policy and Form
- Student Test Question Challenge Policy and Form
- Online Secure Testing Policy and Implementation
- Hybrid Course Development Policy and Implementation

#### Projects Participation:

- Assisted with CCNE Accreditation process 2017
- Inauguration of "The Semiannual Natural Science & Nurse Health Profession Presentation Day"
- Assisted with Adjunct Faculty Orientation Fall 2016
- Assisted with Nursing Student Orientation (Initial Evaluation Medicine Calculations & Clinical Skills) Fall 2016
- Assisted in designing the workflow for Nursing Student Orientation Fall 2016

#### Workshops Fall 2016:

- Nursing Faculty Workshop: "Focus on Curriculum and Test Writing Success" Facilitated by Donna Ignatavicius, MS, RN, CNE, A.N.E.F.C.
- Clinical Nursing Instructor for a LPN program involves coordination, supervision and instruction of traditional and non-traditional nursing students at local acute care and skilled nursing facilities in the Buffalo/ Niagara, New York Area

#### Trocaire College Adjunct Instructor/Clinical Instructor

#### NURSING CLINICAL EXPERIENCE

#### Institution /Role

Iona Senior Services Registered Nurse – Spanish Speaking Nursing Case Manager

#### Clinical Expertise

- Community Health Awareness (Cancer-Breast, Cervical, Prostate; Diabetes, Hypertension, Obesity, Opioid addiction)
- Patient care quality assurance
- Communicate with hospital infection control staff.
- Provide health education, physical assessment, review of systems and medication support
- Coordinate health care services
- Field calls on various health concerns

Trinity Washington University Health and Wellness Clinic Registered Nurse - Public Health Nurse/Clinic Manager

- · Identify and resolve patient care issues.
- Assess, monitor, and record patient vital signs, patient progress and respond to medical emergencies.
- Maintained a safe environment.
- Assured continuity of care.
- Coordinated care across settings and among caregivers.
- Managed information, communication, and utilization technology.
- Developed strategies to increase department revenue by providing new ways to internally market personal care and health services

Erie County Department of Public Health,

Registered Nurse - SP Pubic Health nurse – Case Manager

- Spanish Speaking Case Manager for Tuberculosis Clinic.
- TB case management: monitors suspect/case active TB & LTBI clients.
- Provide education and direct health care services to identified and assigned TB cases (patients and families) and at-risk populations.
- Communicate with hospital infection control staff.
- Provide health education, physical assessment, review of systems and medication support
- · Coordinate health care services
- Assist with direct observed therapy (DOT)
- proficient in computer charting, document patient status and changes,
- Participate in weekly case review with the TB clinic supervisor, TB case work- team and monthly meetings with physicians in order to assess and make appropriate direct health care plans for current TB cases
- Efficiently answer or field calls of various health concerns
- Review and evaluate client records to maintain quality assurance
- Administer vaccines, manage vaccine inventory, input information into the New York State Immunization Registry, and serve as a resource for community providers, school nurses, and the public.
- Participated in the 3/2015 Hepatitis A Clinic at the Buffalo Niagara Convention Center, Hepatitis screening and vaccine administrations.
- Identify and resolve patient care issues.
- Assess, monitor, and record patient vital signs, patient progress and respond to medical emergencies.
- Note patient signs of illness and provided updates to physician.
- Ensure the proper implementation of patient safety procedures.
- Maintain/update all patient information/medical histories database.
- Monitor medical supplies and ensure that medications are properly secured.
- · Ensure patient privacy within accordance with state/federal regulations.
- Coordinate care efforts with officials at correctional facilities.

Eric County Department of Health -Eric County Correctional Health Services Alden, NY

Eric County Department of Health -Eric County Correctional Health Services Youth Detention Center -Buffalo, NY Registered Nurse Correctional Health Buffalo General Medical Center – Kaleida Health,

Interventional Registered Nurse

Neuro-Stroke Telemetry Unit

- Maintained a safe environment and assured continuity of patient care.
- Coordinated care across settings and among caregivers.
- Managed information, communication, and utilization technology.
- Within the guidelines of nursing standards of care utilized the nursing process, which included the components of assessment, nurse diagnosis, outcomes identification, planning, coordination, implementation, and evaluation with NIHSS and other stroke scale assessments.
- Patient advocacy, teaching, performance improvement, and with potential for growth in leadership and professional development.
- Competencies: Stroke competent, restraints, fall prevention, infection control, pressure ulcer prevention, adult CPR, advance directives, care plans, pain management, intravenous devices, medication administration, report to on coming shift & multidisciplinary team, telemetry & intermediate skills evaluation.
- Experienced and providing care for several types of patients in the Neuro-Stroke Telemetry Unit, including the following: Acute on Chronic Subdural Hematoma Altered Mental Status Alcoholic Abuse- Benign and Malignant Brain Tumors Carotid Artery Stenosis Cerebral Compression Due To Injury Cerebral Artery Occlusion, unspecified with cerebral infarction Cerebrovascular Accident Cholestasis of Transplanted Liver Chronic Renal Failure Chronic Left Mastoiditis- Chronic Obstructive Pulmonary Disease Congestive Heart Failure CVA, embolic -Diabetics Hypoglycemic with DM II Diabetes Mellitus II ESRD, Anemia HIV Hyperlipidemia Hypokalemia Intracranial wound with loss of consciousness greater than 24hrs return to previous conscious level Lethargy MRSA Neurologic Problem Pneumonia Respiratory Distress From Pulmonary Edema Seizure Disorders Stroke Systolic Failure Traumatic Subarachnoid Hemorrhage without open Traumatic Brain Injuries

### NURSING CONTINUING EDUCATION

Sponsor	Title	Contact hours	Dates
The University Hospital for Albert Einstein College of Medicine Montefiore Learning Network	Human Subjects Research Basic Course	6	11/2018
Texas Board of Nursing	<ul> <li>Deans, Directors, and Coordinators Orientation, Certificate of Successful Completion CNE Approval ID #00005</li> </ul>	7.5	02/2018
American Association of College of	<ul> <li>QSEN Learning Module Patient-Centered Care</li> </ul>	0.5	09/2017
Nursing	<ul> <li>QSEN Learning Module Teamwork and</li> </ul>	0.5	
	Collaboration	0.9	
	<ul> <li>QSEN Learning Module Safety</li> </ul>	0.8	
	<ul> <li>QSEN Learning Modules Evidence-Based Practice</li> </ul>	0.6	
	<ul> <li>QSEN Learning Modules Health Informatics</li> </ul>	0.9	
	<ul> <li>QSEN Learning Module Quality Improvement, Certification of Completion</li> </ul>		
University of Maryland, School of Nursing	Maryland Action Coalition Summit 2017	6.0	05/2017

The George Washington University, School of Nursing	<ul> <li>Test Construction and Item Analysis: How to Write Effective Test Questions, Interpret Tes Statistics and Revise Test Items Workshop, Provider #20-593280</li> </ul>		03/2017
Laerdal Medical Corporation and Emergency Medicine Learning and Resource Center (EMLC) Florida Emergency Medicine Foundation/ EMLC	Transition to LLEAP, Provider #2731	12	01/2017
The Centers for Disease Control and Prevention (CDC)	<ul> <li>Principles of Epidemiology in Public Health Practice, 3<sup>rd</sup> Ed (Print-Based) SS1978</li> </ul>	17	02/2015
	<ul> <li>Self-Study Modules on Tuberculosis, 1-5 (W based), WB2295</li> </ul>	eb- 6.3	
	<ul> <li>Self-Study Modules on Tuberculosis, 6-9 (Pr based), SS1808</li> </ul>		
	<ul> <li>Sexual Health Series (NY): Latent TN Infect (Web-on-Demand), WD2275D</li> </ul>		
	<ul> <li>TB 101 for Health Care Workers (Web-Base WB1538</li> </ul>	d), 1.1	
Empire State Public Health Training Center	<ul> <li>Community Dimensions of Public Health Pra Module 1</li> </ul>	ectice: 1	02/2015
School of Public Health, University of Albany	<ul> <li>Community Dimensions of Public Health Pra Module 2</li> </ul>	ectice: 1	
	<ul> <li>Field Epidemiology</li> <li>Public Health Nurse Ready, Certification of</li> </ul>	1	
	Completion		
Empire State Public Health Training Center	<ul> <li>Public Health Live! Public Health Nursing U UASPH-PHL20110915</li> </ul>	pdate	02/2015
State of New York Department of Health	<ul> <li>Environmental Public Health Tracking, ESPI CHA111, Certificate of Completion</li> <li>Health Disparity Sites, ESPHTC-CHA107,</li> </ul>	łTC-	04/2015
	Certificate of Completion		
	<ul> <li>Nationally Generated County-Level Public H Data, ESPHTC-CHA108, Certification of</li> </ul>	ealth	
	NYSDOH County-Level Public Health Data,     SERVITO CHAICA Confidential of County-Level Public Health Data,     SERVITO CHAICA Confidential of County-Level Public Health Data,     SERVITO CHAICA CONTINUE OF COUNTY-LEVEL PUBLIC CONTINUE OF COUNTY-LEV		
	Prevention Quality Indicators, ESPHTC-CHA     Oratification of Completion		
	Certification of Completion     Vital Statistics, ESPHTC-CHA102, Certification	tion of	
New York - New Jersey Public	Completion  Health Literacy & Public Health: Introductio	n 1.5	02/2015
Health Training Center School of Public Health,	Orientation to Public Health	1	02/2013
University of Albany The New York State Department of	2012 Public Health Nurse 2 Continuing Educ	ation	03/2015
Health Center for Public Health Preparedness School of Public Health,	Program Certification of Completion Working in a POD	1	03/2015
University at Albany State University of New York Emergency Management Institute	Introduction to Incident Command System, I	Q.	03/2015
FEMA Department of Homeland Security	00100.b ICS-100 Certificate of Achievement		03/2013

#### PROFESSIONAL ORGANIZATIONS

Name of Organization	Role	Year Inducted
American Nurses Association (ANA)	Member	2017
Erie County Department of Health, New York State Nursing Association (NYSNA)	Member	2015
Golden Key Honor Society - University of Maryland at Eastern Shore Chapter	Member	2006
International Association of Nurses	Member	2015
Maryland Council of Dean and Directors of Nursing Programs (MCDDNP)	Member	2017
National Association of Hispanic Nurses (NAHN)	Member	2015
New York State Nursing Association (NYSNA) - Eric County Department of Health	Legislative	08/2015 -
Buffalo Local Chapter	Chair -	06/2016
•	Buffalo, NY	
PINNACLE Honor Society - D'Youville College Chapter	Member	2010
Sigma Theta Tau International - Niagara University	Member	2015

#### PUBLICATIONS

- Moraros, N.S. (2019, February 11). Integrating S.I.M.P.L.I.C.I.T.Y in the nursing academic curriculum. [LinkedIn]. Retrieved from <a href="https://www.linkedin.com/pulse/integrating-simplicity-nursing-academic-curriculum-mshsa-msn-rn-phn/">https://www.linkedin.com/pulse/integrating-simplicity-nursing-academic-curriculum-mshsa-msn-rn-phn/</a>
- Moraros, N.S. (2018, January 2). A comparative analysis of HESI vs, ATI which academic approach will be the best predictor in NCLEX passing scores?" [LinkedIn]. Retrieved from <a href="https://www.linkedin.com/pulse/comparative-analysis-hesi-vs-ati-which-academic-best/">https://www.linkedin.com/pulse/comparative-analysis-hesi-vs-ati-which-academic-best/</a>
- Moraros, N.S. (2017, November 27). Steps to NCLEX Success and identify factors that might contribute to pass rate decline [LinkedIn]. Retrieved from <a href="https://www.linkedin.com/pulse/steps-nclex-success-identifying-factors-migh">https://www.linkedin.com/pulse/steps-nclex-success-identifying-factors-migh</a> pass-mshsa-msn-m-phn/
- Moraros, N.S. (2017, November 20). Nursing Education Innovation "Study on The Go" [LinkedIn]. Retrieved from https://www.linkedin.com/pulse/nursing-education-innovation-study-go-mshsa-msn-rn-phn/
- Moraros, N.S. (2017, June 9). Curriculum Innovation [LinkedIn]. Retrieved from https://www.linkedin.com/pulse/curriculum-innovation-nikolaos-s-moraros-mshsa-msn-rn-phn/
- Moraros, N.S. (2017, May 2). Redesigning a Moodle interface for the 21st century nursing student [LinkedIn]. Retrieved from <a href="https://www.linkedin.com/pulse/redesigning-moodle-interface-21st-century-nursing-mshsa-msn-rn-phn/">https://www.linkedin.com/pulse/redesigning-moodle-interface-21st-century-nursing-mshsa-msn-rn-phn/</a>
- Moraros, N.S. (2017, February 2017). Creating a more interactive Moodle page [LinkedIn]. Retrieved from
- https://www.linkedin.com/pulse/creating-more-interactive-moodle-page-mshsa-msn-rn-phn/ Moraros, N.S., Rafalson, L., Mitchell, A., Andula, J., & Ventresca, A. (2016, June 13). Creative ways and methods of
- educating how to eradicate TB: An important intractable global public health challenge for health agencies at all levels. [Abstract]. Retrieved from <a href="https://www.linkedin.com/pulse/6th-annual-north-american-refugee-health-conference-mshsa-msn-rn-phn/">https://www.linkedin.com/pulse/6th-annual-north-american-refugee-health-conference-mshsa-msn-rn-phn/</a>
- Moraros, N. S. (2016). Tuberculosis screening and education in the urban public-school district (master's thesis) [ProQuest 10100300]. Ann Arbor, Michigan: Proquest LLC.

#### PRESENTATIONS

- "Redesigning A Moodle Interface For The 21st Century Nursing Student" (Poster Presentation) May 22, 2017 -University of Maryland School of Nursing - Maryland Action Coalition Summit 2017, Baltimore, MD
- "Creative Ways and Methods of Educating How to Eradicate TB: An Important Intractable Global Public Health Challenge for Health Agencies at All Levels" (Poster Presentation) June 12-14, 2016 - 6th Annual North American Refugee Health Conference Symposium 2016, Niagara Fall, NY
- "Tuberculosis Screening & Education In The Urban Public School District" (Thesis Project Presentation)
  December 15, 2015 D'Youville College, Buffalo, NY
- "Identifying Barriers Preventing Nurses from Taking Uninterrupted 30-Minute Meal Breaks During 12.5-Hour Shifts."

  At Niagara University & Roswell Park Cancer Institute 2014.

# CERTIFICATIONS & PROFICIENCIES

Certification & Proficiencies ABHES Accreditation Workshop, Certificate of Completion	Institution/ Organization Accrediting Bureau of Health Education Schools	Year 02/26/2018
Basic Life Support, BLS Provider	American Heart Association	03/2018 - 03/2020
Deans Directors and Coordinators Orientation, Certificate of Successful Completion	Texas Board of Nursing	02/16/2018
Introduction to Incident Command System License IS-00100.b ICS - 100	Emergency Management Institute FEMA Department of Homeland Security	03/2015
Environmental Public Health Tracking, ESPHTC-CHA111, Certificate of Completion	Empire State Public Health Training Center State of New York Department of	02/2015 - 04/2015
	Health	
Global Tuberculosis Institute at Rutgers TB Intensive Workshop	Rutgers Medical School New Jersey	09/2015
Health Disparity Sites, ESPHTC-CHA107, Certificate of Completion	Empire State Public Health Training Center State of New York Department of Health	02/2015 - 04/2015
Nationally Generated County-Level Public Health Data, ESPHTC-CHA108, Certification of Completion	Empire State Public Health Training Center State of New York Department of Health	02/2015 - 04/2015
National Institute of Health Stroke Scale Certification Group & V3	American Heart Association	09/2014
Nuts & Bolts of Simulation Methodology - Sim Essentials NYSDOH County-Level Public Health Data, ESPHTC- CHA103, Certification of Completion	University at Buffalo Empire State Public Health Training Center State of New York Department of Health	06/2014 02/2015 - 04/2015
Public Health Nurse Ready Certification of Completion	Empire State Public Health Training Center School of Public Health, University of Albany	02/2015
Public Health Nurse II Certificate of Completion	New York State Department of Health	03/2015
Prevention Quality Indicators, ESPHTC-CHA110, Certification of Completion	Empire State Public Health Training Center State of New York Department of Health	02/2015- 04/2015
Representative Training for Career Schools and Colleges, Certificate	Texas Workforce Commission	04/12/2018
Vital Statistics, ESPHTC-CHA102, Certification of Completion	Empire State Public Health Training Center State of New York Department of Health	02/2015 - 04/2015

# HONORS & AWARDS

Honors & Awards Maryland Action Coalition Summit 2017, Abstract Accepted	Institution/ Organization MD Nursing Association	Year 04//2017
6th Annual North American Refugee Health Conference, Abstract Accepted	Rochester Regional Health	03/2016
Dean's List	D'Youville College	2009-2016
Worldwide Leaders in Healthcare & Top Registered Nurse in New York	International Association of Nurses	2015
Sigma Theta Tau International -Inducted as a Member	Niagara University Chapter	10/2015
Frances Crosby, RN, MSN, EdD. Nursing School Scholarship	Niagara University	2014
Niagara University Nursing Alumni Scholarship	Niagara University	2014
Dean's List	Niagara University	2013-2014
Dean's List	University of Maryland at Eastern Shore	2005-2007