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Nursing Faculty Shortages:
Perspectives from Deans and Directors of BSN Programs

by

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Submitted to the Department of Leadership and Counseling

Eastern Michigan University

In partial fulfillment of the requirements for the degree of

DOCTOR OF EDUCATION

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February 12, 2015

Ypsilanti, Michigan

Dedication

This manuscript is dedicated to my youngest brother, Frederick Bruce Porretta, always sensitive and caring, who asked me to complete “this doctor paper” while we spent our last days together. This investigation process continued afterwards with fond memories and life lessons.

Acknowledgements

This study was made possible by the deans and directors who graciously granted interviews. My deepest gratitude is extended to Dr. Ronald Williamson, my chairperson. Dr. Williamson's support and interest was essential in this arduous learning process. Posthumous thanks to Dr. Charles "Chuck" Achilles for his discussions regarding education and for his wisdom. You are missed, Dr. Achilles. I also thank my committee members, Dr. Jaclynn Tracy, Dr. Deborah deLaski-Smith, and Dr. Theresa Saunders. Also, thank you, Norma, for your hard work editing and your consultations, providing encouragement always.

I thank my husband, Robert, who was always by my side, ready to encourage me with love and support. He knows and understands my passion for wisdom gained through knowledge. He has been my unfaltering supporter who made this manuscript possible.

Thanks to Stuart, Jackson, Brady, Naomi, Phoebe, and Micah for providing the smiles and joy essential from these wee ones to this researcher. Thanks to your parents, Jesse, Patrick, and Melissa, for their remarkable jobs of parenting in today's world. Jesse and Patrick, you are still my best accomplishments in life.

Last, I extend my thanks and understanding to the nurse faculty for their dedication to educating the future BSN registered nurses. Educators are a rare breed in all professions, with their passion and concern for the next generation of professionals.

Abstract

This study examined the shortage of nurse faculty in one Midwestern state. The purpose of the study was to identify facilitators and barriers to recruiting and retaining nurse faculty. Case studies were conducted, with the primary data source being semi-structured interviews with deans and directors of six nursing programs that offer the Bachelor of Science in Nursing (BSN) degree. The interviews and a review of institutional artifacts informed the study.

Rich, descriptive data gathered in this study revealed strategies employed by deans and directors, as they struggled to recruit and retain faculty at a time of burgeoning demand for the education of nurses. The single most important barrier was the lack of nurse faculty holding doctorate degrees that would make them eligible for promotion and tenure in their institution. The lower nurse faculty salaries when compared to clinical nursing salaries were identified as a significant barrier to recruitment of faculty. As identified by the deans and directors, factors that facilitate recruiting and retention of nurse educators included the presence of supportive administrators and research agendas anchored in collaborative relationships with a local healthcare system.

The study affirmed prior research regarding the complexity of the issue and the need to identify successful practices, which will provide a long-term solution to the shortage of nurse faculty. The findings of this study provided guidance for deans and directors, as they work within their institution, to acquire the resources, including administrative support, for a comprehensive plan to address this shortage.

TABLE OF CONTENTS

Dedication.....	ii
Acknowledgements.....	iii
Abstract.....	iv
List of Tables	viii
Chapter 1-Introduction and Background	1
Statement of the Problem.....	2
Purpose of the Study	3
Justification and Significance of the Study.....	4
Limitations	5
Delimitations.....	5
Research Design.....	6
Guiding Questions	7
Interview Protocol.....	8
Research Traditions in Educational Research.....	8
Summary.....	9
Chapter 2- Literature Review and Conceptual Framework	10
Conceptual framework.....	11
The Current Nurse Faculty Shortage	13
Reflective Practice and Leadership.....	19

Summary of the Literature Review and Conceptual Framework	21
Chapter 3-Research Methods	23
Data Sources	24
Research Methods.....	26
Data Collection	28
Data Analysis	29
Validity and Reliability.....	32
The Case Analysis.....	33
Summary.....	34
Chapter 4-Presentation of Findings	35
Context for the Study	36
Deans' and Directors' Characteristics	37
Universities and Colleges	38
Deans and Directors.....	40
Methods and Strategies to Address the Nurse Faculty Shortage	50
Barriers to Improving the Nurse Faculty Shortage	60
Summary of Barriers to Hiring and Retention of Nursing Education Faculty	71
Facilitators for Improving the Nurse Faculty Shortage	72
Summary of Facilitators for Improving the Nurse Faculty Shortage	75
Perceptions of Nurse Faculty Shortage.....	98

Conclusion	107
Chapter 5-Findings, Conclusions, Implications, and Recommendations	110
Findings.....	111
Implications for Nursing Education Programs	123
Implications for Leaders	128
Recommendations for Further Research.....	133
Conclusion	134
References.....	136
Appendices.....	152
Appendix A: Open Ended Guiding Questions-A Semi-structured Interview Guide.....	153
Appendix B: Critical Incident Record	154
Appendix C: Follow-up Invitation Letter	155
Appendix D: Written Consent to Participate in a Dissertation Research.	156
Appendix E: Follow-up Email	158
Appendix F: Participants' Demographic Profile.....	159
Appendix G: Uniform Checklist for Gathering Nursing Program/University Information*	160
Appendix H: Eastern Michigan UHSRC Approval	161
Appendix I: Carnegie Classifications. Table 2	163
Appendix J: BSN Nursing Student Admissions: Size and Selection.....	166

List of Tables

Table		Page
1	Participants: Deans and Directors of Nursing.....	37
2	Appendix I: Participants: Carnegie Classifications.....	162

Chapter 1-Introduction and Background

This study investigated the faculty shortage in select baccalaureate degree pre-licensure BSN university programs using interviews of educational leaders in nursing education (deans and directors) as the primary data source. As a nurse educator and recent interim nursing director at a college, my awareness of the need and challenge for recruitment and retention of faculty has been heightened. I am struck by the impact this faculty shortage has on the future of educating new registered nurses, which in turn will affect our healthcare industry and our society. Each year, more than 79,600 qualified applicants for nursing schools are turned away from nursing education colleges and universities because of the lack of nurse educators (American Association of Colleges of Nursing, *Special Survey on Vacant Faculty Positions*, October 2013). A 2012 annual survey of U.S. nursing schools reported that 64% of qualified applicants were not admitted into baccalaureate of science in nursing pre-licensure programs in Fall semester 2011 (National League for Nursing (NLN) 2012; Annual Survey of Schools of Nursing, Fall 2011).

Understanding how deans and directors in schools of nursing are contending with the nurse faculty shortage was an important outcome of this study. Learning about the experiences of nurse education leaders will define the current state of their efforts to alleviate the nurse faculty shortage in colleges and universities. Deans and directors were invited to describe their challenges and opportunities regarding the nurse faculty shortage. The updated National League for Nursing (2012) NLN research priorities in nursing education for 2012-2015 include *building capacity* as one of the indicators of nursing education program leaders' success in the area of faculty growth and development. Brady (2010) recognized that deans and directors influence and determine the culture and health of the work environment of the

organization. Learning how these leaders address the reality of the nurse faculty shortage is the goal of this study. Tackling the impending nurse faculty shortage from the viewpoint of deans and directors requires scrutiny and study to increase capacity for BSN students in nursing programs.

Statement of the Problem

There is a paucity of research on successful strategies used by deans and directors of nursing schools to address the nurse faculty shortage. Numerous studies have described reasons for the nurse faculty shortage, including a 2005 White Paper of the influential American Association of Colleges of Nursing (AACN). However, successful strategies to improve the nurse faculty shortage situation in schools of nursing are rarely identified. “Not enough qualified candidates” and “inability to offer competitive salaries” were two main difficulties regarding hiring new nurse faculty cited in a nationwide study by the National League for Nursing (NLN Nursing Education Policy Newsletter, May 7, 2010, p. 1)

Employment for registered nurses is predicted to be the top occupation growth area in the next few years (Bureau of Labor Statistics, U.S. Department of Labor, 2011, *Economic News Release*). The nurse faculty shortage is interwoven with the looming U.S. shortage of registered nurses (Hinshaw, 2001). Thus, the increasing demand for nurses at a time when many registered nurses are planning to retire is coupled with the nurse faculty shortage, which is restricting the number of qualified BSN pre-licensure applicants’ admittance into colleges and universities (Aiken, 2007). Currently there are large numbers of baby-boomer registered nurses working who have delayed retirement. When they do retire the size of the registered nurse workforce will be affected (Aurebach, Buerhaus, & Straiger, 2014). Suzanne Miyamoto, Director of Government Affairs and Health Policy, American Association of

Colleges of Nursing stated, “The demand for nurses and the faculty who educate them is a serious impediment to improving the nation’s healthcare needs” (Testimony of the Tri-Council for Nursing, March 28, 2014, p. 2). The nurse faculty shortage may have an enormous impact on preparing new registered nurses, which in turn potentially influences our healthcare industry and society.

Purpose of the Study

The purpose of the study was to explore the phenomena of the nurse faculty shortage. The viewpoint of nurse educational leaders (deans and directors) was gathered to understand the nurse faculty shortage within their college or university settings. The study identified both the challenges of dealing with the faculty shortage and ways nurse academic leaders overcome the challenges. Data collected from deans and directors of selected Midwestern colleges and universities offering entry level Bachelor of Science in Nursing (BSN) degrees were studied.

This qualitative study examined how various Midwestern administrators of schools of nursing are dealing with the nurse faculty shortage and identifies the methods and strategies used by these educational leaders to improve the nurse faculty shortage. The study also detects strategies that have been successful and the reasons for their success. The qualitative data uncovered were used to create narratives culminating in case studies.

Methods used to improve the nurse faculty shortage problem in Midwestern colleges and universities and to learn about the costs and benefits of these methods were explored in this study. Data were collected in several ways, including interviews of deans and directors of nursing schools, review of archival data, website data, and any data the interviewee

provided to the researcher. The data collected and the qualitative information obtained through interviews were compiled and analyzed to develop case studies.

Justification and Significance of the Study

Several factors make the nurse faculty shortage an issue worthy of study. First, the 2012-2013 Enrollment and Graduations in Baccalaureate and Graduate Programs in Nursing, AACN report stated “U.S. nursing schools turned away 79,659 qualified applicants from baccalaureate and graduate programs in nursing programs in 2012 due to insufficient number of faculty, ...” (American Association of Colleges in Nursing, 2013, p. 1). Second, it is anticipated that there will be a large number of faculty retirements occurring for this decade and beyond (AACN, 2012). The average age of nurses in the U.S. has increased; about one-third of nurses are older than 50 years (The U.S. Department of Health and Human Services, Health Resources and Services Administration: October 2013). The nurse faculty shortage affects the registered nurse shortage. Third, simply stated, without the increased numbers of faculty, increasing numbers of qualified applicants to nursing schools will continue to be turned away. Finally, Midwestern public universities are facing particular statewide challenges due to reduced funding. Nursing schools in this Midwestern state are in a particularly challenging stance in regard to the burgeoning nurse faculty shortage within colleges and universities. An April 2012 Midwestern state document, the Final Report of this Midwestern (State) Department of Community Health—Task Force on Nursing Practice (TFNP), included two important sentences in the foreword of the document, emphasizing the current nursing practice condition. “The TFNP recommendations are made within the 2011/12 context of rising demand and diminishing supply of nurse educators. The demographics of our nation and state are inescapable, requiring difficult decisions and

changes if care is to be available at all” (Fischer & Pacini, 2012, p. v). This statement reveals the impact of the nurse faculty shortage.

The nurse faculty shortage is a current and expanding problem (LaRocco, 2006). This qualitative study uncovered rich, descriptive data regarding the current experiences of deans and directors of nursing who are grappling with the nurse faculty shortage. An investigation of their experience and views deepens our understanding of this problem.

Limitations

This research examined the approaches of leaders of nursing programs in regard to the nurse faculty shortage problem. There may be variables the researcher will be unable to control. These limitations serve to clearly acknowledge those boundaries.

1. This study examined the nurse faculty shortage in six universities within one Midwestern state. Study results may not be generalized nationwide or to other nursing schools.
2. Participation in this study was voluntary.
3. The researcher assumed that college and university website information, interviews, information shared, and data provided by participants were truthful.

Delimitations

The study has the following delimitations imposed by the researcher. Research for this study will be limited to six colleges or universities in a specified region of the Midwestern state. This purposive selection narrowed the focus for the study and provides the researcher with clear boundaries. The six schools were selected on the basis of location, those offering pre-licensure Bachelor of Science in Nursing (BSN) programs, and accreditation by this Midwestern’s State Board of Nursing. The six schools were public and private

universities somewhat similar in size, < 40,000 total university student enrollment per semester year. Midwestern community colleges were not a focus of this research because the Associate Degree in Nursing (ADN), and not the BSN degree, is offered in community colleges. The BSN degree is now recommended by the Institute of Medicine, as a particular focus of registered nurse education for *Magnet Status* in hospitals. Thus, BSN degree-granting universities are paramount for this study. The six nursing schools selected had some similarities in their nursing programs, including budget streams, comparable resources, and specific faculty needed. Unique elements of job types, faculty specialties, and human resource needs were found between public and private university nurse faculty hiring and retention. A variety of means were used to collect data; university and college website information, artifacts, observations, and interviews. While in depth, the researcher acknowledges that data collection were not exhaustive. This study was limited by the generated electronic data available by the universities or colleges and by the time spent by the researcher to collect data at each school during the summer 2013 semester.

Research Design

The study was based upon the qualitative, case study research model (Yin, 2003). This investigation took an exploratory phenomenology approach. The case study method lends itself to discovering the *how* or *why* answers; focusing on current issues with real contextual background and interplays are two reasons for choosing this method of investigation (Yin, 2003). This researcher had no control of the behavioral events, which Yin emphasized as a reason for choosing the case study method.

“At the heart of interviewing research is an interest in other individual’s stories because they are of worth,” (Seidman, 2006, p. 9). This study uncovered common themes, concepts, and unique descriptions regarding the nurse faculty shortage.

In a doctoral studies qualitative research course, this researcher interviewed three nursing directors; one each from a public university, a private university, and a community college. This work became a pilot study to determine if there was a need to examine the nurse faculty shortage. In each interview I taped the responses to their perception of a nurse faculty shortage. The interviews were transcribed and recorded in an academic paper. From this small pre-study information, I discovered that all nursing directors perceived that a nurse faculty shortage is an important problem worthy of study.

Finally, reflective practice in the profession of educational leadership can serve to improve the practice of the profession. This study uncovers information that can inform the practice of current and future educational leaders. This study examined the nurse faculty shortage experience through the lens of deans and directors, and may identify positive strategies to improve the nurse faculty shortage situation in colleges and universities.

Guiding Questions

1. What are the methods and strategies used by leaders at nursing programs to address the nurse faculty shortage?
2. What methods and strategies do nurse educational leaders find successful, and which methods and strategies have been less successful in addressing the nurse faculty shortage?
3. What are the barriers and facilitators to methods and strategies to address the nurse faculty shortage?

Interview Protocol

The primary means of data collection were interviews conducted with deans and directors in university nursing programs. Each interview followed an interview protocol, and was used and provided a broad framework for each face-to-face interview (See Appendix A: Interview Protocol: Open Ended Guiding Questions-A Semi-structured Interview Guide). Each interviewee was treated with respect, and participants were informed that they may refrain from discussing a particular topic if they choose.

Research Traditions in Educational Research

Traditionally, quantitative research has been the prevailing research method in education and social science. However, development of qualitative research has increased during the last half of the 20th century (Creswell, 2009). Quantitative research involves positivist views, or a scientific method using numbers and what some refer to as *hard data*. As Schram (2006) explained, “qualitative inquiry is fundamentally interpretive” (p. 11). Qualitative research uses an inductive style of reasoning via data building from general themes and connections. Moreover, qualitative research is an intricate journey, making meaning of the complex. The meaning, or significance of the knowledge uncovered in the research is the outcome of qualitative research.

The case study approach to the qualitative data collected was chosen for this study to contribute to our knowledge of the efforts of nurse education leaders’ to recruit and retain nurse faculty and to add to the educational literature of graduate students using case study analyses research compiled from the study (Yin, 2003).

The qualitative data gathered in the interviews of deans and directors of schools of nursing provided substantial narratives describing their strategies for coping with the nurse

faculty shortage. A critical incident record was created for each narrative topic from the nursing administrators' responses. The critical incident record categorized and organized the qualitative data relative to the nurse faculty shortage. The use of critical incident reports contributes to professional development and may "have control over their professional actions" (Shapira-Lishchinsky, 2011, p. 260). Critical incident reports from the short narratives can be used for self-reflection of professional practice and, thus, critical incident records created for this study were a flexible tool for analysis of narrative information (Branch, 2005).

Summary

This qualitative study was conducted to understand the current status of the nurse faculty shortage strategies from academic leaders of nursing programs. The participants were interviewed to obtain strategies for dealing with the nurse faculty shortage problem in their nursing programs. Critical incident records were developed from each narrative topic, encouraging the nurse education administrators to reflect on their daily practice in regard to the nurse faculty shortage. The critical incidents are flexible and can be used with others in case studies (Angelides, 2001). Successful and unsuccessful strategies were uncovered in the interviews of nurse educators. The nurse faculty shortage has hindered growth in the nursing workforce (American Association of Colleges of Nursing: Enrollment and graduations in baccalaureate and graduate programs in nursing, 2012). Six case studies were developed from the qualitative study. The advantage of the case study is the depth of description it presents for understanding a complex issue (Flyvbjerg, 2006).

Chapter 2- Literature Review and Conceptual Framework

The shortage of nurse faculty was the focus of this qualitative research case study, which aimed to identify successful strategies addressing the faculty shortage from data gathered in interviews of deans and directors of nursing schools. Several research studies offered reasons for the faculty shortage. Long-term successful strategies to effectively address the nurse faculty shortage are not presented in the literature (Sims, 2009). Short-term strategies found in studies included mentoring new faculty, hiring retiring nurses to teach in the clinical sites, working to improve faculty salaries, using adjunct faculty, forming joint collaborations between academia and nursing practice, developing a reasonable workload for nursing faculty, offering more online nursing courses, and hiring faculty willing to sacrifice a higher clinical salary to teach in academia (Sims, 2009; Falk, 2007; Larson, 2006; Tanner, 2005; Roberts, 2008; Fitzpatrick, 2008; Hessler & Ritchie, 2006).

Data from 1993 to 2001 found that the U.S. average retirement age for nursing faculty was 62.5 years (Berlin & Sechrist, 2002). If this finding were projected to nurse faculty today, the average age of nursing faculty is 60 + years, and a large number of faculty are expected to retire over the next decade (American Association of Colleges of Nursing: Nurse Faculty Shortage, 2012). As Carol J. Huston stated in a chapter in progress in an unpublished nursing textbook, "...given the lag time required to educate master's- or doctorally- prepared faculty, the faculty shortage may end up being the greatest obstacle to solving the current nursing shortage" (2014, p. 76). A recent Washington State study of RNs leaving the workforce reported "nearly 60% of those sampled who were not retired and not working in nursing cited job-related stress and exhaustion as one of the top six reasons they left nursing" and thus, "a key implication of this study is that tapping into the population of RNs who have

left the workplace is unlikely to represent a viable strategy to resolve ongoing nursing shortages” (Skillman, Palazzo, Hart, & Keepnews, 2010).

The leadership role of deans or directors in colleges and schools of nursing requires the hiring and retention of nurse faculty. The concept of problem analysis is ever present in the dean or director’s efforts to lead. Reflection examines the problem and this inquiry helps to make sense of the events (Kouzes & Posner, 2007). As Achilles, Reynolds, and Achilles (1997) aptly stated, “Successful problem analyzers are students of human and of organizational behaviors. These serve as foundations for understanding how persons function in these environments” (p. 100). Scarce resources and differences contribute to the increasing role of power in the organization (Bolman & Deal, 2003).

Conceptual framework

The structure of problem analysis was used to describe each case in this qualitative study. “Consider problem analysis as part art, science, and craft, refined and honed by reflective practice and experience,” (Achilles, Reynolds, & Achilles, p. 137). Finding strategies for recruitment and retention of faculty being used by deans and directors in schools of nursing in colleges and universities was the basis for this concept of problem analysis. Each interview case was recorded using this model. The problem analysis was further developed by creating a critical incident record for each narrative nurse faculty shortage experience described by the deans and directors. The critical incident report is a practice learning analysis that was developed for the purpose of understanding pilot errors and later used for research purposes studying safety in anesthesia practice (Flanagan, 1954; Cooper, et al., 1978). The critical incident report is being used more widely in nursing and education (Kemppainen, O’Brien, & Corpuz, 1998; Keatinge, 2002; LeMare & Sohbat, 2002;

Parker, 1995; Tirri & Koro-Ljungberg, 2002). Use of the structure of a critical incident record assisted the researcher in organizing and making sense of the qualitative data.

It is important to set the aim of the activity in using the critical incident analysis. The critical incident often includes surprising information for the nurse education administrator, which may be both positive and negative outcomes for stimulating reflection (Schön, 1995). The aim of this research activity was to find successful strategies of recruitment and retention of nurse faculty. Some strategies that have not been successful were also identified; thus, providing positive and negative surprises in the findings of this research. This type of reflection on professional day-to-day activities of the nurse education administrator occurs after the event and is termed by Schön, *reflection-on-action*. Connecting critical incidents to reflection leads to inquiry by the researcher “to put together a composite picture of the perspectives of people within that situation” (Angelides, 2001, p. 435). Fitzgerald, et al., 2008 suggested that the process of reflecting on experience that is organized in the critical incident record when attempting to find resolution to a problem, such as the nurse faculty shortage, works to create systematized qualitative data exploration (p. 299). The dean or director of the nursing program described the nurse faculty shortage situation to the researcher at their particular university in a semi-structured interview; thus, providing qualitative data in this exploratory research. The process is shown in Figure 1.

Problem analysis (*Grappling with the Nurse Faculty Shortage*) =

Deans and Directors Narratives)



Problem Finding + Problem Solving



Decision Making

(leading to) Planned Implementation Steps and Evaluation

Figure 1. Concept of problem analysis: The nurse faculty shortage.

(Achilles et al., 1997, p. 136).

The Current Nurse Faculty Shortage

Colleges and universities were the locus of this research. Scarce resources exist in colleges and universities, in view of diminishing state and federal funding. Further, the reality of slashed higher education budgets and the scarcity of nurse faculty provide circumstances for a perfect storm for political framing results. As Bolman and Deal (1997) stated, “The political frame asserts that in the face of enduring differences and scarce resources, conflict is inevitable and power is a key resource” (p. 164). Universities and colleges are comprised of many separate departments such as English, mathematics, business, computer sciences, education, and nursing. Bolman and Deal concluded, “The political frame insists that organizations are coalitions,” (p. 166). Academia has often been described as having isolated disciplines referred to by Hougham (2008) as “organizational silos...are the product of institutional structure that, intentionally or unintentionally, limits communication across working groups or departments” (p. 92).

Research regarding the nurse faculty shortage is focused on what strategies or tactics are used to improve the situation. Bolman and Deal described the political frame as a way to manage scarce resource conflicts. In this description, total resolution is not a reality but making the best of a situation becomes the key. This reality of making the best of a situation emphasizes the essential nature of strategies and tactics. “Workplace stability is a concept related to turnover,” (Kovner, Brewer, Fatehi, & Jun, 2014, p. 2). Thus, strategies used in the leadership role of deans and directors for recruiting and retaining faculty are reflected in the research questions for this investigation.

A nationwide survey of nurse educators conducted by the National League for Nursing (NLN, 2006) indicated that on average, 1.4 full-time faculty members were lost from nursing programs per year in the U.S. Although mentoring new faculty is deemed essential for retention, “We just didn’t have the time and resources to properly mentor new faculty” (Dunham-Taylor et al., 2008, p. 338). In fact, “Mentorship is the single most influential way to successfully develop new nursing faculty, reaping the benefits of recruitment, retention, and long-term maturation of future nurse mentor” (p. 337). Literature reported the critical need for mentoring new faculty, but surveys and reports pointed to the current lack of mentoring implementation for nurse faculty (Rogers, McIntyre, & Jazar, 2010). The NLN endorsed mentoring nurse faculty (2006) through their careers and the American Association of Colleges of Nursing (AACN) (2005) also proposed faculty mentoring as a solution to the nurse faculty shortage. A nationwide study of 959 nursing faculty uncovered statistical evidence to link mentoring with job satisfaction (Chung & Kowalski, 2012). Job stress is known to be decreased with mentoring in novice nurse faculty (Lewallen, Crane, Letvak, Jones, & Hu, 2003), and recruitment and retention are aided by mentoring faculty (Sawatzky

& Enns, 2009). Findings in Thomas and Lankau's (2009) Human Resources research study showed 1) high-quality relationships with immediate supervisors appear to reduce role stress, and 2) nonsupervisory mentoring appears to be a conduit for work-related social support that reduces burnout. It appears what is needed to recruit and retain nurse faculty is known and documented, but how to make this happen is lacking. In the current era of increasing nurse faculty shortages and the need for successful strategies for recruitment and retention of faculty, these findings offer compelling reasons for conducting this study.

Nursing education administrators function as leaders to influence and construct nursing programs. Deans and directors of nursing need to attract faculty and retain the faculty they employ. Retaining nurse faculty is essential to maintaining current schools of nursing and for future expansion of nursing programs. This expansion of program enrollment in nursing schools is needed to address the registered nurse vacancy rate of 8.1% in the U.S (American Health Care Association, October, 2011).

“The primary barriers to accepting all qualified students at nursing colleges and universities continue to be insufficient faculty, clinical placement sites, classroom space, and budget cuts” (AACN, 2008, p. 2). Close to three-quarters of nursing schools report a shortage of faculty as their reason for limiting the number of qualified applicants (AACN, 2006). Without sufficient faculty to teach nursing students, sites, spaces, and budgets are of little concern. The nurse faculty shortage concerns limited human resources. The AACN (2005) *White Paper* identified factors contributing to the nurse faculty shortage: low salaries, increasing faculty age, reluctance to attain terminal degrees, tuitions and loans for graduate education, dropping graduate studies enrollment, older age of doctoral registered nurses, faculty role demands, and alternative career opportunities. *The Future of Nursing* (Institute of

Medicine, 2011) recommended increasing the number of baccalaureate-prepared (BSN) nurses in the workforce to 80%. This recommendation comes at a time when large numbers of senior nursing faculty are expected to retire by 2016 (Robert Wood Johnson Foundation, 2007).

Thompson et al. (2014, February) when addressing the international nurse faculty shortage suggested the following for retention and recruitment of nurse faculty:

Suggested actions included educating nurses outside the academic setting about careers in education; marketing the value of higher education and an academic career; increasing financial aid for students on an academic career path; engaging younger nurses to pursue an academic career; using non-nursing faculty for some instruction (such as pharmacists for pharmacology); supporting retired faculty to continue as educators or mentors; and improving working environments, pay, benefits, and other conditions of employment. (p. 18)

A recent study by Aiken et al. (2014) in the physician journal, *The Lancet*, presented new findings from analysis of 300 hospital surgical records in nine European countries. The report predicted that “an increased emphasis on bachelor’s education for nurses could reduce preventable hospital deaths” (p. 5). These results strengthen the need for professional nursing education at the baccalaureate degree in nursing (BSN) and higher, not merely in the U.S. but worldwide. The linkage to nursing education standards and an increasing necessity for nursing faculty in colleges and universities has been studied and acknowledged. As Byrne and Martin (2014) stated, “awareness regarding the nursing faculty shortage has entered public discussion.” (p. 107)

The *Survey on Vacant Faculty Positions for Academic Year 2013-14* study from the American Association of Colleges of Nursing (October, 2013) reported a full-time nursing faculty vacancy rate of 8.3% and amounts to vacancies of 1,358 full-time nursing faculty positions. This recent study cited the major barriers to recruitment of nursing faculty, including limited pool of doctorate-prepared faculty (31%), noncompetitive salaries (28.4%), finding faculty with the right specialty mix (19%), finding faculty willing/able to teach clinical courses (4.6%), finding faculty willing/able to conduct research (4.4%), and high faculty workload (4%).

Benner et al. (2010) identified the need to address the faculty shortage as one of the measures for improving nursing education. The Carnegie Foundation for the Advancement of Teaching compared nine exemplar schools of nursing; the final outcome report resulted in the book, *Educating Nurses: A Call for Radical Transformation*. This Carnegie study in nursing education has been conducted for more than 100 years as part of a more comprehensive study focusing on the educational development of five professional domains: medicine, nursing, clergy, engineering, and law.

The looming nursing shortage in the U.S. requires more nurse faculty prepared to educate registered nurses. The Advisory Board Company, a global research, technology, and consulting firm partnering with 150,000 leaders in health care organizations and higher education, recently reported a hospitals survey. The 2011 benchmarking survey from The Advisory Board Company Human Resources department reported a concerning trend in the labor market. "...the metric exhibiting the largest increase from 2010 to 2011 is bedside nurse vacancy. Although still early, this potentially foreshadows the return to the nurse

shortage conditions of the 1990s and early 2000s, which most analysts predicted would turn as the economy improved” (Workman, 2012, p. 1).

The baccalaureate and graduate degree nursing programs’ accreditation organization is the Commission on Collegiate Nursing Education (CCNE) *Standards for Accreditation of Baccalaureate and Graduate Degree Nursing Programs* (April, 2009) and supporting documentation for BSN programs include nursing handbooks, policies, academic policies, and guidelines (p. 7-8). Therefore, nursing handbooks and nursing programs website data provided data.

Only three studies reported findings that long-term strategies to the nurse faculty shortage need to be identified because increased workloads are not sustainable and impacts negatively on faculty retention (Dunham et al., 2007; Stuart et al., 2010, Kowalski & Kelley, 2013). The University of South Carolina nursing program redesigned the nurse faculty work assignments to optimize a new curriculum sharing clinical resources; a drop in enrollment resulted due to closing some nursing specialty programs. High faculty workload, however, was among the top factors cited as a faculty recruitment barrier in the *Special Survey on Vacant Faculty Positions for Academic Year 2013-14* study from the American Association of Colleges of Nursing (October, 2013).

Finally, nurse faculty members are aging, which means retirements are imminent; more nurse faculty are required to teach new BSN students, and the approach to ensure new nurse faculty are hired to prepare future BSN students is multidimensional. Some succession planning to add to the supply of nurse educators is needed (Fitzpatrick, 2014). The educational leadership of deans and directors is paramount for ensuring successful visioning and strategies for nurse faculty recruitment and retention. Indeed, Byrne and Daria (2014)

stated in a recent nurse faculty shortage research study, “The findings reiterate the importance of formal leadership training and preparation in order to lead nursing education through turbulent times” (p. 110).

A potentially risky situation arising from the mushrooming nurse faculty shortage is the use of unqualified faculty. The lack of nurse faculty with terminal degrees has nudged the use of unqualified faculty. What makes this a risky remedy for the nurse faculty shortage is the evaluation of nursing student clinical competence and thus unsafe nursing students may be passed through the nursing program (Shanta et al., 2011; Luhanga, Yonge, & Myrick, 2008).

Reflective Practice and Leadership

Academic nurse deans and directors of nursing programs in colleges and universities face faculty shortages. Drexel University introduced a formal mentoring leadership symposium series to assist academic nursing leadership via a form of executive coaching. Glasgow et al. (2009) created four coaching case studies with nursing academic administrators who acknowledged the importance of investing in nursing faculty human capital and human resource management following the formal leadership symposium series. Reflective practice, life-long learning, and teamwork are all attributes that enhance educational leadership (Boyer, 2004). “Educational leadership programs across the nation are beginning to include reflective practice in their curricula” (Rucinski & Bauch, 2006).

Reflective thinking and nursing practice was used by Benner (1984) to describe how clinical judgments are made by nurses and development of nursing expertise. Leadership and management are essential components of the academic deans and directors roles. Freshwater et al. (2004) developed some links evolving between academic leadership and reflective

practice and the possibility that present day nursing leadership could be informed and offered prospective ways to tackle organizational problems. Findings of a 2001 study by Freshwater concluded that reflective practice is a vital part of any leadership and management program. The cognitive behavioral skill of critical thinking assumes that reflection has occurred beforehand (Facione & Facione, 1996). Kouzes and Posner (2007) considered reflection an essential skill for leadership as a critical thinking activity. Thus, reflection is an important aspect to take into consideration in this proposed study involving the experiences of deans and directors who are maneuvering their schools of nursing in the midst of imminent nurse faculty shortages.

Reflexivity also involves being at the place of the research endeavor. Interpreting the data is at the center of the process and being there to feel the communication process and gaining a perspective from the process (James, 2013). Visiting the deans and directors in their workplace offered the opportunity to view their work setting and surroundings. The process of analyzing the data is a creative process constructing the evidence gleaned from the research process. Understanding what is really occurring and interpreting the data is the outcome of this qualitative research process.

Senge (1990) discussed the importance of leaders encouraging experimentation and innovation. Similarly, nursing education administrators are responsible for leading their colleges and universities with new ideas and plans to improve the growing nursing faculty shortage. Leading through innovation is an incredible feat in the current environment of budget cuts and limited resources at universities and colleges. The following inquiry needs to be investigated. In the mushrooming call for faculty, are deans and directors in colleges and

universities accomplishing ways to attract and retain faculty in this 21st century climate of diminishing resources?

According to Senge (1990), the goal of the organization should be a creative vision shared by all. It is precisely this creative vision that education administrators in schools of nursing may be attempting to construct. An endeavor to create a shared vision was identified in a few cases as an outcome of the present study.

Nurse leadership in colleges and universities should ensure that the mission and student outcomes “are congruent with those of the parent institution and consistent with relevant professional nursing standards and guidelines for preparation of nursing professionals” (CCNE, April 2009, p. 7). The attention to the mission of nursing education programs is a key element of accreditation standards.

Summary of the Literature Review and Conceptual Framework

Facilitators for recruitment and retention of nurse faculty are essential to ameliorate the growing nurse faculty shortage. It is also important to remove the barriers to recruitment and retention of nurse faculty. Vital strategies required for improving the nurse faculty shortage are long term strategies for both recruitment and retention of nurse faculty.

Using the qualitative case study method of gathering interview data from deans and directors of nursing schools to study the nurse faculty shortage was an important scholarly endeavor. Nurse faculty members are aging and retirements are expected to begin peaking in 2015 (Seila, et al., 2008). Deans and directors of nursing schools are struggling with the nurse faculty shortage and attempting to attract and retain qualified nurse faculty. As academic leaders, they can positively influence nurse faculty intention to work and remain in their faculty role (Candela, Gutierrez, & Keating, 2012). This research study employed the

concept of problem analysis to frame and describe data gathered from interviews and pertinent associated documents and artifacts.

This study explored strategies for dealing with the nurse faculty shortage. The narrative inquiries began with an interest in the phenomenon of the nurse faculty shortage that can be best understood narratively and thus, from these descriptions and interpretations, case studies were developed (Flyvbjerg, 2006). Creating critical incident records for each narrative topic organized the qualitative data for analysis. By analyzing the critical incidents of real life situations, the qualitative data is strengthened by “local groundedness” (Miles & Huberman, 1994, p. 10). Constructing meaning through reflection upon the nurse faculty shortage was the reflective practice used by this researcher to identify ways to improve educational leadership practices (Rucinski & Bauch, 2006).

Hiring and retention of nurse faculty is a particular focus, identifying innovations by deans and directors of nursing programs to improve the nurse faculty shortage at their higher education institution. Interviewing deans and directors of nursing programs to uncover facilitators for recruitment and retention of nurse faculty that were both successful and effective long term is an aim of this study. Mentoring has been identified as a means for nurse faculty retention (Dunham-Taylor et al. 2008). Nursing programs “are struggling to meet the demand for greater enrollment of students because of the limited number of faculty.” (Finkleman & Kenner, 2016, p. 97). Deans and directors have a “key role in assuring that the work life of faculty members is supported and rewarded at every point in their careers” (Candela, Gutierrez, & Keating, 2012, p. 6).

Chapter 3-Research Methods

A qualitative research approach was the method employed for this multiple case study of deans and directors of schools of nursing. The growing nurse faculty shortage is the major reason that qualified applicants are not admitted to nursing schools (Gerolamo & Roemer, 2011) and is the problem examined in this research study. Recurrent themes that appeared to be contributing factors to the problem included the need for higher degree qualifications, an aging academic workforce, financial constraints, increasing roles and responsibilities of the faculty, heavy faculty workload, and the transition experience from the clinical to the faculty position (McDermid, Peters, Jackson, & Daly, 2012). The nurse faculty shortage was reported to have repercussions for the next generation of nurses (Potempa, Redman, & Landstrom, 2009).

The aim of this qualitative research study was to investigate the current state of successful strategies identified in interviews of Midwestern deans and directors of schools of nursing. A case study design, with the concept of problem analysis (Achilles, Reynolds, & Achilles, 1997) was used to describe each case. Each interview case record included a critical incident record (Appendix B) as a framework for analysis of reflective thinking about a problem. Flanagan (1954) used critical incident analysis to produce an objective account and analysis of pilot error. Bullet points framed each critical incident record.

Primary data sources were face-to-face and the offer of follow-up interviews (Appendix C) with selected deans and directors who were instructing pre-licensure BSN students in colleges and university nursing programs. Validation of information and clarification of narrative data was conducted at the time of each interview due to deans and directors busy schedules. Every interview was audio-recorded. The researcher visited each

site in preparation for gathering electronic web data to learn about the nursing programs in colleges, and universities. The case study developed from each interview provided real life experiences of administrators who were grappling with the nurse faculty shortage.

Data Sources

This study examined six cases to analyze the experiences of educational leaders of colleges and universities, specifically deans and directors who were dealing with the nurse faculty shortage. A list was compiled of colleges and universities, offering entry-level BSN degrees in the southern region of a Midwestern state. The students in these programs do not hold a registered nurse license. Case study participants available within a 200-mile radius were selected as a convenience sample for economic reasons and accessibility by the researcher. Participants in the Midwestern region were contacted by telephone to request an interview.

Selection of research participants for interviewing. A convenience sample comprised the first six participants contacted by the researcher, and they voluntarily agreed to participate in the study. One respondent needed to withdraw prior to her scheduled interview date due to a personal family illness, which required a leave of absence from her role as dean. A note of thanks for her initial response and a sincere caring message was sent swiftly to the individual. After this withdrawal occurred, the next dean on my list of colleges or universities offering BSN degrees was available to be interviewed on July 2013.

Constant variables for participant selection included: nurse administrators at universities with <40,000 students attending during the fiscal year, nursing programs with tenure-track or adjunct nursing faculty positions unfilled, and pre-licensure BSN accredited

programs. Nurse administrators heading programs from both public and private universities were interviewed to explore qualitative comparison interview data.

In November 2012, the State Boards of Nursing in the Midwestern state listed 24 accredited nursing programs. This study concentrated on pre-licensure Bachelor of Science in Nursing (BSN) degree programs. It is important to note that universities and colleges often offer the Registered Nurse (RN) certification to BSN programs, which are post-licensure degrees that do not contribute to an increase in registered nurses but offer advanced education for the BSN degree of existing licensed registered nurses. This study's focus was on colleges and universities that offer pre-licensure BSN degrees; thus, these educational programs add to the number of registered nurses and graduate students. They comply with the Institute of Medicine (IOM) recommendation in *The Future of Nursing: Leading Change, Advancing Health* to increase the number of registered nurses with baccalaureate degrees or higher from 50% to 80% (Institute of Medicine, 2011). An additional consideration was the travel time and expenses incurred for this study; therefore, nursing sites within 200 miles of my home were chosen to reduce costs and allow manageable driving times for interviews.

Invitation to participate. After an initial contact by telephone, a brief description of the study (Appendix C) and an informed consent (Appendix D) was emailed to the dean, director, or department head of the nursing school, followed up with an e-mail of thanks (Appendix E) for reading the information regarding the study and encouraging them to contact me via e-mail or telephone. Each participant was also sent a hand-written note thanking them for agreeing to participate in this study with a reminder of the date and agreed upon time for the face-to-face interview. The signed consent form was gathered at the start of the first interview meeting.

Research Methods

Interviews. A case study record was begun for each participant in this study. Critical incident records, which were developed from qualitative narratives, were collected and analyzed. Initial telephone calls to prospective participants began a relationship with professionals interested in the nurse faculty shortage. Website information was gathered regarding the college or university of the participant and clarified by an agreed upon follow up process. Information from each institution included size of total student enrollment, number of nursing students enrolled, number of full time tenure-track faculty, number of adjunct faculty, student-to-faculty ratio, operating budget, human resources open nursing faculty positions posted, BSN nursing handbook, and other posted nursing information. These efforts informed me about the organizations of the participants and saved time at the initial interview.

Demographic profile. A demographic profile was completed by the participants at the first interview, which stated the gender, age, degrees earned, how long in their current position, total years at the college or university, clinical area of expertise, previous management experience, and number of years and position (Appendix F).

The demographic profile was pilot tested by a recent director of nursing at Eastern Michigan University. The pilot test provided valuable feedback, which resulted in a few improvements in the demographic profile for this study. The research participants for this study did not include Eastern Michigan University deans or directors.

Setting for interviews. The brief introductory phone call to the educational leader was successful in attaining the interview, which was conducted at the setting of the participant's educational institution. The choice of the location at the workplace of the

participant and the time was pre-arranged and acceptable to the interviewees. According to Glesne (2006), this arrangement helps the researcher gain an understanding of the social world via direct experience of interviewing in the natural setting of the participant. Each participant was interviewed for a minimum of 45 minutes; most interviews extended beyond one hour but completed in fewer than 90 minutes.

Audio recorded interviews. Original data were gathered from deans and directors of schools of nursing via audio taped interviews, and a notebook of observations, including certain behaviors of the interviewees, was recorded at the time of the interview. Interviews were scheduled during a two-month period. An informed consent letter was e-mailed two weeks prior to the scheduled interview to allow time for the nurse leader to read and reflect upon their voluntary participation. The informed consent was signed at the time of the interview.

A natural and relaxed interchange with the respondent was a key factor in the choice of tape-recorded interviews. According to Silverman “tapes and transcripts offer more than just something to begin with;. . .they are a . . . record;. . .they can be replayed and transcripts can be improved. . .” (2003, p. 354-355). Taped interviews focused on the conversations of the respondents. The researcher took notes immediately after each interview process, which included behaviors and other pertinent information. The audio tapes were transcribed into text and then read again by the researcher, with audio-recording replayed to verify accuracy and reflection upon the narratives. I found that listening to the recordings while reading the text, allowed me to recall the tone of voice and inflections during the interview process. This sound reflection while reading the narratives enhanced the review of the qualitative data.

The interview process was well received by each educational leader. Each dean, director, or department head provided positive feedback regarding the organization of this research study and materials sent. The time of the nurse leaders was limited and, with their busy schedules, there was only one interview with each participant. Moreover, most of the deans and directors contacted were scheduled to leave the country or travel in the near future; thus, to ensure an unbiased study I decided to limit each interview to one recorded session.

Data Collection

Documents and artifacts. Documents and artifacts from each of the selected sites were additional sources of data from institutions' websites for nursing program specifics. A checklist was developed to assure uniformity and consistency of the data search (See Appendix G). I requested nursing school self-study documents by telephone prior to the interviews. The participants verified that these documents would be helpful for this study; however, although each interviewee said that they had the best of intentions, only two shared such information at the time of the interview. The remaining interviewees told me they did not share this information with others.

The college and university websites were the most uniform and proved to be the most successful source of information prior to each interview. Important information collected from the college and university websites included open job postings from the university's Human Resources department, application forms for faculty positions, and faculty orientation or mentoring programs specific to nurse faculty in the nursing department.

Storing data. A participant information packet was created for each volunteer. Taking the time to organize the information in the participant information packet allowed for easy access to information and helped to ensure that each step in the research process was

well documented. The information packet included contact information, a copy of the consent form, audiotapes, that were carefully labeled with code initials, written transcripts, and critical incident records. All associated documents for the research were kept in a locked file cabinet. Participant information was kept confidential. Privacy and confidentiality for the participants were protected at all times by the use of pseudonyms for all names and locations. These names have no connection or similarity to the research participants' identifiers.

Informed consent. Informed consent is essential to ensuring the legal, moral, and ethical approach to a research study. The written informed consent form (Appendix D) was accepted by Eastern Michigan University's Human Subjects Institutional Review Board (IRB) before beginning this study (See Appendix H). Further, I have taken, completed, and passed the online *Collaborative Institutional Training Initiative (CITI)* IRB course (*Protection and Use of Human Subjects in Research*) for investigators, students, and faculty conducting research at Eastern Michigan University and understand the importance of protecting human subjects. At the heart of the informed consent contract is my duty to ensure privacy and protection from harm for the participant, while being careful to create a trustworthy relationship with the potential interviewee.

Data Analysis

Coding of the text narratives acquired from the audio taped interviews was the key to understanding the data. All of the interviews were written in text to do the coding process. Each interview was transcribed from the voice recording. It was important to listen to the recordings several times to ensure accuracy while creating text transcripts. Reference to the field notes taken with descriptions and observations during each interview were also

considered when writing the narrative text of the interviews. A critical incident record for each interview communication topic was constructed directly after each interview. My research journal was read and connected to specific data using parentheses for these additions. Marginal notes written with coding was used to select cyphers and entering reflective thoughts on the narrative text from the interviews. This work was done before proceeding to any additional site. Miles and Huberman (1994) said, “one simple rule of thumb...always code the previous set of field notes before the next trip to the site” (p. 65).

Coding the data started with the marginal notes, then to creation of pattern coding (Miles & Huberman, 1994). I found that arranging sticky notes of these data and patterns on a large 3 by 4 foot laminated sheet of paper and moving them as needed provided an important visual representation. The contemplation of data connections, themes, and thoughts was most helpful in interpretations of my data. Educated guesses evolved into patterns from this visual and manual placement of findings. Painstaking work in reading the written text and associating it with the notes taken during the interview assisted in keying into identified codes. Circling these and writing ideas and comments on the margins of the text were also helpful in studying the qualitative data gleaned from interviewing. The coding work in progress could be easily removed and placed in a locked cabinet when not in use.

General themes were found and concepts connected. Themes are constructs and ideas identified throughout the analysis process from beginning to end. The ideas generated for themes developed from the patterns and connections identified with data analysis. It was necessary to reflect upon the data analysis and take time to study what was uncovered from each case site visit. What were my hunches? What was puzzling about a particular case? It was necessary to look for commonalities and how data findings were connected? Ryan and

Bernard (2003) referred to literature reviews as an excellent starting point for developing their themes in research data. However, researchers often add more themes and subthemes as they continue their analysis (Wilms, Best, Taylor, Gilbert, Wilson, Lindsay, & Singer, 1990; Miles & Huberman, 1994). This researcher expected additional insights and connections would occur and looked forward to working with the data post interview.

Critical incident record. The critical incident record (Appendix B) created from the interview session made the collection of qualitative data efficient and manageable. The critical incident record is a flexible process, and this document was created directly after the interview session, with the reflection upon this document and changes or additions made during the data analysis process. “Once a classification system has been developed for any type of critical incidents, a fairly satisfactory degree of objectivity can be achieved in placing the incidents in the defined categories” (Flanagan, 1954, p. 335). The critical incident record served to organize and generate descriptions of each of the nurse leaders’ narrative reflections on the nurse faculty shortage. Angelides (2001) confirmed that another advantage of the critical incident record is its use in a case study.

An interim case study summary was developed and was extremely valuable in seeking cross-case comparisons because as Miles and Huberman (1994) explained, “The summary is the first attempt to derive a coherent, overall account of the case” (p. 79). The authors stated that 10-25 pages of synthesizing the data could take all sorts of shapes and connections. Creating the critical incident records provided a uniform and objective fluid framework for case study analysis. It was noted that those investigating and analyzing data often generate themes from the text narrative created (Ryan & Bernard, 2003).

Validity and Reliability

Validity of the qualitative data was ensured by using a systematic method of interviewing and constructing an organized data collection. Qualitative validity refers to checking for accuracy of data by clarifying any researcher bias, using various data sources, and checking parts of the transcripts with the participants for agreement of themes and case analysis, including presenting information that runs counter to the themes (Creswell, 2009). “Member checking” was described by Glesne (2006) as a method to share interview transcripts and analytical thoughts to check accuracy. This was done at the time of the interviews and also by intently listening to the recorded interviews. Careful, thoughtful descriptions of each step in the qualitative research will be documented, as Yin (2003) suggested.

Reliability of qualitative research refers to consistency in data collection and data analysis (Creswell, 2009). Check-coding each interview data as it was obtained ensured reliability of data analysis. The critical incident record became the strength of this research, providing a uniform review of the recorded interview for each participant. Using a critical incident record for each interview topic for each interviewee provided a uniform document for analyzing the qualitative data.

Research integrity and quality can be ensured by a relationship with the participant that encourages clarification and contact with the researcher for follow-up of any data about which they may have concerns. It was necessary to clarify data at the time of each interview to accommodate the busy schedules of the participants. A code book created by the researcher is a good way to provide consistency. The researcher should clarify narrative statements as needed. The use of critical incident records used alongside case studies “will

emphasize events that made the difference between success and failure” (Fitzgerald et al., 2008, p. 300). I negotiated rechecking data meanings with the interviewee as needed, by reviewing each taped interview when in doubt. A careful and thoughtful approach served to provide accurate information. Rechecking data and maintaining a positive, professional researcher-respondent relationship aided this data collection process. This study was conducted with the intent to provide thick and rich descriptions of the participants and settings. Creswell (2009) identified the importance of rich and thick descriptions to offer readers the opportunity for transferability.

The Case Analysis

A phenomenological approach to the case study of deans and directors of nursing schools regarding the nurse faculty shortage guided this research. From the interviews, critical incident records, data analysis, case records construction, and problem analysis, conceptual approach case analyses were created. Reflective practices of deans and directors were evident in the case analysis records created from the data studying the problem of nurse faculty shortages in colleges and universities. The reflective exploration of meaning was noted to be important in the Carnegie Foundation studies of higher education for physicians, nursing, clergy, engineering, and law for professional formation (Hamilton, 2012). Glesne (2006) noted that the research methods chosen by the researcher is an expression of the views held by that researcher as knowledge, which is valuable. The qualitative methods are suitable for the complex and changing world of educational leaders in higher education in the roles of deans and directors. By conducting this case study, this researcher values the expression and narratives regarding the nurse faculty shortage that was provided by deans and directors of nursing in colleges and universities.

Summary

The nursing program within selected colleges or universities was the location of investigational interviewing. It was interesting to reflect upon contributions this research may bring to the professions of nurse educators, nurse managers, deans, directors, and educational leaders. Included in this exploration of the experiences of nursing program leaders who were contending with the nurse faculty shortage, was reflection upon the responsibilities of the profession and upon the nursing faculty supply and demand. This qualitative case study of the nurse faculty shortage supplied rich and thick descriptive data from the interviews of educational leaders in nursing programs. The need for this research was expressed by Gerolamo and Roemer (2011), "If long-term solutions to the nurse faculty shortage are not identified, an inadequate nursing workforce will continue to contribute to the uncertainty of the U.S. health care system" (p. 265). The findings from the case studies in this research may offer strategies for grappling with the nurse faculty shortage and may be made available for educational leaders to enhance nurse faculty instruction. "In a teaching situation, well-chosen case studies can help the student achieve competence..." (Flyvberg, 2006, p. 29).

Chapter 4-Presentation of Findings

This multiple case study examined the nurse faculty shortage through the perspectives of individual deans and directors, of six nursing programs offering the pre-licensure baccalaureate of science in nursing (BSN) degree. Data were primarily gathered in the interviews conducted with the deans and directors. Archival data were provided by each college or university, and various websites provided other information about the nurse faculty shortage. The National League for Nursing (NLN) and American Association of Colleges of Nursing (AACN) websites were also used to retrieve archival data about the six participant programs, and two of the six participants shared their college nursing school self-study information.

This study was guided by the following questions:

1. What are the methods and strategies used by leaders at nursing programs to address the nurse faculty shortage?
2. What methods and strategies do nurse educational leaders find successful, and which methods and strategies have been less successful in addressing the nurse faculty shortage?
3. What are the barriers and facilitators to methods and strategies to address the nurse faculty shortage?

Many academic nursing administrators lack formal preparation for leadership (Byrne & Martin, 2014). Therefore, the study of current real life experiences of these educational leaders is necessary to understand the current methods and strategies for faculty retention and recruitment. University and college faculty educate students and prepare them for professions. Carol J. Huston (2014), in an unpublished nursing textbook, framed the issue;

“CONSIDER THIS: Even if enough students can be recruited to become nurses, there will likely not be enough faculty to teach them” (p. 76). Thus, this study focused on learning how current nursing education leaders recruit and retain nurse faculty.

Context for the Study

The six deans and directors in the study led schools of nursing in colleges and universities offering the pre-licensure baccalaureate of science degree in nursing. These schools were in a variety of settings ranging from a small proprietary college nestled in an affluent suburb to an urban university in a major metropolitan city. These schools were located in a state that has experienced a reduction in university and college education funding; this state “ranked the 13th highest in cuts to higher education in the U.S”. (Mitchell, Palacios, & Leachman, 2014, p. 3). Each of the six sites is described separately.

The six deans and directors and their colleges or universities who participated in this study were given pseudonyms to protect anonymity: Sally Andrews, Director at St. Mary’s University, Rita Baker, Director at Bridgeport College, Susan Cornish, Dean at Blue Lakes University, Fran Drake, Dean at Green Hills University, Donna Everett, Dean at University of Forest Lakes, and Olivia Forbes, Dean at Hillside University (See Table 1).

Table 1

Participants: Deans and Directors of Nursing: Years of Experience in Role, Highest Degree;

Nursing School Self-study Shared with Researcher

Dean/Director Name College or University Name	Years as Dean or Director	Highest degree attained	Nursing School Self -Study Shared with Researcher
Director Andrews Saint Mary's University	6 years, first position	PhD	No
Director Baker Bridgeport College	3 years, first position	MSN	Yes- Self-study for Commission on Collegiate Nursing Education (CCNE) Accreditation document
Dean Cornish Blue Lakes University	2 years at this university, 5 years previous experience at another university, as Chair /Director	PhD	No
Director Drake Green Hills University	12 years, first position	EdD	Yes-Self-study for National League for Nursing (NLN) Accreditation document
Dean Everett University of Forest Lakes	3.5 years, first position	PhD	No
Dean Forbes Hillside University	2 years at this university, 20 years previous experience at another university, as Dean	PhD	No

Deans' and Directors' Characteristics

Three deans and three directors of nursing who were contacted and agreed to participate in this study were all female. Five of the six participants were born prior to 1956; thus, the age of participants ranged from 36 to 65 years of age. Five of the six participants

held terminal degrees (PhD or EdD). Director Baker's highest degree was the Master of Science nursing degree (MSN), and she was currently enrolled in a doctoral program.

The demographic characteristics of the six deans and directors interviewed for this study were consistent with research findings. Fang, Liu, and Bednash (2013) reported the low numbers of years deans or directors served in their academic leadership roles, highlighting that "71.4% of those surveyed were in their first deanship" (p. vi). The six participants in this qualitative study had an average of 4.75 years of experience. This university and college years of experience in the current leadership finding of 4.75 years was mirrored in a 2013 (Broome, p. 5.3) quantitative study of 344 nursing deans, with 5.3 years in the dean's position. Research studies were not found indicating reasons for deans and directors of nursing turnover in colleges and universities.

Universities and Colleges

The universities and colleges visited in this study were 50% public and 50% private, not-for-profit, religious-based schools. Two private, not-for-profit universities, St. Mary's University, and the University of Forest Lakes were visited along with one private, not-for-profit college, Bridgeport College. The three public universities visited were Blue Lakes University, Green Hills University, and Hillside University. Recognizing the variety in the composition of universities and colleges, The Carnegie Foundation for the Advancement of Teaching Carnegie Classifications™ (2010) was used to describe the universities and college participating in this study.

Starting in 1970, the Carnegie Commission on Higher Education developed the Classification of colleges and universities to support its program of research and policy analysis. It is widely considered the leading framework for recognizing and

describing the diverse types of institutions in U.S. higher education over the past four decades. (Carnegie Foundation for the Advancement of Teaching, October 2014, p. 1)

Three categories were listed at the top of each college or university webpage on the Carnegie classifications lookup institution website. First listed was *Level*, the level of degree granted; second was *Control*, private not-for-profit, or private for-profit, or public; and third was *Student Population*. However, the student populations shown in this research study were taken from the specific college or university website at the time of each interview for timely accuracy of student population; thus, the third Carnegie Classification category was not used.

The Carnegie Classification of Institutions of Higher Education has six parallel classifications: Basic Classification, Undergraduate Graduate and Instructional Program classifications, Enrollment Profile and Undergraduate Profile classifications, and Size and Setting. The six parallel classifications were used to describe the universities and college in this study (See Table 2, Appendix I).

Undergraduate Instructional Program classification is based on three pieces of information: the level of undergraduate degrees awarded, the proportion of bachelor's degree majors in the arts and sciences and professional fields, and the extent to which an institution awards graduate degrees in the same fields in which it awards undergraduate degrees.

The Graduate Instructional Program Classification for The Carnegie Classifications is not relevant for this study. This study is focused on undergraduate BSN programs. The enrollment profile classification clusters students by the mix of students enrolled at the undergraduate and graduate/professional levels.

All participating universities and a college in a Midwestern state awarded four-year degrees or higher. The approximate annual student enrollments of the six institutions during

the researcher's visits in 2013 summer semester ranged from 1,160 to 19,740 students as follows: 1,160 (Bridgeport College), 2,200 (St. Mary's University), 10,550 (Blue Lakes University), 14,500 (Green Hills University), 4,500 (University of Forest Lakes), and 19,740 students (Hillside University). Each of the higher education institutions' BSN program size and selection of nursing students can be found in Appendix J.

Deans and Directors

Sally Andrews, St Mary's University. The setting for St. Mary's University, a private, religious-based university was on the rural edge of a city with a population of approximately 23,000. The nursing program occupies an entire newer building once used as a private middle school, and is one of the 16 campus buildings. The prior location of St. Mary's University School of Nursing building on the campus was an older dark brick structure, several stories high, built in the early 20th century.

St. Mary's University total annual student enrollment was approximately 2,200. Carnegie Classifications' size and setting classification described St. Mary's University as a "small four-year, primarily nonresidential....FTE enrollment 1,000 to 2,999 degree-seeking students at these bachelor's degree granting institutions, 25 to 49% live on campus, and at least 50% attend full-time." (The Carnegie Foundation for the Advancement of Teaching, 2010, n. p.). The total pre-licensure BSN nursing enrollment was 50 students at the time of the interview. The time to meet for the interview, chosen by the Director, was between semesters with no students present.

After six years of experience developing the first School of Nursing at St. Mary's University, Director Andrews was an engaged educational leader, with the credentials of

Master of Science in Nursing (MSN) Registered Nurse and PhD in Education earned a few years prior to her appointment at St. Mary's University as Director of Nursing.

Director Andrews welcomed this researcher into her office and said she would provide a tour after the interview. The *Student Nurse Handbook* stated, "The Philosophy of the *St. Mary's University* is congruent with the mission and philosophy of its parent institution." The "values of prayer, study, community, and ministry/service are the foundation" were listed as ethical standards of both the department of nursing and the university (St. Mary's University Nursing Department, p. 6). It was clear that Director Andrews embodied the tenants of St. Mary's University. A large religious statue stood outside the walkway to the entrance of the building and she wore a large, gold cross necklace. She gave the history of the building, how it had been used as a private religious middle school but was now the nursing building, and explained that her office had been the middle school principal's office. The rooms were large and light from large windows providing much natural sunlight. Director Andrews pointed to about four low-fidelity manikins when touring the nursing lab. Six faculty offices, which were all in one large partitioned room, comprised the faculty space. Director Andrews commented, "The faculty here is very close and collegial." I could see how the close approximation of nurse faculty to each other would foster teamwork. Director Andrews often commented on future plans for rooms during the tour. She said she would like to take a small office and make it a simulation room with glass on the other side.

Rita Baker, Bridgeport College. Bridgeport College, a small, religious-based college was described in a 2009 Commission on Collegiate Nursing Education (CCNE) self-study document as, "an independent, non-profit, co-educational, liberal arts college" (CCNE.2011,

n. p.) The Commission on Collegiate Nursing Education (CCNE) is a national accreditation agency of the American Association of Colleges (AACN) for baccalaureate and post baccalaureate nursing programs. Director Baker shared the CCNE self-study document with this researcher at the time of the interview.

The Bridgeport College campus was located in an affluent suburb a few miles north of a major Midwestern city. Bridgeport College's total annual enrollment was approximately 1,160 students. The total pre-licensure BSN nursing enrollment at the time of the interview was 58 students. The campus comprised ten buildings of only one to three stories and was just off of a high-traffic multilane thoroughfare. The campus was tucked between homes and businesses so unobtrusively that this researcher drove past Bridgeport College, thinking it was a church with a primary and secondary school. The Carnegie Foundation for the Advancement of Teaching Carnegie Classifications™ size and setting classification described Bridgeport College as “very small four-year, primarily nonresidential... enrollment fewer than 1,000 degree-seeking students at these bachelor's degree granting institutions, 25% of degree-seeking undergraduates live on campus” (The Carnegie Foundation for the Advancement of Teaching, 2010, n. p.).

After three years of experience developing the first School of Nursing at Bridgeport College, Director Baker was an energetic and engaged educational leader, with a credential of Master of Science in Nursing (MSN) Registered Nurse and enrollment in an education doctorate program. At age 36, she was the youngest interview participant.

The Bridgeport Nursing Department was on the second floor of a two-story building. This building had several religious quotes painted in large script on the walls of the first floor in the direction of the nursing offices. The mission of Bridgeport College was stated in the

Student Nurse Handbook : “The mission of the Bridgeport College School of Nursing is to prepare professional nurses in an academically challenging Christian community to provide socially conscious and professionally skilled practice in a diverse and rapidly changing health care environment.” (Bridgeport College Nursing Department, 2012, p. 3).

The time to meet for this interview was chosen by the Director and was between semesters with no students present. Director Baker welcomed this researcher into her very organized and neat office. At the start of the interview she clarified, “So, our college is a Christian background...and up to five years ago they [faculty teaching nursing] were only Church of Christ people from their congregation... I’m not a member of the Church of Christ.”

Susan Cornish, Blue Lakes University. The Department of Nursing at Blue Lakes University was located in the newest building on campus. The College of Health and Human Services Building was large and also housed the undergraduate programs of social work, medical laboratory science, health science, physical education, occupational therapy, exercise science, athletic training, a master’s degree program in health administration and leadership, and three degree levels in nursing; Bachelor of Science in Nursing (BSN), Masters of Science in Nursing (MSN), and Doctor of Nursing Practice (DNP).

Dean Cornish not only headed the nursing programs but also administered all eight non-nursing programs in the College of Health and Human Services. The Carnegie Foundation for the Advancement of Teaching Carnegie Classifications™ size and setting classification described Blue Lakes University as “medium, four-year, selective, primarily residential”...FTE enrollment of 3,000 to 9,999 degree-seeking students at these bachelor’s degree granting institutions; 25 to 49% of degree-seeking undergraduates live on campus and

at least 50% attend full time (The Carnegie Foundation for the Advancement of Teaching, 2010, n. p.).

Blue Lakes University's total annual student enrollment was approximately 10,550. The total pre-licensure BSN enrollment was 676 students during the time of the interview.

Blue Lakes University campus, which comprised 39 buildings, was large and sprawling, with ponds, a wetland preserve, and a water spray in the pond next to the College of Health and Human Services building. The setting was a rural community in the center of a Midwestern state. At the time of the interview, chosen by the Dean, students were present on campus and in the building.

Dean Cornish's 17 years of leadership experience from a previous college and a university contributed to her role as Dean at Blue Lakes University. Dean Cornish, a PhD Registered Nurse and Certified Nurse Educator (CNE), at age 65 years, was the oldest interview participant. She met this researcher outside of her office, and we walked to a conference room with a large table in the middle of the room. This researcher noticed several pieces of advanced technology equipment in the room. The mission of Blue Lakes University Department of Nursing stated, "The department of nursing creates opportunities for intellectual and personal development through academic programs built on professional standards and cultural awareness" (Blue Lakes University Nursing Department Handbook, p. 1). This broad mission statement aligns with the interdisciplinary education model at the College of Health and Human Services. The challenges of hiring and retention of nurse faculty were addressed by Dean Cornish, who was also passionate about recruiting new nurse faculty. Dean Cornish was open during this interview and became emotional a few times when describing the nurse faculty shortage.

Fran Drake, Green Hills University. The School of Nursing at Green Hills

University was located in the College of Health Professions building. Built in 1979, this dark brick structure reflected the style of that time period with long hallways and boxy classrooms. Two elevators and stairways in the building provided access to all six floors. The College of Health Professions building was one of 121 campus buildings. The Carnegie Foundation for the Advancement of Teaching Carnegie Classifications™ size and setting classification listed Green Hills University as “Large, four-year, primarily residential”...FTE enrollment of at least 10,000 degree-seeking undergraduates at these bachelor’s degree granting institutions. 25 to 49% of degree-seeking undergraduates live on campus and at least 50% attend full time” (The Carnegie Foundation for the Advancement of Teaching, 2010, n. p.).

Green Hills University total enrollment was approximately 14,500 students. The total pre-licensure BSN nursing enrollment was 264 students at the time of the interview. The setting was in a small rural city with a population of approximately 10,000.

The 29 years of employment at Green Hills University and 12 years as Director of Nursing had provided both experience and connections at the university for Director Drake, whose credentials included a Master of Science in Nursing (MSN) Registered Nurse and an Education Doctorate (EdD) earned more than 15 years ago while working at Green Hills University. She said, “I know many people here and can get things done.” Director Drake clarified, “the pre-licensure BSN [Baccalaureate in Nursing] program was launched in the fall 2007 semester.”

The interview time chosen by Director Drake was the start of the summer semester with a few students present in hallways. Director Drake shared Green Hills University “Self

Study Report Prepared for the National League for Nursing Accreditation Commission (NLNAC)” with this researcher at the time of the interview. The document stated, “Founded in 1884, *Green Hills University* is distinguished by its strong heritage of opportunity and focus on providing a professional education that links theory to practice” (Drake, 2012, p. 6). Director Drake was at her desk and stood up to greet this researcher. She promptly invited this researcher to sit with her at a long table in her office. Director Drake was self-assured and spoke with ease throughout the interview. She shared that she was close to retiring from Green Hills University.

The mission of Green Hills University stated,

Building on the mission, vision and values at Green Hills University and the College of Health Professions, the mission of the School of Nursing is to provide innovative and relevant undergraduate nursing programs that prepare graduates for roles in current professional nursing practice and who can effectively respond and contribute to future changes in the nursing profession and the health care delivery system.

(*Green Hills University Nursing Department Handbook*, p. 1)

This mission statement above accurately addressed the Nursing Department at Green Hills. It is however lacking any description of interdisciplinary studies, even though the nursing program is in the College of Health Professions at Green Hills University.

Donna Everett, University of Forest Lakes. The School of Nursing at University of Forest Lakes, a private, religious-based university, was located in the College of Health Professions building, which was built in 1962 and included an annex addition built in 2004. The annex was a light brown brick construction of three floors and was one of 24 buildings on campus. The University of Forest Lakes campus was entirely enclosed by black iron

fencing. The Carnegie Foundation for the Advancement of Teaching Carnegie Classifications™ size and setting classification for University of Forest Lakes listed “Medium, four-year, primarily nonresidential”...FTE enrollment of 3,000 to 9,999 degree-seeking students at these bachelor’s degree granting institutions. Fewer than 25% of degree-seeking undergraduate students live on campus and /or fewer than 50% attend full time” (The Carnegie Foundation for the Advancement of Teaching, 2010, n. p.).

University of Forest Lakes’ total annual student enrollment was approximately 4,500. The total number of pre-licensure students at the time of the interview was not shared with this researcher. The parking lot entrance had a gate down and stop sign. The guard operating the gate questioned my reason for visiting University of Forest Lakes. This researcher provided Dean Everett’s name and the time of the scheduled meeting. The guard lifted the gate arm and pointed to a visitor parking lot. This was the only time when visiting a college or university that this researcher was greeted by a parking lot guard. All other colleges and universities were open campuses. University of Forest Lakes was in a downtown city setting with a population of fewer than one million.

Three and one-half years as Dean of the School of Nursing and previously 18 ½ years as faculty at University of Forest Lakes contributed to the role of Dean Everett at University of Forest Lakes. Dean Everett, a PhD Registered Nurse also had nine years of experience as Executive Director of a Health Care System.

Upon arrival at Dean Everett’s office, the administrative assistant led this researcher to a large conference room. Dean Everett entered the room at the same time and we introduced ourselves, and sitting at the large table, we began the interview session. Dean Everett, an experienced educator and former executive healthcare director was Dean of the

College of Healthcare Professions, leading not only the School of Nursing but also the following programs: physician assistant, nurse anesthesia, and health services administration. Dean Everett quickly explained that she was very busy and that the interview had to begin and end on time, which I acknowledged and adhered to the time limit.

The mission statement for the College of Health Professions at University of Forest Lakes was listed on the website, but there was not a specific mission statement for the School of Nursing, and the mission statement lacks any description of interdisciplinary studies. “The mission of the College of Health Professions in the religious-based traditions prepares professionals to lead individuals, families, and communities to optimal health and well-being.” With the Doctor of Nursing Practice (DNP program) in place at University of Forest Lakes there is an option for hiring new nurse faculty with a clinical track who are DNP-prepared as well as nurse faculty who are PhD-prepared.

Kay Forbes, Hillside University. The School of Nursing at the public Hillside University was located on the third floor of the Human Health Building. The Carnegie Foundation for the Advancement of Teaching Carnegie Classifications™ size and setting classification for Hillside University listed “Large, 4-year, primarily nonresidential” ...“FTE enrollment of at least 10,000 degree-seeking students at these bachelor’s degree granting institutions. Fewer than 25% of degree-seeking undergraduates live on campus and/or fewer than 50% attend full time...”

The Human Health Building was recently completed in 2012 and was described as environmentally friendly with state-of-the-art teaching and simulation labs. The new, modern brick and glass structure, one of 48 buildings on campus, had five floors and much glass allowing sunlight to enter the building. Hillside University’s approximate total

enrollment was 19,740 students. The campus was located in a large, affluent suburb with wooded hills and meadows.

Dean Forbes was an experienced clinical nurse with 35 years of women's health expertise and more than 20 years of experience as a director or associate dean prior to her appointment, where she was in the second of two years of employment as Dean of the School of Nursing at Hillside University. This varied experience shaped Dean Forbes as an educational leader. At 62 years of age, she was the median age for the interview participants.

She mentioned "the mission of the school," meaning Hillside University, in her description of her role as an educational leader at Hillside University. The mission of Hillside University stated:

As a state-supported institution of higher education, Hillside University has a three-fold mission. It offers instructional programs of high quality that lead to degrees at the baccalaureate, master's levels and doctoral levels, as well as programs in continuing education; it advances knowledge and promotes the arts through research, scholarship, and creative activity; and it renders significant public service. In all its activities, the university strives to exemplify educational leadership in a diverse and inclusive environment.

There was no mission statement for the School of Nursing at Hillside University in the student handbook or on the website. However, Dean Forbes' descriptions of the plans and development of the School of Nursing were congruent with the mission statement of Hillside University.

Dean Forbes shared that she was at another university approximately seven years ago and this other university partnered with Hillside University to begin the first Doctor of Nursing Practice (DNP) in the state.

“We [Hillside University] were the first to offer it [DNP]. So, it was before there were even AACN Essentials around a DNP.” The American Association of Colleges (AACN) of Nursing DNP essentials were initiated by the Commission on Collegiate Nursing Education (CCNE) accrediting agency for baccalaureate and graduate programs for creating “a consistent set of standards titled the Essentials of the Doctoral Education for Advanced Practice Nursing (DNP Essentials), which identify foundational curriculum content and outcome” were first made available in 2006 and are only available in pdf form (DNP, 2006) The following quote gives an example of the new nature of the DNP program.

AACN also created the implementation of the DNP Task Force in July 2013 to provide greater clarity regarding the DNP scholarly project and the clinical practice hours' requirement outline in the *DNP Essentials*. A white paper from this task force will be released in July 2015. (*DNP Talking Points; DNP Transition in Progress* <http://www.aacn.nche.edu/dnp/about/talking-points> Last update: July 2014)

Methods and Strategies to Address the Nurse Faculty Shortage

The focus of the higher education visits was to interview the dean or director of nurse education institutions to identify their experiences grappling with the nurse faculty shortage and to discover the strategies or methods used at their university or college to ameliorate the problem. Each size and setting classification was unique; no higher education institution was similar in all categories (See Table 2-Appendix I). The methods and strategies used by higher education heads of nursing programs to address the nurse faculty shortage revealed a wide

range of approaches to address the nurse faculty shortage. Data was gleaned by following the “Interview Protocol: Open-Ended Guiding Questions” shown in Appendix A.

The deans and directors shared their experience with methods they used to address the nurse faculty shortage and possible strategies to implement for improving the nurse faculty shortage situation. Both successful methods and unsuccessful methods of faculty hiring and faculty retention attempts to ameliorate the nurse faculty shortage were revealed. Two innovative methods and successful strategies were applied at Blue Lakes University and Hillside University, whereas three unsuccessful methods or strategies for ameliorating the nurse faculty shortage situation were realized at Blue Lakes University, Green Hills University, and University of Forest Lakes.

Successful strategies and methods. Two innovations were joint appointments of faculty with clinical institutions, including an endowed professorship, and implementing a new curriculum using a high fidelity simulation lab four hours per week.

Joint appointments. The first successful innovation used by Dean Cornish and Dean Forbes involved joint appointments. Dean Cornish described a joint hospital-university faculty appointment:

...Joint appointments, I think, is a real viable choice, I have inroads with all three, my three biggest partners, to give me some time of their clinical managers. So, to not share benefits or salary but to give me one [joint appointment with clinical facility] and one is giving me two days a week of a nurse manager, to come and work in my Sim [Simulation] labs. So, we're doing innovative things here to attract faculty who have worked clinically.

Dean Forbes also recognized the use of the successful innovation “the one joint appointment with a local hospital.” Dean Forbes said, “We’re doing innovative things here.” She attempted to ameliorate the nurse faculty shortage by offering the endowed professorship, which was a joint appointment. The endowed chair position was a means for promoting the nurse faculty role at Hillside University. “We have an endowed professorship, a faculty member who holds the [names local hospital] endowed professorship.” She said the professorship helped to attract and pay for a nurse faculty with expertise in gerontology at the local hospital. Thus, the endowed scholarship position assisted Hillside University in their efforts to educate nursing students.

A new curriculum. Dean Forbes planned and created a curriculum to match what she considered the future stance of BSN education. She expanded on the idea of clinical simulation by describing the simulation lab at Hillside University. She regarded the simulation lab as a tool for teaching nursing students.

We have, I should show you our labs, we have a state-of-the-art simulation lab and high-fidelity manikins in all of them, obviously. And those are enclosed so it looks like a hospital room, but it’s glass, and so, the anteroom is where we have the computer and the microphone and recorder and all that kind of thing. But we also have a state-of-art nursing assessment lab and a skills lab where we can learn to do assessments and skills, which are just amazing. We’ve been very lucky.

The manikins talked and responded, had respiratory rates, and heart rates, and the obstetrical manikin even delivered a baby. This researcher was given a tour of the simulation lab and it was very impressive. It was an entire suite of six hospital rooms enclosed with doors and glass, each with a hospital bed and high-fidelity manikin with monitoring

equipment. The educators could control the events of the manikins from an enclosed anteroom next to the hospital simulation rooms. The manikins were teaching future nurses how to care for adults, children, infants and expectant mothers.

Dean Cornish described a program that includes four hours a week of clinical simulation for every student at Blue Lakes University. Dean Cornish further explained the use of some semesters more of simulations:

... so that we're looking at how many, rather than all clinical having to be in the hospital, some of the clinical is now simulated versus hands-on in the hospital, and we're trying to get the faculty to see that, for instance, with acute peds (pediatrics) and OB (obstetrics), that a lot of it could be simulated and more effectively and efficiently accomplished. So those are some of the things we're doing. Every bed in the lab has a manikin for the bed.

We have Sim [Simulation]-Man in our ICU and he's not the 3-G, he's the one just below that because our lab is equipped in a way that we can have a simulation in the lab and through our cameras and our EMS system that can be broadcasted to a classroom upstairs or into the center classroom downstairs, or out to any of the classrooms on the first floor, so that we are very technologically equipped.

... we have not bought the \$85,000 3-G manikins yet, we have the other SIM-Man, and we have the Sim [Simulation] Mom, and we have Sim [Simulation] Baby. We have the NOVELL [birthing model], so we have pretty much all of the simulation equipment that we need in order to create simulations that are effective and realistic.

... when I first arrived, I finished out the building budget and we spent \$285,000 more in the lab when I got here, but they'd already purchased quite a bit of equipment before I got here.

The narrative by Dean Cornish described the use of high-fidelity manikins—"manikins that breathe, with breath sounds, heart tones, and palpable pulses. In addition, the manikin has a monitor that can display EKG, pulse oximeter, blood pressure, arterial wave forms, pulmonary artery wave forms, anesthetic gases, etc. Procedures can be performed on the simulators such as bag-mask ventilation, intubation, defibrillation, chest tube placement, cricothyrotomy and others (Johns Hopkins Medicine, Manikin-Based Simulations, para 1).

Dean Cornish increased the capacity of Blue Lakes University BSN program for both Fall 2012 and Winter 2013 semesters by implementing clinical simulations using high-fidelity manikins. Thus, Dean Cornish used the innovative approach of simulation teaching nursing students in clinical courses.

At the end of Winter Term, I said to the faculty, well, I want to congratulate you on doing this, and you didn't just survive, you thrived and you figured out how to fund our simulation lab effectively and efficiently, you figured out how to double our clinical placements in creative and effective ways, and I would like to put in an application to the State Board to increase our enrollment by 32 students in the fall and 32 in the winter. Because you can do it, you did do it, and you did it with 64 extra people in the fall and the winter, and I'm only asking you to do it with 32 more. And so your sections won't be any bigger, it'll just be one more section. So nobody will have extra students, there will just be an extra section, so the faculty won't be stretched. And they are willing to do it, which I was quite surprised. So that's what

we're doing, we've put an application in; it's in the process now being finished up to go to the State Board to increase our capacity here for our basic undergraduate students. We're an upper-division program. We turn away students. We have, right now, we just had 150 applications for our 64 seats, and they are our own students, right here. So if they don't become a nurse, they're waiting to come in the next time. So ... this is the right thing to do.

The innovative approach Dean Cornish brought to increase the BSN enrollment capacity was successfully accomplished by Blue Lakes University nurse faculty using a simulation lab with high-fidelity manikins. It was an important innovation because it added to the number of pre-licensure nursing students being taught at Blue Lakes University. Therefore this innovation increased the number of Registered Nurses available in this Midwestern state.

Unsuccessful strategies and methods. The three unsuccessful methods and strategies for improving the nurse faculty shortage situation were discussed by the deans and directors. Their ideas included hiring new nurse faculty who were completing a doctorate degree, offering tuition reimbursement for new faculty hires (and tuition reimbursement for new faculty's college-aged children), and a plan to begin a doctorate program and *grow your own* nurse faculty.

A method for hiring nurse faculty implemented by Dean Cornish, Director Drake, and Dean Everett's predecessor was hiring new nurse faculty who were completing a doctorate degree. Director Drake provided an example of a recently resigned nurse faculty. The PhD-prepared faculty member was not meeting tenure conditions, as Director Drake expressed in her narrative:

Let's see, I'm trying to think of new faculty [employees] that have resigned. Well, I did just have a faculty member resign at the end of this academic year, and that person was a tenure-track faculty member. But to be honest, it really was, this person resigned because it was becoming clear that she was not going to be able to meet the conditions of tenure.

“Growing your own” nurse faculty became a strategy. Director Drake utilized at Green Hills University. She devised ways to make this strategy work in an effort to attract and retain nurse faculty. Director Drake described ways she assisted new nurse faculty hires in attaining their doctorate degree. She explained how she often assisted in this process.

And so, I try really hard to look at their workload and, let's be honest, there are some workloads that are worse than others, so you know, I just would be really intentional about that. And so, if they could, instead of having four preps, they had two preps, two sections, and two courses, I did that.

However, there is not an advanced nursing doctorate degree offered at Green Hills University. Director Drake attempted to offer perks to those completing a doctorate with some unsuccessful outcomes. Director Drake had attempted to assist new nurse faculty hires but did not actually have an advanced degree at Green Hills for new faculty hires.

Dean Cornish, Director Drake, and Dean Everett hired some faculty working to complete their doctorate but this did not always work out for the nursing department or the faculty person. Dean Cornish described a nurse faculty member at risk for tenure denial who had not completed her doctorate degree.

Someone just resigned this past, just two weeks ago. She's tenured. It was shocking that she resigned. She's struggling to finish a dissertation and she's a nurse midwife;

she's been practicing one-day a week and they offered her the opportunity to practice [working as a nurse midwife] full-time, and I think she just gave up on the dissertation. She's [at risk for not reaching tenure], her time is running out on the dissertation. She's at the 7-year mark, and she's at Wayne State; I think she's just decided that life is short. She just went through a fairly emotional divorce, and I think she just decided do that, rather than continue to stay here. But the rest of the faculty is very stable. This is a nice place to work. The students are nice. We have twice as many students applying to the program than we admit, so the students are very good students. The faculty is a collegial group of people to work with. It's a good place to work.

Moreover, Dean Cornish bargained with a new faculty hire by offering 75% tuition for this new hire and 50% tuition for the daughter of the new faculty hired. Even though hiring nurse faculty completing a doctorate had not been successful in the past, she was again using this bargaining tactic.

Not enough nurse faculty potential hires with terminal degrees. A narrative from Dean Everett below illustrated the need for new faculty hires and stated the problem of new nurse faculty hires being a retention risks if they were attempting to complete a doctorate degree. Her experience with faculty completing a doctorate degree while in a new faculty role follows:

Like I said, before I got here, there was a pretty remarkable increase in enrollment and in order to address that there was an onboarding. In two years, probably six years, five, four, five years ago, right before I got here, in two years they onboarded, I think 13 or 14 new faculty. I mean, it was (pause) the increase was pretty significant. Well,

when you're onboarding that many people, it's hard to find that many people with terminal degrees, so we onboarded [hired new nurse faculty] the majority, who were not prepared with their terminal degrees and were trying to do this job full time and go to school full time... And in my opinion, it was not a good strategy. It wasn't a good strategy at all. So, of that cohort, we've lost many of them, many of that 13 or 14. I would say maybe 60% of them are gone, and I have some concerns about two others that I don't think they're going to be ready, to be tenure-able.

Dean Everett discussed further why the previous dean's new hires "wasn't a good strategy." The need for scholarship to attain tenure status had been the issue. Dean Everett also explained that due to the loss of those previous doctorate-seeking hires, she was required to hire 11 new nurse faculty members. The demands of going to school for doctorate courses and writing the dissertation take away precious time required to attain tenure at the university. Dean Everett further reflected on her recent hires stating, "I've had to replace, you know, that turnover from before." She reflected more on the problem encountered from hiring new nurse faculty who did not have the terminal degree.

Because all of their productivity in the five years before they apply, and their sixth year has been going to school. And, as you know, in an academic university, in an academic arena, that is insufficient evidence of scholarship to render one eligible for tenure. So it's not that they're bad people, but it just wasn't a good plan. So now, I could grow the program but won't until we stabilize that [new nurse faculty hires]. And now... since I've been here I've on boarded one, two, three, four, five, six, seven, eight, nine, ten, eleven, so I've on boarded 11 [hired new nurse faculty] in three years because I've had to replace, you know that turnover from before. We had

someone who moved ... And of the 11 that I've on boarded, I would really say I've only got one that I think was a mistake.

Dean Everett assessed the faculty hiring and retention problem from past faculty hires lacking terminal degrees and made a concentrated effort to avoid this unsuccessful strategy. The problem identified was the fact that faculty hires lacking terminal degrees did not meet tenure status due to the demands of doctoral work. Some of these new hires left voluntarily because they would not meet tenure requirements at the university or college. Consequently, hiring new nurse faculty seeking terminal degrees had created a faculty retention problem.

Thus, both successful and unsuccessful strategies and methods used to improve the nurse faculty shortage issue were discussed by the deans and directors interviewed. Joint hospital-faculty appointments were successful innovative approaches used by Dean Cornish at Blue Lakes University and Dean Forbes at Hillside University. Dean Forbes at Hillside University and Dean Cornish at Blue Lakes University use clinical simulation teaching in their innovative a new curriculums, which also resulted in increased capacity for BSN education of nursing students. Additionally, this increased capacity for Bachelor of Science in Nursing (BSN) students resulted in the increase of BSN nursing student graduates for this Midwestern state.

The three unsuccessful strategies reported by deans and directors at St. Mary's University, Blue Lakes University, Green Hills University, and University of Forest Lakes University involved hiring new nurse faculty in the process of completing a doctorate; a growing your own nurse faculty, and offering tuition reimbursement had not resulted in retention of nurse faculty.

Barriers to Improving the Nurse Faculty Shortage

Many factors contribute to the nurse faculty shortage in colleges and universities. Barriers to nurse faculty hiring and retention were discussed during the deans' and directors' interview sessions. Barriers included low faculty salaries compared to clinical salaries, lack of administrative support for monies to hire and attract nurse faculty, competition for nurse faculty from other colleges and universities; new hires needing to complete a doctorate degree are at risk for tenure denial, needing a faculty mentoring program, new nurse faculty hires lack of teaching experience, and Doctor of Philosophy (PhD) nurse faculty retirements.

The root cause of the barriers and the nurse faculty shortage: low pay and lack of administrative support. Director Andrews talked about the previous and current state of hiring and retention of nurse faculty at St. Mary's University. According to Director Andrews, the barriers to ameliorating the nurse faculty shortage at St. Mary's University corresponded to the general list of barriers: lack of PhD-prepared nurse educators, lack of teaching experience by new nurse faculty hires, lack of administrative support, and low faculty salaries compared to clinical salaries.

Hiring the positions and retaining the faculty resulted in a need for PhD-prepared faculty. The lack of faculty with doctoral degrees and the majority of nurse faculty new hires who lack any teaching experience are the two main concerns that Director Andrews presented during her interview. She was forthcoming about the barriers underlying these concerns at St. Mary's University: low pay and lack of administrative support.

We've grown into having six full-time faculty positions. Over that time, I've had 18 applicants. The people I've hired and the people who have left over that period of time have been either open, new positions when they've left, or I've had a new

position added because we were growing and I could demonstrate I needed a position due to number of students, number of courses.when we've opened positions,...we've been blessed to get applicants. But the concern from my point of view is that two of the 18 people who have applied had a PhD; everyone else had a master's degree. Both the PhDs I hired have retired or left. The initial PhD hire was a nun who actually had taught for years and wanted to come here to start the program because it was her Order, and she has since retired. The other PhD I hired, stayed a semester; she was a phenomenal teacher, but her mother became very ill, and her mother was out-of-state, and she had to move to go care for her mother. So, my biggest concern is not having PhD-prepared applicants. The second has been ...Most everyone I've hired has been new to teaching, which has been good and bad.

At the time of the interview, St. Mary's University had no PhD-prepared faculty. Director Andrews shared her concern that all current nurse faculty members were hired at St. Mary's University at the instructor level, "because it was their initial teaching position in nursing." Director Andrews further explained that only one faculty member had recently earned the rank of assistant professor, advancing from the instructor level. Director Andrews was involved in identifying the hiring and retention problems.

Director Baker discussed previous and current states of hiring and retention of nurse faculty at Bridgeport College. The barriers to ameliorating the nurse faculty shortage at Bridgeport College were similar to Director Andrews': lack of PhD-prepared nurse educators; new nurse faculty hires' lack of teaching experience, lack of administrative support, needing a mentoring program, competition for faculty from other colleges and universities, and low faculty salaries compared to clinical salaries. Director Baker noted that

hiring the positions and retaining faculty had been a challenge with the low salary at Bridgeport College. Director Baker highlighted the need for PhD-prepared faculty.

...How am I going to attract this diamond in the rough, and then I have the CCNE [Commission on Collegiate Nursing Education] telling me, where in the heck are your PhD people? You have to bring on PhD people. But honestly, I've never even had one PhD person ever apply here, never once, because we're not a research institution. I don't even think we can care for a PhD professor. But we do attract a lot of DNPs [Doctor of Nursing Practice], and the CCNE told me, without any qualms, that the jury is out when it comes to the DNP.

Director Baker considered the low salary of nurse faculty at Bridgeport College a root cause of retention challenges for the faculty. She described an experience with one mental health nurse faculty and one pediatric nurse faculty, demonstrating the low nurse faculty salary issue.

Well, two that we had in mental health and peds [pediatrics] both left after, like six months...The one is changing careers; she moved to Chicago, and then the other one, the mental health one, actually just went into practice. She was the one that was, like, diagnosing everyone, but what she did also, was, on a daily basis ask me for more money. Constantly barraging me with information about how much she can make as a psych [psychiatric nurse] in peds [pediatrics nurse] out there, and I wasn't going to dispute that in any way, shape, or form, but I was so, like, I couldn't figure out where this disconnect was, because all nurses can probably make more outside of academia.

Director Baker explained that for retention of nurse faculty, she wanted new hires who were "self-motivated" and who "knew academia" and knew the "way to survive." She

stated that she had a couple faculty hires like this and acknowledged the retention problem extended to them also. This need for faculty who “knew academia” appeared to be a situation where these new hires need mentoring. However, Bridgeport College had no mentoring program for new faculty. Then Director Baker commented, “I have a feeling that they will be leaving next year though, and that’s because they leave every three years and go somewhere else. I mean that’s what their CV (curriculum vita) shows me.” She threw down her hands and raised her eyebrows and gave this researcher a look as if to say, “You know?” The more she reflected on the subject of hiring and retention of nurse faculty, the more emotion she exhibited during the interview. When Director Baker identified the nurse faculty shortage situation at Bridgeport College, she added the competition for faculty barrier to faculty hiring and retention. The need for a new faculty mentoring program was implied by the statements describing new faculty as needing much support from this director and Director Baker’s comments that she wanted new hires “who knew academia” and knew the “way to survive.”

Faculty hires sometimes need a faculty mentor. Dean Cornish discussed the state of hiring and retention of nurse faculty at Blue Lakes University. Dean Cornish’s interview regarding the barriers to nurse faculty hiring and retention was in agreement with both Director Andrews and Director Baker: lack of PhD- prepared nurse educators; new nurse faculty hires lack of teaching experience; needing a faculty mentoring program; and low faculty salaries compared to clinical salaries. However, rather than implying the need for a new nurse faculty mentoring program, Dean Cornish explicitly included the focus needed in a nurse mentoring program of senior faculty mentoring new hires. She explained that new nurse faculty hires sometimes need a faculty mentor and she will offer new faculty the opportunity to observe other teaching styles. She related this as an example of how the Dean

assists new faculty in the tenure process at Blue Lakes University. The issue of hiring PhD-prepared faculty is also a particular focus. Regarding faculty retention, Dean Cornish related the support and clarity needed for faculty to attain tenure in tenure-track nurse faculty positions at Blue Lakes University.

But, it should be no surprise to anyone when someone doesn't get tenure. So, I think that when someone's not a good fit, they need to be told up front, they need to be told how they can fit, and if they can't fit, and they're not willing to do what's necessary to fit, then it's a better, it's much better that you let them know that after the second year. The first year, right away, you seem to be struggling, this is what I see needed, this is what I would suggest, and I'll go the extra mile and work with them myself. I'll come to their class, I'll do peer evaluations, let them come to my class and watch me teach, I'll pick out a faculty mentor for them to go and observe them teach, teaching isn't rocket science, it's easy, it's natural for someone who enjoys it and not everybody has to teach the same way. So, I'll find a couple of different people who have different styles that they could see and watch and make a lot of suggestions, send them to conferences, invest in them as an individual, and if the investment doesn't pay off, and if they can't find their way clear to make it work for them, then give them a good recommendation, in terms of other places where they might fit better and send them on their way, because my students are important to me, and so are the other faculty.

Dean Cornish understood the need for new nurse faculty mentoring, however Blue Lakes University had no formal mentoring program for new hires. Dean Cornish was enmeshed in problem identification and attempting to create a supportive mentoring

environment by “letting them [new faculty] go observe them [senior faculty] teach.” This haphazard approach to a mentoring process described by Dean Cornish in the narrative above is not a mentoring program. Dean Cornish was candid, relaying the challenges of hiring faculty and faculty retention, even realizing that all faculty hires will not be a good fit for the Nursing Department at Blue Lakes University. Her statement, supported the narrative above; “It’s better in my experience to work with someone with a defined end goal in mind, with clear cut expectations and to terminate sooner rather than later.”

Director Drake deliberated on the issue of hiring and retention of nurse faculty at Green Hills University, describing the hiring faculty experience as “an ongoing challenge.” Her list of barriers to ameliorating the nurse faculty shortage at Green Hills University that corresponded with other directors’ were lack of PhD-prepared nurse educators, new hires needing to complete doctorate degree at risk for tenure denial, faculty retirements, faculty needing a mentoring program, and low faculty salaries compared to clinical salaries.

Additionally, Director Drake saw that many of the nurse faculty with doctorates would be leaving for retirement. The addition of the barrier of nurse faculty retirements to faculty hiring and retention by Director Drake meant a new challenge. Therefore, even though four nurse faculty members were new hires at Green Hills University, three of the four were at risk for tenure denial because they did not possess a doctorate degree.

... [nurse] faculty who are doctoral-prepared tend to be near retirement, so I think it mirrors the nursing population, the demographics of nurses in clinical practice. The baby boomers are getting ready to move out and those are most of your doctoral-prepared folks and so you end up having this cycle of, you know. So this year, for instance, when I hired four new people, only one of them came with a done doctorate,

one had just started a DNP (Doctor of Nursing Practice) in community health leadership, and she's in the program and just starting this summer, her courses. So, I guess she was accepted, but I hired two other people who aren't even in a program yet and they need to do it to stand for tenure. So, it's going to be really a hard thing, a push for them to get that done. And so to me, that's the challenge (pause) finding people who are willing to do that and meet it [complete a doctorate] or to understand what that really means. So (pause), that's to me, the biggest issue.

Director Drake stopped to think and collect her thoughts. She stated what she considered to be the key to retention of nurse faculty. Mentoring and supporting new faculty were listed as key to retention, as she described during the interview.

I think the key is to do a really good job of mentoring and supporting new faculty. And, I guess as a director, I've always considered that to probably be the most important thing that I do, is to develop, support my faculty, and remove barriers to allow them to do what they need to do. So, I've been really always very, very intentional about it; and even though the academic system has an automatic framework that supports that through the tenure process and having a tenure chair and a tenure committee, certainly that helps to support faculty. But I really go above and beyond that and make sure that they have somebody that they can go to for every need that they would have. And so, I even like to, to sometimes assign them to maybe a faculty mentor who might not be on their tenure committee or maybe, depending on the courses that they're teaching, hook them up with someone that can really help them with that.

However, there was no mentoring program at Green Hills University, even though this support was considered key to successful hiring and retention of nurse faculty.

Dean Everett explained the current and previous experiences of hiring and retaining nurse faculty at University of Forest Lakes. The barriers she listed to ameliorating the nurse faculty shortage at University of Forest Lakes that corresponded with other directors' were: lack of PhD prepared nurse educators, new nurse faculty hires lack of teaching experience, and needing a mentoring program. Dean Everett added the barrier of lack of (union) administrative support. She noted that before she became Dean, "they had a very difficult time." Dean Everett also credited the practice doctorate (Doctor of Nursing Practice, DNP) as helping with the nurse faculty shortage, saying this has been an option to complement the PhD in nursing; thus, she hires from both earned doctorate pools for nurse faculty. Dean Everett had identified the problem and was attempting to problem solve by hiring a more untraditional DNP prepared nurse faculty. Another challenge to hiring faculty listed by Dean Everett was the current union contract, because the Dean has no advance notice of faculty leaving employment. Dean Everett's narrative below discussed these points.

Our experience has been good [knocking on the table] over the past three years. Prior to my administration there, and I don't, I can't explain it but they had a very difficult time recruiting people with earned doctorates. So we had, and then the program grew and we had an influx of a lot of people in doctoral programs, which created kind of a burden. But since I've been [Dean] we've really been able to target and articulate, I think our mission and our unique, kind of position in the community and attract people who have affiliation or affinity for working in an urban setting, making a contribution, engaging in community practice, broadly interpreted, and with the

advent of the DNP [Doctor of Nursing Practice], and the fact that we have programs that align themselves with an infrastructure that supports PhD [Doctor of Philosophy] and DNP prepared faculty. It has not been as difficult as it has been previously. So we typically post in the fall, you know, when we have a sensibility, here, however, faculty under, because they're part of a bargaining agreement, have no obligations to report that they're going to leave; there's no requirement. So sometimes it's difficult to know what your holes are going to be. I have taken the stance though, that if I can't find the right person, I'll hire a term appointment and just keep searching and start a contract in January...

There was an increase in nursing student enrollment at University of Forest Lakes which then meant more nurse faculty needed to be hired. She relayed the information that the previous dean hired "13 to 14" new faculty, and most did not have doctorates. Dean Everett stated that "maybe 60% of them are gone," because they were trying to start as new faculty at the same time they were attending school for a doctorate degree.

The role of faculty unions. Dean Everett reflected upon the faculty development of new hires as a retention issue. She recognized that faculty development was an area requiring improvement. As Dean, she suggested that the faculty union should be helping with faculty development and tenure requirements. Dean Everett gave a sketchy account of how the faculty union at University of Forest Lakes will assist with faculty development.

We're actually working to fix that. I'm not happy with what we've been doing. So, we have a faculty development research committee, and then I've asked the bargaining unit officers. Because the bargaining unit never oriented faculty to the contract, I'm like, that's not my job, and I don't do that. So they're like, they're

finally going to step up and do that I have now a Dean's Advisory Council, and so we're crafting the elements of the, what I would call the curriculum, and we have decided we're not just doing it in August; it's going to be, also on the university level we have a junior/senior faculty group that gets together that's interdisciplinary. That happens through the Provost and the Vice President for Mission and Identity, and that's very helpful as well. So, we're in process ... They got to know how to maneuver through Blackboard, you know? That's what they got to know and don't worry about the Mission..., and then in January we'll have Part II, and then we're building a different model for getting ready for continuous employment and tenure and promotion. So, we're really engaging our governing structure to take up more of that and make that part of their agenda.

Dean Everett acknowledged University of Forest Lakes' need for a faculty mentoring program for new hires by listing this barrier to faculty retention and hiring, as did Director Baker, Dean Cornish, and Director Drake.

Dean Forbes was somewhat limited in her discussion of hiring and retention challenges explaining, "I've only been here two years." She declined to give any feedback on nurse faculty hiring and retention challenges. Finally, when asked if no faculty had left, Dean Forbes did reply, "Yeah, so we haven't lost anybody that I am aware of. We lost one to retirement."

Dean Forbes explained some of the hiring process and experience with new faculty who did not seem to be a good fit. Dean Forbes supplied the enlightenment of "we look beyond the CV" and "we look for fit." Nevertheless, she failed to describe what "we look beyond the CV" and "we look for fit" achieved in the hiring process. She stated a

generalization of selecting new faculty at Hillside University; however, Dean Forbes did not reveal the process for selection of nurse faculty. “No. That’s one thing I really have very much enjoyed here. But when we hire people ... we look beyond just the CV [curriculum vita], I’m sure most places do, but we look for fit and that’s very important to us.”

Dean Forbes explained the retention of new faculty with a discussion of development of new faculty. She credited the Associate Dean with this retention role. Hillside University did assign new faculty a mentor, and there were some university-wide education and teaching programs.

Well, my Associate Dean works a lot with that. He’s usually the first one that works with faculty, but we do have a mentoring program. So, we assign all new faculty a mentor that they work with. Usually it’s, even a mentor that, like this person is really helpful with knowing about the skills lab, this person is really good online. The other thing is that university-wide, we have a center for education and teaching and learning excellence, and the programs there for new faculty are phenomenal. So I always make sure that they have the time and can get there and learn how to put a good course online and what it takes. And, so all of that. So there’s a lot of, besides our own mentoring within our school, there’s also other mentoring aspects that I use across campus.

Dean Forbes spoke of the newer expectation that all registered nurses will be hired with a minimum of a BSN degree for *Magnet Status* and Hillside University’s engagement in the nursing program curriculum divisions. Dean Forbes also stated what she considered paramount in faculty retention, “We’re kind and respectful to one another.” Dean Forbes

focused on developing a nursing department “that this also becomes a place people want to work.”

Well, you know, one of the things that we’re doing here, *Magnet Status* was something that really helped, I think, with nursing and attrition and all of that. And so, as we do the revisions here on our baccalaureate curriculum and within faculty and some of the things that we’ve been doing, I’m trying to create that kind of environment here for faculty, so that we not only graduate great nurses, and we do. A lot of them are nurse leaders. But that this also becomes a place people want to work. So, I think that making sure that we’re kind, and that we’re caring, and that we really do walk or talk, and that we do mentor our new faculty well, and that we’re kind to one another and respectful to one another. I think that is paramount and so, it’s kind of what we’re all about right now and I hope we keep on that trajectory, cause I think that keeps your faculty here.

Summary of Barriers to Hiring and Retention of Nursing Education Faculty

The six deans and directors provided feedback about improving the nurse faculty shortage and the barriers that were found to negatively impact at their higher education institutions. Director Andrews, Director Baker, Dean Cornish, Director Drake, and Dean Everett all agreed that there was a lack of doctorate- prepared faculty members. Lack of teaching experience and low salary were also evident in the deans’ and directors’ interviews. New hires of nurse faculty seeking the terminal degree while employed as nurse educators, interestingly affected retention.

The barriers to nurse faculty hiring and retention were: low faculty salaries compared to clinical salaries, lack of administrative support for monies required to hire and attract

nurse faculty, competition for nurse faculty from other colleges and universities, new hires needing to complete doctorate degree are at risk for tenure denial, need for a faculty mentoring program, and new nurse faculty hires' lack of teaching experiences. The retention challenges found were a mix of low salary, issues in seeking the terminal degree, lacking a new nurse faculty hires mentoring program, and PhD nurse faculty retirements.

Facilitators for Improving the Nurse Faculty Shortage

Interviews with the deans and directors revealed two facilitators for improving the nurse faculty shortage: supportive administrators and nurse faculty research. Additionally, every dean or director interviewed described themselves as a facilitator in some manner for improving the nurse faculty shortage situation at their institution of higher education. However, the support from the college or university administration was considered essential.

Director Andrews discussed her experience with two different St. Mary's University administrators, a previous administrator who had not been supportive and then a positive experience with a supportive administrator. Director Andrews started the first nursing program at St. Mary's University in her journey of six years there. She emphasized that in her first director role, she discovered "nobody had any concept what nursing was [what Registered Nurses actually do, what Registered Nurses are required to know, and the responsibilities required of Registered Nurses]." Many issues required monetary support for the nursing program. Director Andrews needed to explain the number of faculty needed for hiring in the clinical sites and the vast knowledge and data needed to write the initial State Board of Nursing report. "So [I am] trying to help administration understand all those layers, the cost that goes with them, and costs to pay for these site visits."

That clinical instruction was limited to eight to ten students per hospital clinical site meant that Director Andrews needed to explain this State Board of Nursing policy to administration. Director Andrews said she initially reported to the Vice President of Academics, who perceived the cost for the nursing program to be “exorbitant.” Director Andrews stated several times, “it [initiating the BSN program] has been a continual eye-opening experience for many of them [administration].” She frowned during this part of the conversation. Director Andrews explained that she was unable to convince the previous administrator that the monies required for developing the nursing program were necessary and essential to the success of the launch of a pre-licensure BSN nursing program. However, she began to smile and there was a lift in her voice when she talked about her current administrator boss, “And I now, because of administration restructure, have a dean directly over nursing, who is, by years of experience, a philosophy professor.”

He (philosophy professor) truly has been more insightful and more supportive than the Vice President, because he looks at things from ethical perspective, and from a logic perspective, and he has been a gift. He has been a gift. He really, truly supports us; he also, interestingly had, unfortunately, a major abdominal surgery and had not good nursing care during that hospitalization of three weeks, and I think that has definitely colored his perspective of what a good nurse and what a well-educated nurse means. And so that, too, has made him very responsive to our needs as a nursing division.

The role of higher education administration. Director Andrews’ narrative revealed the role of higher education administration as a facilitator for improving the nurse faculty shortage. Director Andrews considered the new administrator’s support essential and

highlighted the change was more supportive compared to her previous administrator. The new administrator's support was "a gift." Director Andrews reported that the philosophy professor was "more insightful." Director Andrews when describing the facilitator for improving the nurse faculty shortage at St. Mary's University Nursing Department, acknowledged the philosophy professor, who served as Dean of several departments, for providing her support. Director Andrews required this administration support to develop and launch the pre-licensure Bachelor of Science in Nursing (BSN) program at St. Mary's University.

Dean Cornish used a practical but academic way of looking at finding monetary support and facilitating growth at Blue Lakes University. Finding funding is a type of innovative activity that facilitates faculty hires and especially those interested in research. Dean Cornish explained the development of promotion of inter-professional education grants in government and other programs. This dean understood that financial support from government and other grants promoting interdisciplinary education plays a role in the focus of inter-professional education. Facilitating the nursing program with added funding, as Dean Cornish described, gains monetary support for the nursing department and thus, funding for faculty. Upon her arrival at Blue Lakes University, Cornish became the Dean of a new college, the College of Health and Human Services; thus, heading the five departments of Health Sciences, Kinesiology, Nursing, Occupational Therapy, and Social Work.

This is a fun role for me, this is an inter-professional college, so nursing is the largest department, but we have five departments. This college was a nursing college with some OT [Occupational Therapy] and then, prior to my arrival, by two years the Nursing Department and college was told that they were going to become a different

college and that the departments of Social Work, Health Science, and Kinesiology would be joining with them to make a College of Health and Human Services. I understand it was not well received, and nursing felt that they lost their college, and I can understand having come from a College of Health and Public Affairs, where I engaged in a four-year journey to separate ourselves from that college and become our own college...I sort of see myself as a cheerleader. I've had a fabulous run as a teacher, I love it, I'm passionate about it, there's never anything I'll ask somebody to do that I won't do first, and that I haven't already probably engaged and done.

Dean Cornish also gave support to faculty and described her role with the statement, "I sort of see myself as a cheerleader." By scanning the healthcare and federal government environment for available funds and becoming involved in IOM (Institute of Medicine) Report and with HRSA (U.S. Department of Health and Human Services Administration) inter-professional education, Dean Cornish had found additional funding. Dean Cornish appeared to have the primary skills that apply to deans: "a) analytic competence b) interpersonal competence and c) emotional intelligence." (Broome, 2013).

Summary of Facilitators for Improving the Nurse Faculty Shortage

The monetary support/budget was discussed by the deans and directors, who understood the need for monetary support to acquire faculty in the pre-licensure nursing program. Directors Andrews and Baker listed the time and monetary support required to prepare compulsory accreditation reports. Most important, Directors Andrews and Baker pointed out the need for more faculty nurse educators in the clinical site because of the limits of eight to ten students for seven clinical courses and the importance of higher education administration understanding this limit in determining the budget for a nursing program.

Both Director Andrews and Director Baker were new to the higher education role and new to their university and college, each launching the first nursing program at their higher education institution.

The more experienced directors and deans, Dean Cornish, Director Drake, Dean Everett, and Dean Forbes used terms of expansive thinking, such as sharing the vision, collaboration, promoting inter-professional education, and tangible leadership to describe their roles as Deans and Directors grappling with the nurse faculty shortage at their higher education institution.

Exit interviews. Each dean or director gave her description of exit interviews and open positions at her university or college. Information gathered in the interviews indicated the number of open positions, faculty needed, and retention, or reasons that faculty members do not remain employed at the university or college. All five faculty originally hired at St. Mary's University had left employment at the university; for Director Andrews, that was 100% of original faculty she had hired.

The retired PhD faculty did not have an exit interview. "The one whose mom was ill, never even returned the computer, she was a piece of work, she didn't exit or she didn't do anything." One nurse faculty who left for higher pay at another school of nursing did participate in an exit interview with Human Resources. According to Director Andrews, "I think they're still talking about that, how much she makes." A nurse practitioner who abruptly left St. Mary's University mid-semester had an exit interview with Human Resources. One faculty, whose contract was not renewed and who had constant interaction with Human Resources, the director, and the dean, did not participate in an exit interview.

Director Andrews explained that the nurse educator, whose contract was not renewed, did not understand all that is required of a nurse educator in higher education.

As she leaned forward with a serious look on her face, Director Baker defined how the exit interview was arranged at Bridgeport College.

So HR [Human Resources] does exit interviews. So, I've only lost a handful of people, so I do keep in contact with them in one way or the other. I've been able to, I feel like I've been able to tie up loose ends and get some closure and understanding, and lessons on all of the people that have left, but that's just my style. I don't want any student to leave, I know every mistake I make, I need to learn from it, and so I've sought that out, even though HR does a formal exit interview. But the unfortunate thing is that they've never shared any of them with me, even though I ask. So as soon as it concludes, I immediately email the director and I say, "Thank you so much for conducting an exit interview on my nursing faculty member, I need that information to improve my practice." And I've not been given access to it. So it's not serving the right purposes.

Exit interviews by at Blue Lakes University department of nursing with Dean Cornish were a requirement. The Human Resources Department also conducted exit interviews there. Dean Cornish was experienced in the educational leader role and engaged in the process of reviewing the reasons faculty leave employment at Blue Lakes University. Five faculty members were leaving employment at the time, but she did not state specific reasons.

I demand it [exit interview], I have just this one person that's leaving from nursing but I have right now, June 30th is the time when they're going to leave. I have five people leaving for various reasons; a couple of them were temporaries. Everyone that

didn't get tenure is leaving [Blue Lakes University], everybody. It's a requirement of mine that they have an exit interview with me. Well they have it [exit interview] at Human Resources, but that's just related to that piece. I require that they have it with me.

Director Drake did not conduct an exit interview with faculty resigning, but the Human Resources Department at Green Hills University gave exit interview to resigning faculty. Director Drake had been at Green Hills University for 29 years and she did not feel nurse faculty resigned for negative reasons. She wanted to retain faculty but realistically noted that some faculty will resign for various reasons. She described the process for exit interviews upon leaving employment at Green Hills University.

No. They have to go to HR [Human Resources] and do an exit interview. I've never actually done a formal exit interview on anybody that's left, so I, that's an interesting question, I hadn't fully thought about that. I mean usually, I guess, the thing is if you've got a nice relationship with folks that always feels like we have a nice talk when they come and tell me that they're going to go and I don't get all excited or twitted about that anymore, because people have to do what they need to do. And I don't get, I don't know if people come and they think I'm going to be devastated and throw myself on the floor and cry because they're leaving, I'm sad to see people go and all of that, but you know, this person just resigned, you know, she just got tenure two years ago, blah, blah, blah, but then I think about all the contributions she made while she was here, and it was great, and she's going to go, she's going to be happier, so, again, I don't, and maybe I'm just Pollyanna here, I don't know, but I don't believe I've lost tenure-track people, except for this one who couldn't make tenure...

Human Resources did offer an exit interview when leaving employment at University of Forest Lakes. Dean Everett explained that she asked faculty, but they are not required to do the exit interview. She described this process.

They, I ask, they don't have to. Most of them, they come to me and tell me that they're leaving. So, is it an exit interview? She didn't, she really probably would run me over with her car if she saw me, so. No. But I understand their rationale for leaving, except for the one that I fired.

Dean Everett made an interesting comment when asked about open adjunct positions stating, "Yeah, adjunct, but adjunct is not really a search."

Dean Forbes gave a limited explanation of exit interviews for nurse faculty members upon their leaving employment at Hillside University. The limited responses could be due to only a two-year employment for Dean Forbes, but this is only conjecture on the part of this researcher.

I'm trying to think, see truthfully, I haven't lost faculty since I've been here. I had the one who retired, to be honest with you, she and I are really good friends. So, I did talk to her, but an exit interview is something I always ask for.

The existence of exit interviews of nurse educators leaving employment varied among the deans and directors in private not-for-profit universities or public universities; some exit interviews were formal, some deans and directors required exit interviews, and some sat down for a talk with the nurse educator leaving employment. The variability of exit interviews was sometimes due to the personal choice of the director or dean, sometimes due to human resource policies, and sometimes due to a union environment.

Open positions. Five days before the scheduled interview with Director Andrews, the website of St. Mary's University Human Resources showed an open position for assistant professor of nursing. When asked about the open assistant professor position, Director Andrews replied, "That's the one we leave open, we just leave it there ... because, like I said, we've almost constantly had an open-position." Director Andrews offered "we've had an open position every semester." Each semester usually one or two positions are open and again Director Andrews retorted, "It's just constant. It's just constant."

...In December I had a faculty member, a second one who left due to pay, she had been working as a nurse practitioner and continued to increase her working hours and it was hampering her ability to be effective here, and so she realized it when I sat down to talk to her about some of the concerns I had, she resigned on the spot and went full-time to her nurse practitioner role, so that left an open-position all last semester. So we all had to pick up overload and I picked up and taught a course. Another issue was presented which called for yet an additional position for faculty hire. Director Andrews had presented a work plan for an additional cohort of nursing students each year, which would mean another faculty position required. Thus, an additional nurse faculty open position was created for the new work plan. Director Andrews would like to offer a higher salary but is constrained by the limits of salary range at St. Mary's University. "The curse that I have had; two of the brightest, best faculty left because they made \$30,000 to \$50,000 more if they went somewhere else, and they chose to do that. Broke my heart"! The above statement by Director Andrews revealed some of the emotion attached to her role as educational leader of St. Mary's University department of nursing. Director Andrews

appeared to value the two faculty who left employment, describing them as “two of the brightest”.

The Bridgeport College Human Resources website at the time of the interview showed two open positions for nursing faculty: A pediatric nurse faculty position and obstetrics nurse faculty position. Director Baker elaborated on the number of open positions and the retention challenges.

Well we actually had three at one point. What happened was, so we’ve always been, we gradually grew over time to be awarded six full-time positions. That took a lot of negotiation. That was something that was, I spent more time than anything trying to maintain those six positions and what happened was, last January, we lost our mental health professor, she left mid-semester and it was not good at all. So, the rest of us picked up additional credits to keep the train moving, and so, it was very stressful. So, our five faculty members took the workload of six, and because of that, you could see cracks in problems and concerns amongst the students and the faculty. No one was getting along with anyone. It was really challenging.

The account by Director Baker of the impact of having open positions demonstrated the real-life scenarios. She spoke about the “five faculty members” trying to do the “workload of six”. The experience of the faculty and herself during these open positions was described by Director Baker as “very stressful;” her eyes widened and I sensed the stress she had experienced.

The Blue Lakes University Human Resources website listed three open nurse faculty positions. Dean Cornish explained that one position had been particularly difficult to fill

because it required a doctorate. This doctorate position is the endowed Chair Faculty position.

And it's just, my endowed Chair, which is a fabulous position, has been up since October (over nine months at the point of this interview) and I've had no applicants. Friday, I got my first applicant! And that is just an endowed Chair, would be a dream job for many of us, it's just a fabulous role to be able to mentor faculty to be engaged in research, teach only two courses a term, just a dream job and I've had, as I had my first applicant came in on Friday. And that's just an indication of the depth of the faculty shortage, it's just people are not out there. They continue to, that one required a DNP [Doctor of Nursing Practice], that was asking the person to help develop the DNP program and to be a Nurse Practitioner, and they're just not going to come; (pause) they're not going to come.

Dean Cornish reported that the other two faculty positions had 18 applicants because the position only required the master's degree; the human resource department website stated, "Master's prepared, doctorate preferred."

This researcher reviewed the Green Hills University Human Resources website one day before the interview and found three open positions for nursing faculty: a tenure-track assistant professor of nursing position, a part-time clinical position, and a part-time online nursing faculty position. Upon sharing this information with Director Drake she offered the following response:

...well, there's five open positions, we'll be searching for six, because one of those positions is a full time temp who's occupying the position. But it will be, here and the position will be converted.

Thus, Green Hills University was conducting a search for six new nurse faculty members.

The University of Forest Lakes had no open positions posted on the Human Resources website two days before the interview with Dean Everett. The Dean replied, with “no obligations to report they are going to leave,” which introduced the discussion of the impact of the faculty union contract and the fact that there were no positions open currently. “We were done. So we had four openings this year and we’re done. It, this year, was the most with the four, because one I got an extra line. It’s for our psych, BSN completion program.” The union contract at University of Forest Lakes did not require faculty to notify their employer by a certain time limit if resigning. Thus, as the discussion stated the current status of no open positions could change quickly.

Dean Forbes initially reported no openings. When this researcher visited the Hillside University Human Resources website, there were two, tenure track, assistant professor of nursing positions posted. One had been posted in April, two months prior to the interview, and the other position had been posted in March, three months prior to the interview. Later during the interview, Dean Forbes spoke of faculty expertise that’s tough to find—mental health, a psych background; faculty with that expertise are harder to find than others. Dean Forbes revealed that she considered finding mental health nurse faculty a challenge. When asked to describe particular challenges in finding nurse faculty she again replied, “Like I said, looking for mental health faculty.”

Open positions for nurse educators were present, in five of the six higher education institutions and for all in the Human Resources websites. The information gathered in the interviews highlighted the need for doctoral-prepared nurse educators and the sometimes

stressful situations created for nurse faculty because of increased workload when there were open positions.

Promoting the role. Director Andrews had developed a script for hiring and retaining faculty in the nursing program at St. Mary's University. She promoted the nurse faculty role to potential new faculty. Director Andrews used a strategy of bargaining with the faculty to attain hires. She emphasized the positive aspects associated with teaching nursing in higher education compared to working in a hospital setting. Director Andrews was realistic about the reduction in pay nurse faculty are required to accept if they leave the hospital workplace. She described her script for promoting the nurse faculty role.

Every single person, I have to help them see, okay, yes, you're taking a huge pay cut. However, you'll have none of the on-call or having to go in on holidays. You'll have time with family over holidays. You'll have time in the summer. So, you have to help them see there is value in decreased pay and that, I think, my most important role is to really advocate for them, to help them see how valued they are. Don't measure your value on pay, which God knows, they aren't paid anything close to what they are worth.

Director Andrews illustrated the lack of PhD (Doctor of Philosophy)-prepared nurse faculty and the secondary problems created for her in attracting and hiring nurse faculty with doctoral degrees and the problem of low salary for nurse educators. Director Andrews found the even lower salary that St. Mary's offered nurse faculty was an obstacle in drawing nurse educators to the School of Nursing.

A way to attract faculty was featured by Andrews in promoting the nurse faculty role. She had a tool for hiring and retention that utilized a tuition exchange program. She

explained that another private university in a different state offered tuition exchange for St. Mary's University faculty's children.

The way I've been able to have retention is due to many of the faculty having college-age students and they get tuition reimbursement for their students to go to another private... That's been a gift. That's been a huge retention tool.

It was clear that retention had been on the mind of Director Andrews. She creatively addressed ways to communicate that facilitators used as tools for attracting nurse faculty retention—the university calendar, as opposed to the hospital workplace calendar job requiring working nights, weekends, and holidays; and the use of a tuition exchange program that works for some faculty with college age children. Director Andrews thinks once the tuition is no longer needed, these faculty will most likely leave employment.

Director Baker thought of ways to promote the faculty role at Bridgeport College. There was a means of bargaining with the faculty that she used to promote the nurse faculty role. "I love my faculty, we're very family friendly, and talk to them constantly. I try to find ways to give them perks that don't cost anything." This means of bargaining to promote the nurse faculty role to new hires offers no tangible or defined *perk*; however, Director Baker discussed "one solution" to hiring new faculty—it was focused on the low salaries of nurse faculty. In her narrative, Director Baker rationalized allowing the nurse faculty hires the freedom to work at other jobs besides Bridgeport College. As an additional solution to acquiring new faculty, Director Baker offered flexibility in their schedules.

One of the solutions I try to help with the pay thing is I always encourage and approve, I should say, outside work. And I also work really hard to have them help me schedule their own schedules so that they can. If they can tell me that they got a

job that allows them to work two 12s, I'm going to accommodate that. That's how I've tried to mitigate that.

These "perks" seem to be aimed at working around the nurse faculty position and even encouraging employment elsewhere rather than focusing on the nurse faculty position. [this researcher's interpretation].

Dean Cornish at Blue Lakes University used an approach to promote the nurse faculty role that involved bargaining with the provost for higher nurse faculty salaries. This experienced educational leader gathered salary data and presented her promotion of higher nurse faculty salaries to the provost.

Faculty search tools. Director Andrews described what local, national, or international search tools were used for seeking employees for nurse faculty positions.

We're so, where we're located, being fairly rural, but within an hour of several major cities, we've utilized mostly the local newspaper. We have utilized a couple of newspapers in those larger cities, which truly has not resulted in an applicant [nurse faculty member for hiring]. The other venue we chose to utilize was *Syllabus*, through AACN [American Association of Colleges of Nursing], it's a, I want to say monthly newsletter, that all the dean/directors have access to receiving by being AACN members. And we can publish or ask for, say we have open-faculty positions there, so those have been the venues we've used.

Director Andrews discussed response to advertising for faculty hires in the American Association of Nursing (AACN) *Syllabus*.

We've received two. The one faculty, who was PhD [Doctor of Philosophy]-prepared, who came a semester and left due to her mother's illness, came from *Syllabus*. And

we've received another very interesting applicant from the Canadian (Nursing *Syllabus*), somewhere in Canada, who I really believe was looking more for a way to get into the United States. I hate to be judgmental, but the applicant from Canada truly did not fit criteria for our position.

Thus, although the American Association for Colleges of Nursing (AACN) newsletter *Syllabus* generated two applicants, only one applicant resulted for employment at St. Mary's University, and this nurse faculty hire was only employed for one semester.

Director Baker was responsible for any local, national, or international search tools Bridgeport College used for hiring new nurse faculty. Director Baker expounded on her sole involvement in the search process for new nurse faculty.

Well, we're not very good at that. Bridgeport College has been around 50+ years...HR is one person...So, if I were to say, "Hey HR, I want to hire someone, let's do a search," she doesn't know what that means. ...So, I to muster as much, you know, I tried my best to get information from everyone else and try to figure out how I could do this on a dime essentially. ...I generate 100% of the search.

Director Drake had been posting positions and used local, national, or international search tools for attracting nurse faculty. She described the response to "wide-postings, national postings" stating, "I haven't been all that impressed."

So, we tried to identify websites and posting places where we would get, hopefully, a diverse audience. [Describes the posting of nurse faculty open positions] Widely, widely, widely posted at great cost and still a very small number of candidates [apply]. And even once you get a pool, then I have candidates that drop out because they quickly get a position somewhere else if we don't interview them fast enough.

So, it's very, very frustrating, and I would say it's not been the most positive experience. It feels like finding people is almost either happenstance or people that hear about us from somebody else, and so, I haven't been all that impressed with wide-postings, national postings, it's been, I'm not sure that we're getting the response that you would expect.

Director Drake listed many search tools used in the most recent nurse faculty search; "higher.com, *The Chronicle* (of Higher Education), and local and statewide newspapers."

Director Drake replied regarding the usefulness of this wide use of search tools

What was really surprising to me...we posted ...more extensively than we ever have before...that's not been the most productive use of resources. Our new Dean, he pulled out the stops, he says, "We're going to post everywhere I can think of," I mean there are always the usual places, higher.com, *The Chronicle of Higher Education*, and local newspapers certainly, and statewide. But really, we're just not [getting applicants from postings], I'm not seeing, most of the folks that applied seemed to hear about us more through word-of-mouth than actually seeing our postings, and some were just inquiries. Oh, I'm going to send you my resume and I'd say, Oh yes, please go online and apply. So, it was interesting to me that that's not been the most productive use of resources, and I don't have an explanation for that.

Dean Everett previously said that to find "the right person" was so important in choosing faculty for hire, that she would even hire a term appointment and "just keep searching." She credited the nurse faculty at University of Forest Lakes with promoting the nurse faculty role. When asked how she used local, national, or international search tools, Dean Everett stated "Our faculty [members] is probably our best search tool."

We have [knocking on the table] again, we've been very fortunate. Our faculty are probably our best search tool and the networks and list serves that they belong to, and we, of course, use AACN, American Association of Colleges of Nursing. We have some other list serves that our Human Resources department has in terms of higher education kinds of positions in health care fields, and I can't remember the name of it, because I really don't manage it. We, but really, to be truthful, if we're looking, let's say we've got a hole or we've got an opening in the family nurse practitioner program, then everyone in the FNP [Family Nurse Practitioner] program, kind of... uses that network and advertises or we post what the position is and we get feedback, or we get responses that way. We are not the kind of organization that would attract people on a national search. It doesn't make sense to invest in *The Chronicle* [*The Chronicle of Higher Education*] for us. We are an organization that focuses on teaching excellence and scholarly productivity. But unlike research intensive organizations the need to compete and recruit nationally is not as intense here as perhaps a place like (names research intensive state universities), or something like that.

Dean Forbes described the search tools for hiring that Hillside University utilized for a nurse faculty search and stated, "Search tools such as, *The Chronicle of Higher Ed*, or... We do all of that. I mean, it depends on, it depends on what the position is where we advertise." However, Dean Forbes did discuss some of the faculty positions, mental health and an applicant with a psych [psychiatric specialty] background, that were difficult hires.

In promoting the nurse faculty role, some deans and directors used a bargaining script to attract nurse faculty. Bargaining with tuition reimbursement and the better work schedule

of a university calendar compared to the hospital work schedule. Dean Everett acknowledged the competition for nurse faculty and stated “we’re rare” for reducing the faculty workload, stating, “I only assign 75% of their possible workload.” Dean Forbes identified possible joint appointments with hospital practice and university teaching. She also added that competition for clinical space existed. Director Baker focused on the low salaries of nurse faculty with two solutions; allowing nurse faculty the freedom to work other jobs and flexible schedules.

Advertising for nurse faculty positions by deans and directors included a wide span of search tools—American Association of Colleges of Nursing List serve; Sigma Theta Tau International Nursing Honor Society Newsletter, “*Syllabus*,” statewide newspapers; state-online newspaper; local newspapers; *Chronicle of Higher Education*; HigherEd.com; specialty-related journals, *The Nurse Practitioner Journal*; Midwestern Nursing Society Conference; Nurse Practitioner Annual Conference; and the Doctors of Nursing Practice website. Nevertheless, the directors and deans found no search tools for recruiting nurse faculty particularly useful.

Competition for faculty. Competition for nurse faculty exists in this Midwestern state. Each of the six interviewees portrayed the conditions and experiences that ranged from not finding PhD prepared faculty to a Dean creating a research-focused endowed chair position.

Director Andrews at St. Mary’s University commented that there are several levels of competition for nurse faculty. Programs competing for nurse faculty are associate degree, two-year nursing programs, four-year baccalaureate nursing programs, and graduate degree nursing programs. Director Andrews explained that the four-year baccalaureate program at

St. Mary's has been in direct competition with community college, two-year associate degree nursing programs for nurse faculty.

So, I know from talking to my other dean friends that are dealing with faculty shortages, I think one very important thing to hear is the level of baccalaureate education is constantly at odds with ADN [Associate Degree in Nursing] positions. I have a couple of very strong colleagues in ADN programs, because they feed our BSN [Bachelor of Science in Nursing] program, RN to BSN, and they are both competing for the same faculty, I've had faculty I've hired that have applied in their schools and so, oh, and one of them even said to me, "You stole one of my faculty." Now, this faculty member had been there for her practicum, in the ADN program and they wanted her in the worst way, but she chose us. And I think that's a faculty shortage-level. I think there are levels of faculty shortage, you know? There's the two-year schools, there's the four-year, there's the graduate, and I would expect, I don't know, but I would expect you'll find there's differences at the different levels. I think some of the, some of my colleagues on the east coast, I'm good friends with, those nurses are so much more likely to have higher degrees, but yet they all compete for them there. Do you know what I mean? Our level of competition here is more my master's-prepared faculty with ADN programs. The PhD [Doctor of Philosophy] faculty or now, soon to be DNP [Doctor of Nursing Practice] faculty are going to have another whole level, I think those deans will have another level of faculty shortage that's different from my level. So, I would say that's something that you may see, or may not see fall out. That's again, my bias or belief.

Director Andrews explained further that those who have a Master's Degree in Nursing Education have a choice to go to a small school like St. Mary's University or a larger school. Furthermore, she reasoned, that if nurse faculty choose to educate nurses at a larger school, then a doctorate will be required. Director Andrews referred to the doctorate requirement for nurse faculty. "I can't really require that here. So I think that's a difference. Would I like to? Sure, but I can't require that, not for what we pay." Director Andrews continued after a pause to collect more thoughts. "When I fill out the re-license survey for this State, this County has no PhD (Registered Nurse) living here, I'm the only one, and I don't live here."

Director Baker at Bridgeport College relayed the information that there were many schools of nursing in the area, and that she considered this a problem for attracting and hiring nurse faculty. Bridgeport College did not do a national search and paid a low salary to nurse faculty. "I look around here and I see nursing schools all over the place." She knew the reality of the competition for nurse faculty.

Dean Cornish at Blue Lakes University discussed competing for nurse faculty in generalities listing a few state universities. She also noted that she herself was actively recruited by Blue Lakes University Provost.

I explained to the Provost, that do you want somebody to come from business, in the College of Business, or somebody with NIH funding to come to your Science, Engineering, and Technology? That's what we're talking about here. And that's how you're going to get somebody to come. And even then I might not be able to get her, but that's what I need. So, if you'll do that for me; and they were like, "well, what do you mean?" I said, "Maybe as much as I make." And that's what I'm talking about.

And if that's where you can come from, then I might be able to compete with W... or... State, or U, I mean, or University...., and that's the only way; and those people have the name behind them, they don't even have to pay as much as we do. So, that's a difference, and if you can be there for me, and so then, I can see the list, because it's public information, of what they pay the faculty in those other colleges and I didn't know that was public until recently, because I'm new here, so, I found it. It was in the library, so, I went and made a copy of it, and now I have what I need. So then, I'll say, "Okay now, this is what I think I need to get her," so that's the way I'm doing that. They're very, very supportive of me in the Provost's Office. He convinced me to come here [to Blue Lakes University] by stalking [Dean Cornish used the stalking term figuratively and it is not the criminal term] me.

Dean Cornish applied a comparison of nursing faculty to faculty in the Colleges of Business, Science, Engineering, and Technology, as a means to illustrate to Blue Lakes University Provost the need for increasing nurse faculty salaries. The fact that she discovered the salaries of faculty at public universities in the library supported Dean Cornish's statement. The lower nurse faculty salaries were an obstacle to hiring nurse faculty.

Dean Cornish did make a distinction in the difficulty finding PhD-prepared faculty and the newness of the DNP degree in nursing. Dean Cornish named several nursing organizations, nursing journals, and advanced practice nursing websites used for recruiting PhD-prepared faculty. Dean Cornish also listed the Chronicle (of Higher Education) as a job listing site for Blue Lakes University.

We have a DNP [Doctor of Nursing Practice] program, so, because it requires a PhD [Doctor of Philosophy] and a Nurse Practitioner Certification, to fill that position, that

position's harder to fill. So, that position has been open for the two years that I've been here. We can find a Nurse Practitioner, but it's difficult to find a doctoral-prepared Nurse Practitioner. So, I'll answer the recruiting part to go with that. Then I'll do the next. So, that position has been advertised, and we always advertise all positions in The Chronicle, when they first come out. Then we advertise in the specialty-related journals. So, that position has been advertised a number of times in the Nurse Practitioner Journal. I have gone to the Nurse Practitioner Annual Conference twice and had a booth at the conference, I've advertised it at the Midwestern Nursing Research Society with a booth, and by word of mouth. It's been advertised in local newspapers, and I guess that's it. Oh, it's been advertised on the website for Nurse Practitioners, and it's been advertised on the Doctors of Nursing Practice website.

Dean Cornish further explained the newness of the DNP (Doctor of Nursing Practice) degree.

The DNP is such a new degree that it would have to have been someone who came back and did a post-master's DNP. So the PhD is more likely for someone, probably. They need to have some experience teaching, they need to have an earned doctorate, and they need to be a Nurse Practitioner. So, a DNP might work but not a newly acquired DNP that would also be brand new FNP [Family Nurse Practitioner]. So, it's a tricky combination.

Dean Cornish made the distinction again that the undergraduate faculty positions "were fairly, they were more easily filled than the DNP." She also described some word of mouth and practical means for recruiting nurse faculty. Again, to recruit for the baccalaureate

pre-licensure nursing program nurse faculty positions, Dean Cornish said Blue Lakes University posts advertisements in “specialty journals.”

Director Drake found a way to promote the faculty role to new hires but had no successful outcome scenarios utilizing this tactic from Green Hills University. She had received advice from the American Association of Colleges of Nursing (AACN) Dean/director mentoring program faculty mentor. Director Drake participated in this Dean/director mentoring program (with her mentor from another university) as a new director.

When I first became a nursing director and I first went to AACN [American Association of Colleges of Nursing], and they have a mentor program that they do there for new nursing deans/directors; and my director, my mentor, was from South Dakota, and I never remember if it’s University of South Dakota or South Dakota State University, but she was my mentor, and I’ll tell you, I mean, I think I have trouble attracting faculty here, think about doing it in South Dakota. Oh my gosh! And she told me, she said, “I, it was just,” I told her, I said, “I just don’t know what we’re going to do.” I mean, I was just like twitting about it because I was a young administrator, and she goes, “Well, you know what? We had to figure out a way to grow our own. I figured the only way I was going to do it was to figure out how I could have an environment that would help, help people get their doctorates.” So I’ve really taken most of my strategies from her playbook, because even though there, at her institution, they allowed her to under-load her faculty, so, they had release time to get a doctorate, wouldn’t that be wonderful?

Green Hills University had no formal faculty mentoring program. She referred to under-loading the faculty teaching credit load. Director Drake viewed using a tactic of “under-loading” the nurse faculty as a means of assisting them in successful completion of a doctorate for those new hires completing a doctorate degree. Green Hills University also had not been approved yet for starting a DNP (Doctor of Nursing Practice) degree program.

Dean Everett at University of Forest Lakes acknowledged the competition among schools of nursing for nurse faculty and using the phrase “we’re rare,” she stated that sometime ago another Dean at University of Forest Lakes reduced the faculty workload. Dean Everett exclaimed, “If it really matters then you got to do something”!

I only assign 75% of their possible workload. So, a 100% workload at this organization is 12 teaching load credits a term, we only assign nine. If you do more than nine you get overload. So roughly 75% of your workload is accounted for teaching scholarship and service. The other 25% or 10 hours a week, or however you want to configure that in the context of a 40-hour week, which we don’t do, but you do your practice. If you’re on tenure track you do your scholarship, your research. But it’s really the mechanism that clinical track can maintain their clinical practice. And we have the nurse manage center here as well, which gives folks another avenue for engaging in practice. We’re rare. We’re an anomaly, and when we implemented clinical track, like I said, 12, 15 years ago that was, no, no, I can’t say it happened then. I think we implemented the clinical track, because I was still here when we did that, and then I left, was that my next appointment, and then I left and then when I came back, the workload was nine. I think they learned that you can’t make that, if you really value it, if it really matters then you got to do something!

Dean Forbes at Hillside University did think that pay was a factor related to the nurse faculty shortage and considered the increase in nurse faculty salaries worthy of the nursing deans' advocacy. However, Dean Forbes did have the impression that most nursing educational leaders were doing much of the same thing to improve the nurse faculty shortage situation. Dean Forbes identified possible joint appointments with practice and teaching as a possible way to compete for nurse faculty.

You know I haven't seen anything that I would say, "Wow, that's really different." I think we're all kind of doing the same thing. ...some of the joint appointments, I think that's been appealing, where they've been able to do practice, as well as, teach. And some of it is just a readiness. So, but I can't think of anything that anybody has done that's so outstanding. I would say that all of us, who are nursing Dean's, we're working to improve salaries, we're working to make sure that, that the working environment and conditions are what it needs to be, and that they're compensated fairly and equitably.

Additionally, Dean Forbes acknowledged that finding nurse faculty and clinical space needs were always obstacles encountered in nursing education. This is another aspect of the competition experienced by nursing schools. Dean Forbes reiterated the need for nurse faculty but added the competition for clinical space in clinical settings.

Well, we all run into the same thing, it's faculty and clinical experience and where can we place them so that our students get the clinical expertise or the area. They're working as a student in areas that are going to give them the foundation they need to go out and practice. So there's always competition for clinical spaces. So, those are the roadblocks.

Perceptions of Nurse Faculty Shortage

Deans and directors shared their perceptions about and causes of the nurse faculty shortage. This study investigated successful and unsuccessful methods and strategies and the barriers and facilitators to address the nurse faculty shortage. The deans and directors were interviewed at their university or college to elicit their perceptions and views of the nurse faculty shortage (Appendix A)

An important aspect uncovered from Director Andrews' interview was her perception of the nurse faculty shortage. She described the annual Washington, D.C. meeting for the American Association of Colleges of Nursing (AACN) and the aging of the deans and directors heading the schools of nursing in the U.S. Director Andrews pointed out that her position as leader of the School of Nursing has a nurse faculty shortage. She spoke of the time at the end of this annual meeting when any new dean or director or retiring dean or director was called up to the microphone. She recognized the growing shortage of educational leaders (deans and directors) for nursing schools. However, Director Andrews perceived the nurse faculty shortage as a greater concern than a nurse dean or director shortage. Director Andrews tied the low salaries of nurse faculty to the reason for the lack of nurse faculty.

Director Andrews considered money to be the chief reason for the nurse faculty shortage. She quickly spoke with passion on this subject. Director Andrews said the low salary of a nurse faculty educator is in the research literature. There she looked at me and nodded several times while speaking.

I think a lot of it [the reason for the nurse faculty shortage] is money. I mean, when you look at earning your MSN (Masters of Science in Nursing) and you can be in

practice making six figures, and when you come to academe and, in some cases, earn half or a third; I mean, if you're a nurse anesthetist or, you know, it's just, it's atrocious. And we value ourselves, and we have to survive. So, you have to make money. I think many people that come to teach love it; it's just how do you survive fiscally, financially?

Director Andrews added a second reason for the nurse faculty shortage. She said that lack of administrative support from the dean or director was another reason for the nurse faculty shortage. "I think another, and this is getting personal, but I've seen it besides myself, I think it is lack of support from your administration."

Director Baker recounted several scenarios of faculty leaving employment and her issues with hiring and retention of nurse faculty. She did not list the causes of the nurse faculty shortage, acknowledging that she had not really thought about the causes of the nurse faculty shortage. Director Baker, however, listed the barriers to hiring and retention of nurse faculty at Bridgeport College, and the lack of PhD (Doctor of Philosophy)-prepared nurse educators was first on this list. Director Baker's perception of the nurse faculty shortage was illustrated by the barriers to hiring and retention list she provided. Director Baker's mention of the lack of doctorate-prepared nurse faculty was emphasized by her statement during the interview, "I've never even had one PhD person ever apply here."

Dean Cornish thought money was the paramount reason for the nurse faculty shortage. She spoke energetically, describing the main reason she viewed for the nurse faculty shortage. Dean Cornish had also tied the low salaries of doctorate-prepared nurse faculty to the lack of nurse faculty. First, she spoke about the important research that Linda Aiken (2003) had published with Clarke, Cheung, Sloane, and Silber, focusing on the

connection of lower surgical patient mortality when a BSN prepared nurse cared for them compared to the higher surgical patient mortality when an Associate Degree in Nursing (ADN) nurse cared for them. Dean Cornish added that this research led to the American Nurses Credentialing Center (ANCC) creating the *Magnet Status* for hospitals. Hospitals with *Magnet Status* have positive financial impacts of a stronger bond rating and competitive advantage. Next, Dean Cornish described the prime reason for the lack of doctorate-prepared nurse faculty with the statement, “I can’t pay them what they can make in a hospital.”

It’s about money, it’s about money, and it’s like she’s using the evidence but not really, this is about money, it’s about *Magnet Status*, it’s about money, and she’s (Linda Aiken) not going to pay to send them back (to school to complete BSN from ADN). I can’t pay them what they can make in a hospital. I mean, I wish, I think to myself sometimes, as much as I love teaching, why did I choose that path? If I had stayed at the VA (Veterans Health Administration) or in my administration, I was Head Nurse of an ICU (Intensive Care Unit) at the VA, I’d be retired on a beach someplace with a really neat condo, I’d be so wealthy. I mean if I think about it now.

Dean Cornish used the analogy of “cicadas” to illustrate her prediction of the nurse faculty shortage situation. “We’ve been talking for years about the nurse faculty shortage...and it’s here. They’ll all walk out like cicadas.” Dean Cornish also stated “the faculty shortage is just going to get worse.”

Dean Cornish also described attending the American Association of Colleges of Nursing (AACN) meeting held in Washington, D.C. and the discussion of the nurse faculty shortage topic by deans and directors during the year that the interview for this study was conducted.

Everyone, we all understand it [nurse faculty shortage],... people were talking about the fact that they're going back to hiring Master's-prepared nurse faculty and allowing them to work on their doctorates once they're hired. I haven't gone there yet, but ...that's not true, I just hired a Nurse Practitioner, who is in our DNP [Doctor of Nursing Practice] program.

In her narrative, Dean Cornish first related what she was seeing as a trend from the American Association of Colleges of Nursing (AACN) meeting she attended. Dean Cornish reported this is happening in other universities but she quickly recanted that she indeed has also begun this nurse-faculty-hiring trend. Here, Director Cornish has provided new trends in hiring nurse faculty.

Director Drake named the top causes of the nurse faculty shortage, and again, stated the lack of doctorate-prepared faculty and the generation of baby boomers, aging nurse faculty as the top reasons for the nurse faculty shortage. Director Drake stated her perception of the nurse faculty shortage was rooted in the lack of doctorate-prepared nurse faculty.

To me, I think there are plenty of people that want to be nurse faculty. So on the surface, I would say, why is there a shortage? But the problem is that we need doctoral-prepared faculty; that's the problem from my perception. And getting faculty, or people, prospective faculty to go on and get a doctorate, it's a challenge, because it's a huge commitment, huge financial commitment, time commitment, energy commitment, all of that.

Director Drake also addressed the fact that there is competition from other colleges and universities for nurse faculty. Director Drake listed the two main issues responsible for

the nurse faculty shortage in her experience by commenting on the realities of a lack of nurse faculty with doctorates and the looming problem of nurse faculty with doctorates “dying off”.

If you really want to be a faculty, you need to get a doctorate. Oh! So I think sometimes that’s daunting, and so I think it’s the getting the doctorate and the fact that those of us with doctorates are dying off. But those are really the two main issues that, for me, have slapped us in the face over and over and over again.

The Blue Lakes University Dean’s interview uncovered what Dean Everett considered to be the cause of the nurse faculty shortage. She mentioned first that nursing curricula were outdated and second that we need more inter-professional and interdisciplinary faculty to mirror what is happening in the health care industry.

... If schools of nursing continue to implement and be beholding to [State] Boards of Nursing with curricula that are as outdated as I am, then we don’t have a shortage. But if we are really crafting academic interventions that are driven by what is really happening in the industry, then we’re in trouble because we have insufficient inter-professional, interdisciplinary faculty, we have insufficient people who are able to practice in a variety of settings; we have people who are stuck in the big five, that’s med-surg [medical-surgical], psych [psychiatric], community health, OB [obstetrics], peds [pediatrics]. Not going to get us to the promise land.

Dean Forbes discussed three main reasons she considered to be the cause of the nurse faculty shortage: low salary (money), nurse faculty retiring, and the fact that most other disciplines have educators entering the faculty roles as educators sooner. She also noted a lack of diversity in nurse faculty.

... The [causes of] nurse faculty shortage is, (a) the money; public universities are not known because they pay really well. I tell them, I always say, “You don’t get into academia because you want to get rich.” Let me see, the other thing, I think is because faculty who are staying are staying longer, and they’re putting off their retirements. At 65, I would not say that’s a typical retirement age anymore. Also, (b) it’s, with the surge of advance practice. I just think, as a nurse, you have so many options to you now. There’re so many different things you can do with our career. So, I think that creates a shortage, too. And then the other thing that I find interesting is, (c) if you look at other disciplines, they’ll get into that area to do education much sooner than we do in nursing. In nursing, we have this mindset that we graduate with our baccalaureate degree or get our RN, and then we have to practice, and so then, we practice for 10 years, 12 years, whatever it is, then we start thinking about what else do we want to do with our career. And we don’t have a lot of diversity, which is unfortunately, and when people graduate, and if they have done the traditional route, they’re 20, 21, so somewhere along the line, they’re getting married and they’re building families, and that takes them longer to get back. If you look at somebody who is, let’s say, academic in sociology, more often than not, you see them going straight through, getting their PhD and jumping into academia. Because we are a profession that does rely on skills, I don’t think it’s a bad thing that we take time out and gain those skills and expertise it lends, but what happens, I think, is you get drawn in other ways and find it harder to come back.

Dean Forbes gave further evidence of the reasons for the nurse faculty shortage. She discussed the two-thirds of current nurse faculty who are ready for retirement and the need

for nurse practitioners to be engaged in clinical practice. Dean Forbes also brought up salary again and the need for mentoring new faculty.

Well, one of the factors in the nurse faculty shortage was one of those instances where, oh, fully two-thirds were ready to retire. So, there was a lot of concern about replacing all of them, and then as you replace, and if they're brand new faculty and have never taught before, then you have impacts on committee work, particularly like curriculum and those kinds of things. So you have a lot of mentoring, intense mentoring that needs to go on. So, I think that that's an issue. The other issue is being able to hire clinically-related faculty and their salaries. And, you know, I happen to be, I'm certified in two clinical areas and worked clinical most of my career, and I, what I would tell you though, is some of these salaries, what we don't necessarily do very well is have faculty when they're clinical. Let's say they're a nurse practitioner and we hire them, what they're hired for is an eight- to nine-month contract. And so, if they did continue working outside, then they can supplement that. Now, the nurse practitioners are required by their organization, their certifying agency, to have a clinical practice. So we, when we hire our nurse practitioner faculty, we always guarantee they'll have one day free that they can practice, and then they keep that money, we don't. That's another issue that happens with that, is who gets the money and what does all that mean? And that's the way we've done that here, and from what I can tell, the nurse practitioners that work with us find that very flexible, and they like that.

Identifying the perceptions and causes of the nurse faculty shortage from deans and directors can assist in understanding the methods and strategies used to ameliorate the nurse faculty situation at universities and colleges.

Themes, tools, and innovations. Themes that emerged from the interviews regarding both hiring and retention of nurse faculty were lack of nursing faculty and lack of doctorate-prepared nurse faculty. The deans and directors interviewed expected the nurse faculty shortage to be a growing concern. Director Andrews related a personal experience while attending an American Association of Colleges of Nursing (AACN) meeting in Washington, D. C. that demonstrated the mounting concern of the nurse faculty shortage.

“...literally, those lines lengthen every single time, and the graying and aging of those people in that room, of the 500 programs across the country, is astounding. It’s so dire...the faculty shortage is even more of a concern.”

The deans and directors shared various methods and strategies that they found useful for hiring and retention of nurse faculty; some of these methods and strategies were successful on only a limited basis and others would attract faculty but not retain the nurse faculty. The nurse faculty shortage situation is a multifaceted problem; thus, the success of methods and strategies for grappling with this issue is not consistent. Successful strategies and methods using innovations identified were the use of joint appointments of faculty with clinical institutions, an endowed professorship, and use of a new curriculum using a high fidelity simulation lab four hours per week. Both of these strategies for grappling with the nurse faculty shortage approach the faculty shortage issue as a correction instead of a direct tactic. The faculty joint appointment creates a faculty position, whereby the nurse faculty also is employed by a local hospital. The use of a new curriculum using high fidelity

simulation teaching to replace four hours of clinical teaching reduces the number of hours that the students and the nurse faculty teaching clinical are required to be at the hospital clinical site.

Tools for attracting new faculty hires were tuition reimbursement for employee, spouse, and college age child; highlighting the advantage of the university calendar work schedule compared to hospital workplace schedule of overtime and holidays; joint hospital clinical-university teaching appointments; and reduced faculty teaching load to 10 credits for fall and winter semesters. Nurse faculty retention tools revealed were tuition reimbursement for employee, spouse, and college age child; senior-level faculty mentoring program for new hires in preparation for tenure; reduced faculty teaching load to 10 credits for fall and winter semesters.

An identified major nurse faculty retention obstacle was issues in seeking the terminal degree while employed as nurse faculty (school full time and work full time). The outcome was often loss of employment due to failure to attain tenure status.

One innovation identified, but not yet begun by Director Drake, was hiring a new kind of faculty, meaning hiring nurse faculty who did not hold terminal degrees. Then starting a “growing your own” faculty was an intended attempt to begin a DNP (Doctor of Nursing Practice) program at Green Hills University to create doctorate-prepared nurse faculty, “I mean it’s not that hard, compared to going on for a PhD, so that kind of allows us to sort of have flexibility here.” She saw this new vision of nurse faculty hires as more clinical nurses and not the PhD-prepared education model currently sought by universities and colleges. According to Director Drake, “if RN [Registered Nurse has NP [Nurse Practitioner credential], this is 20 to 30 credits.” However, the proposal for offering a DNP

degree at Green Hills University had not yet been approved by the university. Thus, at this point “growing your own” nurse faculty was a plan not yet implemented by Director Drake.

Two innovations were identified by Dean Cornish and also named by Dean Forbes: 1) Faculty joint appointments– nurse faculty hired with a joint hospital-clinical and university teaching appointment with a local hospital and university, and 2) Increased use of simulation labs for teaching students. An additional innovation was identified by Dean Forbes at Hillside University: new nurse faculty at Hillside University are offered reduced faculty teaching load to 10 credits for fall and winter semesters (Hillside University teaching load is 12 credits both semesters).

Some of the reported innovations and tactics for improving the nurse faculty shortage situation at institutions of higher education were successful and some were unsuccessful. Time limited the success of some tactics and innovations. For example, a tuition reimbursement might be successful until the reimbursement was no longer needed. Further, “growing your own” faculty by educating them while employed as new faculty often resulted in faculty loss of employment due to the individual’s inability to attain tenure status while seeking a terminal degree. The following statement from Director Baker at the end of the interview made this researcher wonder if there was an unintended benefit of my interviews regarding the nurse faculty shortage. Director Baker stated, “I really think you hit on most of the stuff. I mean, I feel like I got a lot out of it, it was good. Thank you.”

Conclusion

Findings from six educational leaders of schools of nursing in higher education institutions were presented in this chapter. The interviews focused on the nurse faculty

shortage issue in schools of nursing that offer pre-licensure Bachelor of Science in Nursing (BSN) programs.

Themes identified centered on the mounting problem of the nurse faculty shortage and the lack of nurse faculty with terminal degrees. Extending from these themes were the following perceptions of deans and directors: competition for nurse faculty between not only higher education institutions but also clinical employment with higher pay scales; two-thirds of current faculty are ready for retirement, nurse faculty entering faculty roles at a later age than other educators entering faculty roles; and the lower pay attributed to nurse faculty. An interesting obstacle to improving the nurse faculty shortage was the negative outcome resulting for new hires attempting to complete a terminal degree while seeking tenure status. Failure to attain tenure led to loss of employment at the college or university.

Deans and directors identified facilitators for improving the nurse faculty shortage: supportive administrators at the higher education institution and establishing nursing research grants to provide monetary support to the school of nursing. Innovations also offered mixed success. For example, tuition reimbursement for the children of nurse faculty may work only while the children attended college or university. Two recently introduced innovations were simulation lab clinical teaching and joint hospital-clinical and university faculty appointments. More time is required for assessing the outcome of the success of these innovations.

Interviews with deans and directors of six nursing education programs in higher education institutions provided rich, verbal, narrative data about how they were grappling with the nurse faculty shortage. The concept of problem analysis (Achilles, Reynolds, & Achilles, 1997), using the practice learning analysis via the critical incident report, was used

as a means for organizing the qualitative data gathered in this study. The critical incident report was first developed for flight safety by studying pilot errors and has found later use in the development of hospital safety practice (Flanagan, 1954; Cooper, et al., 1978). The critical incident reports broke the narrative information into systematic pieces of information with the success or failure of the strategies or methods implemented by deans and directors for ameliorating the nurse faculty shortage. Conclusions, implications, and recommendations resulting from this qualitative research study that investigated methods and strategies used by educational leaders (deans and directors) in nursing programs to address the nurse faculty shortage are discussed in Chapter 5.

Chapter 5-Findings, Conclusions, Implications, and Recommendations

The continuing shortage of nurse faculty is a growing concern in the United States (Benner, Sutphen, Leonard, & Day 2010; IOM, 2011; AACN, 2013; Huston, 2014; Yedidia, 2014). One indication of the looming shortage is that 40% of registered nurses in Michigan are older than 55, an increase from 34% in 2012 (Michigan Center for Nursing 2013 Survey, 2014, p. 25). Jane D. Evans (2013) emphasized the need for nurse educators stating, “Nursing education will have to increase the number of new nurses by 30% a year over the next decade to meet the growing demand for registered nurses” (p. 11). Further, in this Midwestern state the number of nursing faculty has declined by half since 2004 (Michigan Center for Nursing 2013 Survey, 2014).

The shortage of nurse faculty in colleges and universities threatens the nation’s ability to prepare nursing students, and impacts the number of registered nurses available to serve patients (AACN, 2014). Benner et al. (2010) described the problem, “As faculty retire, nursing schools are losing some of their most experienced teachers and face the challenge of finding and mentoring new faculty” (p. 5).

This study examined the nurse faculty shortage in one Midwestern state to better understand how deans and directors of nursing education programs were responding to the challenges. Six deans and directors of nursing programs were invited to participate in the study and provide the researcher with insights into how their institution, and they as leaders of nursing programs are addressing the shortage. The purpose of the study was to identify both the facilitators and barriers to recruiting, and retaining, nurse faculty.

The study was guided by three research questions:

1. What are the methods and strategies used by leaders at nursing programs to address the nurse faculty shortage?
2. What methods and strategies do nurse educational leaders find successful, and which methods and strategies have been less successful in addressing the nurse faculty shortage?
3. What are the barriers and facilitators to methods and strategies to address the nurse faculty shortage?

The primary data source was semi-structured interviews with deans and directors. Prior to the interviews the researcher examined archival data from each institution including their website data about the nursing program at each college or university and accreditation reports when shared by the dean or director.

Findings

The deans and directors discussed facilitators and barriers to recruitment and retention of nurse faculty. The perspectives of the six deans and directors interviewed exhibited both successful and unsuccessful methods and strategies to improve the nurse faculty shortage. Additionally, barriers and facilitators to improving the nurse faculty shortage in the nursing programs were revealed in this study. There was not one method or strategy for ameliorating the nurse faculty shortage that worked uniformly. The five universities and one college involved in this research were in one Midwestern state but varied in size and location. Indeed, there was not a total match among the six higher education institutions according to *The Carnegie Foundation for the Advancement of Teaching Carnegie Classifications*™. Therefore, each university or college had a unique set of classifications.

The perspectives of the deans and directors revealed several entities that emerged as barriers to recruitment and retention. However, the most significant and ever-present theme from every dean or director interviews was the lack of nurse faculty with a doctorate or other terminal degree. The lack of a doctorate emerged again and again as a major consideration in recruiting and retention of faculty because for most higher education institutions, a doctorate or other terminal degree is a pre-requisite for promotion or even tenure (Huston, 2016; Benner et al., 2010; IOM, 2011; AACN, 2013; Evans, 2013).

Facilitators. Facilitators for improving the nurse faculty shortage were also revealed by the deans and directors. The two facilitators for ameliorating the nurse faculty shortage uncovered from the study were supportive administrators and faculty research. Reporting to supportive administrators in their college or university was the most pronounced response from the deans and directors for facilitators to ameliorating the nurse faculty shortage. Five of the six interviewees provided specific, personal examples of administration support.

Faculty research led to the innovation of joint hospital-university endowed professorships, as a successful strategy. Other tools used to attract nurse faculty included reduced teaching workload and tuition reimbursement for the new nurse faculty hire and for college-aged children of new hires.

Some of the tools for attracting new nurse faculty were time limited, successful as long as the employee needed the advantage. Examples included nurse faculty who left employment once a child college age completed a degree and several instances of nurse faculty who received tuition reimbursement while attempting to achieve a doctorate degree but failed to achieve tenure as a result and thus, lost their faculty job. The phenomenon of

faculty seeking terminal degrees while employed as a tenure-track faculty member is discussed further in the section relating to barriers.

Administration support. The support of college or university administration to the deans or directors of the nursing program was considered essential for improving the nurse faculty shortage situation. Without the support of college or university administration, deans or directors would not obtain the funding for their nursing programs. Director Andrews acknowledged a key aspect of the director position was explaining some uniqueness of nursing education, “trying to help administration understand all those layers...” Director Andrews needed the support of a new administrator in order to successfully launch the pre-licensure program at St. Mary’s University. The monetary funding support gave Director Andrews the power to add faculty positions required for hiring. She shared her perception of administration support, “he has been a gift. He really, truly supports us.”

Director Baker worked to gain the support of administration at Bridgeport College, “Oh yeah, I spend a lot of time convincing them [administration] of the need to attract and hire nurse faculty.” Director Baker described the need to explain hiring and retention of nurse faculty to administration because she understood that the administration had the power to control monetary funding and approval of filling open positions. The administrator was Director Baker’s facilitator for hiring new faculty.

As Dean of the College of Health and Human Services, Dean Cornish had fewer layers of administration than Director Andrews with which to contend and maneuver. Dean Cornish reported directly to Blue Lakes University Provost. This gave Dean Cornish more flexibility and power for initiating monetary funding. Dean Cornish was the administrator of the College of Health and Human Services.

Broome (2013) explained that today's complex academic environment requires advanced skills of deans and stated "When interacting with financial acumen, resource acquisition, interdisciplinary collaboration, and development and advancement are critical" (p. 324). Dean Cornish promoted collaboration and resource acquisition. Dean Cornish's administration role was a facilitator for improving the nurse faculty shortage situation at Blue Lakes University.

The DNP for nurse faculty. Director Drake described that Green Hills University administration was a facilitator for improving the nurse faculty shortage issue.

Administration supported a Doctor of Nursing Practice (DNP) proposal developed by Director Drake, which was scheduled to be approved by the university at the end of the semester. Director Drake described the administration's support of the proposal as "a godsend for me." She wants "a significant number of PhD's" but will settle for DNP's.

We're a third of the enrollment in this entire college and we're one discipline...certainly a DNP program makes perfect sense housed between these two other professional doctorates... I tried to make a really good case for it, so that was another way to say, I said [to administration], ...now that that degree is coming on the horizon, I think we're going to see more and more people out there with that. And so, and it's been a godsend for me because, now as we're trying to get faculty with doctorates, even though I want a significant number of Ph.D.'s.

Dean Everett at University of Forest Lakes described how administration viewed the nursing department, adding the long history of the clinical DNP track. The administration facilitator was the support of both of the two tracks, clinical and tenure nurse faculty. University of Blue Lakes used a non-tenure clinical DNP track for nurse faculty positions as

well as a tenure nurse faculty position. However, lacking tenure status, the value of the DNP hire is diminished at University of Blue Lakes.

Here, the core of business is educating students...And recognizing the value of the DNP. ... as a terminal credential, and its value in academe. We're fortunate in this organization we've had a clinical track and tenure track for 15 years, at least. We were way ahead of the game.

The value of the DNP nurse faculty at University of Forest Lakes is less than the tenure track nurse faculty. The DNP is a newer nurse faculty degree, used extensively in the clinical setting at this university.

Dean Forbes described her role as leading and working with administration and the nursing school in directing Hillside University's mission. She used the term "collaborative" in describing her relationship with administration. Administration and Dean Forbes work as collaborators for the improvement of the nurse faculty shortage at Hillside University. However, Dean Forbes did not identify a specific example of the way administration was a facilitator, only describing that they worked together. Hillside University offers the DNP degree and supports a tenure track for DNP hires. Dean Forbes explained how she worked to fit the mission of Hillside University and led the nursing school. The mission statement of each nursing school is scrutinized during the accreditation review for evidence that the mission of colleges and universities and student outcomes align with the mission values of the parent institution and adhere to "professional nursing standards and guidelines for preparation of nursing professionals" (CCNE, April 2009, p. 7). The mission provides a shared goal (Senge, 1990) for the university, college, and the schools of nursing.

Faculty research. Successful strategies of joint appointments led to innovations for both Blue Lakes University and Hillside University. The faculty research developed into two endowed professorships for hospital-university joint appointments.

Dean Cornish had an expansive role, heading the nursing department and eight non-nursing programs located in five departments in the College of Health and Human Services. By scanning the healthcare and federal government environment for available funds and becoming involved in IOM (Institute of Medicine) Report, and with HRSA (U.S. Department of Health and Human Services Administration) inter-professional education, Dean Cornish found additional funding from faculty research. Dean Cornish said of her role as Dean at Blue Lakes University, “This is a fun role for me...” Dean Cornish reflected on the innovation of research funding.

It’s interesting how history develops because now, with funding as it is, and with the IOM (Institute of Medicine) Report, and with HRSA (U.S. Department of Health and Human Services Administration) funding, everyone wants to be in a position where inter-professional education can be facilitated.

Dean Cornish understood the need to get nursing involved and excited about inter-professional research. The involvement of nursing in the inter-professional research was required for the grant funding. This monetary support gave funding to the nursing department and nurse faculty positions.

Dean Forbes emphasized research as a facilitator for funding nursing. An outcome of the research was hospital-university joint appointments and an endowed professorship.

...one of our major goals is to be more productive research-wise, so, and we’ve done a number of things to get to that goal. We also are developing a PhD program. I’m a

very collaborative leader. I'm very transparent. I look for new and innovative things that we can do to further the mission of the school and make sure that what we're doing also fits in then with the mission of the university...we were first, the first to offer it [DNP].

A New Curriculum. A successful innovative strategy using a high fidelity simulation lab was discussed in this study. Both Dean Cornish at Blue Lakes University and Dean Forbes at Hillside University began implementing a new curriculum using a high-fidelity simulation clinical lab for teaching nursing students. The new curriculum had not added nurse faculty but "increased the capacity of nursing students," offering four hours per week of clinical in the clinical simulation lab. Schools of nursing have begun using clinical simulation to increase the capacity of nursing student enrollments, creating a new curriculum adding simulation as a way to teach some clinical hours (Richardson, Golsamt, Simmons, Gilmartin, & Jefferies, 2014).

Barriers. Barriers to improving the nurse faculty shortage were revealed in the interviews of the deans and directors. The low salaries of nurse faculty members compared to their clinical nurse colleague's salaries were the most prominent responses. The low salary of nurse faculty was a barrier to hiring and retention of nurse faculty. Evans (2013) reported 98.5% of 2,029 nurse educators surveyed listed "increased faculty salaries" as the top response to "help increase nurse faculty" (p. 15). Furthermore, the deans and directors said that low salaries of nurse faculty were important in addition to the following barriers: lack of administrative support for monetary funding to hire and attract nurse faculty, competition for nurse faculty from other colleges and universities, new hires needing to complete a doctorate degree are at risk for tenure denial, need for a faculty mentoring program with new nurse

faculty mentoring program when new nurse faculty hires lack teaching experience, and doctor of philosophy nurse faculty retirements.

Hiring and retention. The low salary for nurse faculty was the barrier reported most frequently by deans and directors. Five of the six participants stated the low salary or pay was an issue in hiring and retention. Dean Andrews was emotional about the low nurse faculty salary at St. Mary's University when she remarked, "The curse that I have had, two of the brightest, best faculty left because they made \$30,000 to \$50,000 more if they went somewhere else, and they chose to do that. Broke my heart!" Director Baker, was resigned to the issue of the low nurse faculty salary at Bridgeport College, "... but unfortunately, ... we just don't have great options and I always attribute some of it to our pay. . . , it's like inevitably I'm going to pay a professor less than she's going to make anywhere else." Dean Cornish reasoned that nurse practitioners have higher salaries in clinical roles compared to faculty salaries and she also acknowledged that the nurse faculty shortage exists now.

And that's just how it is. I can't get the ones that I need to run my DNP program because they make so much money as nurse practitioners, or they have these other places that can pay them so much better. So, it's just really here [nurse faculty shortage] and it's just going to get worse before it gets better.

Director Drake gave her views about the low faculty pay and its connection to the faculty shortage, adding that there was always a discussion of what Green Hills University would pay.

I think that everybody has some level of awareness of the nurse/faculty shortage because every time we go to post a position we have this whole issue about what can we pay them ... and it's going to be hard to attract [nurse faculty].

Dean Forbes responded about the connection of the low faculty pay to the nurse faculty shortage, "...the money, public universities are not known because they pay really well.... I always say, you don't get into academia because you want to get rich." The lower pay for nurse faculty compared to clinical registered nurse pay was linked to other barriers to addressing the nurse faculty shortage. Salary for professions can be viewed as an indicator of their value. Evans (2013) reported, "Most of the respondents identified salary as a major issue in retention" in a study to "identify what teaching nurse educators believe will help build the nurse faculty workforce" (p. 18).

Open positions. Due to the competitive environment for attracting nurse education faculty, it is common for universities to have open positions, often almost continuously. Moreover, the Directors of St. Mary's University and Bridgeport College were particularly challenged by open positions. Having the continuous vacancy allows the college or university to respond more quickly to fill faculty positions.

Director Andrews gave the following account of open positions at St. Mary's University; "That's the one we leave open, we just leave it there [this was the assistant professor position the researcher had found on St. Mary's University Human Resources website]. Director Andrews explained further that there was an open position each semester, adding "It's just constant."

Director Baker discussed open positions at Bridgeport College, negotiating for nurse faculty positions with administration, and the stress created for nurse faculty from the increased workload when there are open positions and retention challenges.

“...we gradually grew over time to be awarded six full-time positions. That took a lot of negotiation. That was something that was, I spent more time than anything trying to maintain those six positions and what happened was, last January, we lost our mental health professor, she left mid-semester; it was not, and it was not good at all.... No one was getting along with anyone. It was really challenging.”

Director Baker gave a real life account of the “very stressful” experience of the faculty and herself during these open positions

Dean Cornish said the primary reason for the lack of doctorate prepared nurse faculty at Blue Lakes University was her inability to pay what hospitals can pay. Blue Lakes University’s Carnegie Classification for size and setting (see Appendix I: Table 2) was “Medium four-year, primarily residential.” Dean Cornish gave a direct response and shared that Blue Lakes University had three open positions. She spoke in a more general sense about the lack of doctorate prepared nurse faculty. “It’s about money, it’s about money, this is about money, it’s about *Magnet Status*, it’s about money ...I can’t pay them what they can make in a hospital.” Dean Cornish attributed the low salary of nurse faculty as the reason open nurse faculty positions remained. Blue Lakes University had only one applicant in nine months for a DNP nurse faculty position. Dean Cornish retorted, “...and that’s just an indication of the depth of the faculty shortage, it’s just people are not out there...” There is an increasing need to focus not only on recruitment of nurse faculty but also that the retention

of newly hired faculty needs the same energy and focus (Huston, 2014). Nurse faculty are increasingly becoming a scarce resource.

Competition for nurse faculty. Due to the lack of an adequate supply of nurse faculty with doctorates, there is a competition for nurse faculty. This competition for nurse faculty prompted Dean Cornish to address the low nurse faculty salary in a conversation with the Provost. Dean Cornish used an analytic approach using business, science, engineering and technology faculty salaries as examples to promote the nurse faculty role at Blue Lakes University and to bargain with the Provost for increasing the nurse faculty salary. She also noted that she was personally recruited by the Blue Lakes University Provost.

I explained to the Provost, that do you want somebody to come from business, in the College of Business, or somebody with NIH funding to come to your Science, Engineering, and Technology? That's what we're talking about here. And that's how you're going to get somebody to come.

Dean Cornish applied a comparison of nursing faculty to faculty in the Colleges of Business, Science, Engineering, and Technology to illustrate to Blue Lakes University Provost the need for increasing nurse faculty salaries. Salaries of faculty at public universities data in the library supported Dean Cornish's statement.

Every dean or director mentioned the competition for nurse faculty and realized that nurse faculty hires were a scarce resource. Competition both from clinical positions, which pay more than academic positions, and from other academic institutions preferring doctoral degree prepared new faculty contribute to the problem (Huston, 2014).

New faculty and failed tenure status. An interesting finding in this investigation was that often new nurse faculty working to earn a doctorate degree failed to attain tenure, which

resulted in loss of employment. Bridgeport College had no nurse faculty with doctorate degrees. The Bridgeport College director was enrolled in a doctoral program at the time of the interview. Deans and directors reported that a major obstacle in nurse faculty retention was new faculty hires' failure to attain tenure if they were, at the same time, seeking to obtain a doctorate while employed. Dean Everett reflected on the problem encountered from new nurse faculty hires who are also working toward the terminal degree,

Because all of their productivity in the five years before they apply [for tenure], and their sixth year has been going to school. As you know, in an academic university, in an academic arena, that is insufficient evidence of scholarship to render one eligible for tenure.

Dean Everett assessed her past experiences hiring faculty and made a concerted effort to avoid this unsuccessful strategy of hiring faculty without terminal degrees. The outcome of failure to attain tenure resulted in loss of employment at the college or university for new faculty hires. The deans and directors who had hired nursing faculty who were completing a doctorate degree had all undergone the outcome of nurse faculty hires leaving employment due to the demands of doctorate work coursework and dissertations. Some of these new nurse faculty hires left voluntarily because they would not meet tenure requirements at the university or college. Another interesting aspect related to hiring faculty attempting to complete terminal degrees was acknowledged by Tourangeau, Saari, Patterson, Ferron, Thomson, Widger, and MacMillan (2013), "Perhaps, nurses who received funding from one organization to complete advanced education may plan to leave that organization to move to a more desirable organization because they now have the qualifications" (p. 7).

An attempt to “grow our own” nurse faculty with the introduction of a DNP program was not a viable option for improving the nurse faculty shortage, according to some information in research literature. Contrary to the literature dismissing the DNP as a viable option for improving the nurse faculty shortage are studies supporting the use of the DNP program to add faculty with a DNP program that utilize this practice degree as a terminal degree for nurse faculty (Yucha, Smyer, & Strano-Perry, 2014).

Implications for Nursing Education Programs

The results of this study offer implications for nursing education programs and their ability to recruit and retain, nurse faculty. The study’s findings uncovered the fact that a university nursing program collaboration with a health care system resulted in an innovative method for improving the nurse faculty shortage at two universities. Research agendas centered on this collaboration resulted in research grant monies for both Blue Lakes University and Hillside University.

Collaboration. Collaboration with a local health care facility created the monetary support to employ a nurse faculty in an endowed professorship. The nurse faculty shortage is a problem of scarce resources and is multifaceted in nature. Collaboration is needed for improving the nurse faculty shortage problem. Bolman and Deal (1997) found that making the best of a situation is sometimes the method of maneuvering a problem with scarce resources. In this study, a positive way to make the best of the nurse faculty shortage problem was collaboration with a local hospital. Dean Cornish commented, “...joint appointments, ...is a real viable choice...and one is giving me two days a week of a nurse manager, to come and work in my Sim [Simulation] labs.... innovative things to attract faculty who have worked clinically.” Dean Forbes used a joint hospital-faculty appointment to help attract and

pay for a nurse faculty specializing in gerontology. Dean Forbes explained the endowed professorship position was created for the joint appointment, “we’re doing innovative things here.” Strategic alliances of higher education institutions with healthcare systems can benefit both the hospital and the college or university by supplying increased numbers of an educated workforce of newly licensed registered nurses. Moreover, collaboration with a healthcare system or local hospital that creates joint hospital-faculty appointments aligns with the suggestion of the Institute of Medicine (2011) for increasing inter-professional engagement for nursing. Needleman, Bowman, Wyte-Lake, and Dobalian (2014) found that collaboration of academic and healthcare facilities can benefit both, although novice faculty must be given needed support.

Models of academic-practice partnerships that expand faculty for clinical and classroom teaching through recruitment from clinical sites, underwriting university-based faculty, and external recruitment can be successful. Attention must be paid to ensuring that inexperienced faculty have the training and support they need as they take on their new teaching roles. (p. 379)

Building the capacity of the nursing program to educate an increased number of nursing students has been achieved with the implementation of innovative curriculums using clinical simulation. The use of a new curriculum using high-fidelity manikins in clinical instruction was a new strategy that added to numbers of nursing students admitted at one university in this study. High-fidelity manikins are, “manikins that breathe, with breath sounds, heart tones, and palpable pulses...” (Johns Hopkins Medicine, “Manikin-Based Simulations, para 1).

Dean Cornish, at Blue Lakes University used high-fidelity simulation for clinical courses and thus, created a new nursing curriculum for pre-licensure Bachelor of Science in Nursing (BSN) students. This innovative curriculum strategy built capacity for BSN graduates in the Midwestern state. Dean Forbes at Hillside University also introduced clinical simulation lab teaching for teaching clinical nursing courses. The use of clinical simulation to increase faculty capacity is a new strategy for easing the nurse faculty shortage but has promise, according to a New York University study, in which the use of clinical simulation teaching was found to increase faculty capacity “nearly 50 percent” (Richardson et al., 2014, p. 308).

A faculty mentoring program. New nurse faculty can often face lack of support, needed resources, and heavy workloads (Tourangeau et al., 2013). Furthermore, it was reported that collegiality and research groups increase nurse faculty retention and recruitment (Heinrich & Oberleitner, 2012). In this study, only Hillside University had a formal mentoring program. Director Baker at Bridgeport College explained that for retention of nurse faculty, she wanted new hires who were “self-motivated” and who “knew academia” and knew the “way to survive.” This need for faculty who “knew academia” appeared to suggest that new hires need mentoring. However, Bridgeport College had no mentoring program for new faculty. Dean Cornish related the support and clarity needed for faculty in tenure-track nurse faculty positions to attain tenure at Blue Lakes University. Dean Cornish explained that new nurse faculty hires sometimes need a faculty mentor, and she offered new faculty the opportunity to observe other teaching styles. This method described by Dean Cornish is not a formal mentoring program and leaves the new nurse faculty hire searching for answers.

Dean Everett acknowledged University of Forest Lakes' need for a faculty-mentoring program for new hires and said the faculty union should assist with new nurse faculty mentoring. The interview outcomes regarding a mentoring process for new nurse faculty hires indicated only one formal mentoring program. It was obvious from this study that a formal mentoring program was needed for nurse faculty and was lacking in all higher education institutions visited except Hillside University, where there was a structured mentoring program for new faculty. Mentoring programs can assist new nurse faculty in the tenure and promotion process. Heinrich and Oberleitner (2012) succinctly described the nurse faculty situation, underscoring the need for a formal mentoring plan. It is known that mentoring programs improve faculty retention but mentoring programs are rarely well planned and systematically implemented, as this study revealed.

As senior scholars begin to retire, today's faculty groups are a mix of master's prepared clinicians and recent graduates with professional (doctor of nursing practice) or research doctorates. This means that novice and midcareer faculty often lack the educational preparation for and/or a proper introduction into the scholarly role....a project that systematically prepared a faculty group to peer-mentor each other's scholarly success from hire to retire holds promise... (p. 5)

Growing our own. Another strategy utilized by a few of the deans and directors in University of Forest Lakes & Green Hills University for ameliorating the nurse faculty shortage was growing their own nurse faculty in Doctor of Nursing Practice (DNP) programs in their respective universities. This aim to recruit nurse faculty through the DNP degree offered through the university requires an increased number of nurse faculty, and may not be the best strategy. The following quote illustrates the issues complicating this strategy.

It is hoped that the DNP degree will attract more nurses to such advanced programs, but these nurses may not be interested in teaching—and the DNP program is not designed to prepare faculty but rather to prepare practitioners. However, even if more students do apply to DNP programs, many are likely to be denied admission due to lack of sufficient faculty to teach in the programs. (Finkleman & Kenner, 2016, p. 97)

The fact that “the DNP program is not designed to prepare faculty” (Finkleman & Kenner, 2016; Siela, Twibell, & Keller, 2008) is the most significant reason these “growing our own” attempts to add to the faculty numbers may not be promising. “Most of the DNP programs do not include preparation as an educator” was also noted by Siela et al. (2008) as a drawback to the DNP degree for nurse faculty (p. 17). Conversely, Yucha et al. (2014) described a collaborative and self-sustaining on-line Doctor of Nursing Practice (DNP) program between the University of Nevada, Las Vegas and the University of Nevada, Reno. The financial model of the collaborative DNP program between two public universities was clearly illustrated, and the DNP graduates were considered potential new nurse faculty in the state. Thus, there is literature to both support the usefulness of the DNP degree for alleviating the nurse faculty shortage and literature to dismiss the feasibility of the DNP for increasing the nurse faculty supply. In fact, the Doctor of Nursing Practice (DNP) has been termed a partial answer to the nurse faculty shortage (Yucha et al, 2014.; Danzey, Ea, Fitzpatrick, Garbutt, Rafferty, & Zychowicz , 2011). This term may better describe the DNP’s usefulness for improving the nurse faculty shortage.

Furthermore, the salaries of nurse faculty are lower than the salaries of nurses in clinical practice. Low nurse faculty salaries “is a predominant issue in the literature” according to Candela et al. (2012, p. 3), and is considered “a driving force of the faculty

shortage” (Kelly, 2010, p. 269). All of the reasons complicating the strategy of “growing our own” presented, point to the method of supporting a strategic alliance of university or college nursing programs with local healthcare systems as the better method.

Implications for Leaders

Leaders who are invested in improving the nurse faculty shortage need to increase the visibility of this issue and promote collaboration with health care centers. As an example of collaboration, clinical nurses can be considered for joint appointments for a dual role of clinical nurse and faculty. “An advantage of the joint appointment to the academic institution is hiring new faculty who have current clinical skills” (Siela, et al., 2009). To raise visibility, leaders need to communicate the nurse faculty shortage problem to the faculty, academic administration, state policy-makers, and the community. The nurse faculty shortage is a problem that has the potential to effect the education of future registered nurses, by turning away even larger numbers of qualified students.

“Leaders are pioneers” who, in this study involving deans and directors, find new ideas and communicate innovative visions with a passion (Kouzes & Posner, 2007, p. 18). Deans and directors leading nursing programs in colleges and universities need to realize the best vision to promote needed changes and then clearly communicate the visions for ameliorating the nurse faculty shortage to the nurse faculty and all supporting systems for empowering and motivating all involved in the new vision (Kantabutra, 2010; Kouzes & Posner, 2007; Senge, 1990).

The nurse faculty shortage problem is multifaceted. Kowalski and Kelley (2013) suggested that the nurse faculty shortage also requires “sustained changes in behavior of five groups: existing faculty, potential new faculty, academic administrators, state policy makers,

and community and health care system leaders” (p. 75). Partnerships and collaboration with health care facilities and collaborating with other universities have been successful strategies for ameliorating the nurse faculty shortage (Needleman et al., 2014; Yucha et al., 2014). During the nurse faculty shortage and at a time when there is an increasing demand for educating nurses, it is essential to be creative in consolidating resources (Siewart, Rasmussen, Lofgren, & Clinton, 2011). Dean Cornish and Dean Forbes, enmeshed in their leadership roles, creatively led collaborations of deans with local health care systems to establish university-hospital joint appointments. These two nurse leaders provided lessons in problem-solving through collaboration. Both Dean Cornish and Dean Forbes collaborated with the healthcare business leaders, healthcare team members and nursing to achieve their joint appointment goals. Leaders in nursing education should be willing to share the successful strategies they have found to improve the nurse faculty shortage and also to learn from others. Partnerships with hospitals utilizing hospital nurses to teach clinical courses and endowed professorships have been a recent collaboration strategy for ameliorating the nurse faculty shortage (Allen & Aldebron, 2008; Yucha et al., 2014).

Philanthropic means of supporting university and college nursing programs was not found in this study but is worthy of future exploration as a measure to improve the nurse faculty shortage. Two sources of philanthropy have been identified “the first are community members and non-nurses who are interested in supporting nurses... second is the nursing profession, which gives to organizations that advances nursing education and practice” (Bolton, Swanson, & Zamora, 2014, p. 320).

Leaders also need to address that often short term fixes instead of long term solutions are implemented to address the nurse faculty shortage. However, “...this shortage is being

driven more by the supply side of the supply/demand equation than the demand side...this makes the problem even more difficult to solve because it will require more than the short-term, quick-fix solutions that have worked in the past” (Huston, 2014, p. 69).

Director Drake listed the two main issues responsible for the nurse faculty shortage in her experience: a lack of nurse faculty with doctorates and the looming problem of nurse faculty with doctorates “dying off.” The shortage of faculty and doctoral students is a significant problem in the nursing profession (Kowalski & Kelly, 2013; Tourangeau et al., 2013).

An important aspect uncovered in this study was that the successful methods and strategies for improving the nurse faculty shortage were so recent that they require further scrutiny. This requirement for ongoing evaluation of methods employed to improve the nurse faculty shortage problem also aligns with the nurse faculty research literature “annual surveys must seek information necessary to provide a thorough analysis of ...nurse faculty trends” (Falk, 2014, p. 41). Furthermore, “often the obvious ‘solutions’ are the least effective, for they ignore the less-visible underlying root causes, and provide only symptomatic relief” (Kowalski & Kelley, 2013, p. 75). Both successful and unsuccessful methods and strategies for improving the nurse faculty shortage reported by deans and directors in one Midwestern state were revealed in this research.

Educational and nurse leaders will need to find those strategies that are successful in ameliorating the nurse faculty shortage situation and translate them into policy and communication with state policy-makers. “Although national strategies to address the nursing shortage continue to emerge, it is often at the state level where practice and education are regulated” (Green, Kishi, & Esperat, 2010, p. 2). The nurse faculty shortage limits the

admissions of nursing students. A condition of scarce resources existing in nursing education is the nurse faculty shortage. This human capital of nurse faculty is further threatened by a wave of faculty retirements looming on the horizon. Dean Cornish described nurse faculty ready to “walk out like cicadas” as this group ages.

Director Andrews and Director Baker had no nurse faculty with a terminal degree. A *brain drain* of tenured faculty with knowledge of the academe is expected to occur when the baby boomer generation of nurse faculty retires from colleges and universities (Falk, 2014; Yedidia, 2014; AACN, October 2013). A recent qualitative study (Falk, 2014) highlighted the value of aging Bachelor of Science in Nursing (BSN) nurse faculty with this quote from an interviewee. “You can pass on knowledge, but you can’t pass on wisdom. You have to experience life to gain wisdom. And I think a lot of our older faculty have some wisdom.”

This investigation also revealed the issue that nurse faculty enter the faculty role later than faculty enter other disciplines. Allan and Aldebron (2008) found that “Educators, however, age out of employment more rapidly than clinical nurses because they enter it relatively later, after first meeting advanced degree requirements for teaching (p. 140). Added to this late entry into nurse faculty roles is the fact that “most nurse faculty vacancies, 90.6 % were faculty positions requiring or preferring a doctoral degree” (Huston, 2014, p. 73). These nurse faculty members often attain a doctorate degree at a more advanced age.

Dean Forbes statement was consistent with research literature, “if you look at other disciplines, they’ll get into that area to do education much sooner than we do in nursing.” She explained, “In nursing we have this mindset that we graduate... and then we have to practice, and so then we practice for ten years, twelve years.”

An issue uncovered in this study was the lack of diversity in nurse faculty. Even though the lack of diversity in nurse faculty was stated by only one interviewee, the importance is supported by research literature, “Nursing education is not attracting adequate numbers of men and racial and ethnic minorities” (Huston, 2014; Evans, 2013). The Midwestern state’s registered nurse population was 88 % White and 93.7 % female (Michigan Center for Nursing 2013 Survey, 2014) at the time of this study. Dean Forbes commented, “A lack of diversity exists in nurse faculty.” This lack of diversity is present in a time when the U.S. population is more diverse according to a 2013 report from, The Henry J. Kaiser Family Foundation; 62 % White, 12 % Black, 17 % Hispanic, and 8 % other. Academic leaders can develop a more diverse faculty to represent the current U.S. population.

A particular new prospect for nurse leaders will be to prepare for future generations of nurse faculty and to learn from those with much experience in the nurse faculty role. Nurse faculty, deans and directors, and potential new nurse faculty should engage in succession planning in an effort to prepare for the future (Kantabutra & Sartun, 2013). This study found no evidence of succession plans for nurse faculty, as evidenced from the deans and directors interviewed. “Succession planning requires deliberate, intentional work on the part of the leader...” (Fitzpatrick, 2014, p. 359). Deans and directors leading nursing programs in colleges and universities need to begin this conversation, regarding succession planning with healthcare members, colleagues, nurse faculty, and policy-makers. Thus, it is essential to understand what is needed to “assure smooth transitions and high quality education as aging faculty retire and new faculty begin [nurse faculty role]” (Falk, 2014, p. 41).

The multifaceted nurse faculty shortage problem requires input from nursing, healthcare team members, education, business, state policy-makers, administrators, and the community. First, deans and directors of nursing programs need to make the visibility of the nurse faculty shortage a priority. Second, collaboration is the key to a successful outcome, and deans and directors of nursing programs must begin the journey of collaboration with healthcare systems, education, and the community. Third, deans and directors of nursing programs should lead the innovation of utilizing high-fidelity manikins and technology to teach clinical simulation because of the favorable results of this strategy.

Recommendations for Further Research

This study identified some of the facilitators and barriers to addressing the shortage of nurse faculty. Leaders of nursing education programs have an important role identifying and implementing innovations that will increase their institutional capacity to prepare nurses. This study found that when nursing programs collaborate with other healthcare professionals and healthcare systems, they can increase human capital (Kowalski & Kelley, 2013). “The most common internal challenges noted by academic nurse leaders are those concerning human resources,” reported Falk (2014, p. 36). Thus, as the current generation of nurse faculty ages and retires, it is important to find ways to increase the number of nurse educators and increase the diversity of that faculty to reflect the U.S. population.

This research highlighted several areas for action that call for additional research. A quantitative statewide study investigating the innovations and strategies that successfully address the nurse faculty shortage would be useful. Such a study would be appropriately complemented by a replication of this qualitative study expanded to include all 30 currently approved baccalaureate degree nursing programs. Including all baccalaureate degree nursing

programs would provide a more robust sample and allow researchers to identify trends and patterns of success across the entire state.

An initiative study should be launched to gather long-term data from all nursing education programs about the success, or lack of success, of their efforts to address the nurse faculty shortage. The goal of the study should be to identify successful practices rather than identify strategies that did not address the need for more nurse faculty. It is important to learn from one another and build on successful practices. As Allan and Aldebron (2008) stated in *A Systemic Assessment of Strategies to Address the Nurse Faculty Shortage*, “Quick fixes with no potential for follow-up are simply inadequate, however attractive they might appear in the short-term” (p. 295). A comprehensive monitoring and assessment strategy across all baccalaureate degree programs should address this need.

Conclusion

The deans and directors interviewed for this research acknowledged the need for more nurse faculty to educate future Bachelor of Science in Nursing (BSN) students. Each nursing leader understood the increasing need for nurse faculty created by the large numbers of nurse faculty retirements expected. This study looked at the issue of the nurse faculty shortage in one Midwestern state. It became evident from investigating that the problem is complex. The strategies and methods to improve the nurse faculty situation in this Midwestern state require collaboration with healthcare systems, education, and the community. It will also be essential to continue this collaboration process. It is important to note that the primary responsibility for improving higher education nursing student accessibility lies with each state (McLendon & Perna, 2014). Therefore, investigating the nurse faculty shortage issue in one state is important research.

Deans and directors acknowledged supportive administrators to attain monetary support for nurse faculty. Faculty research agendas formed collaborative alliances and gained monetary support. In this time of scarce nurse faculty resources, it is apparent that “without a strategic framework model of change, and outcomes criteria, one solution will appear as good as any other.” (Kowalski & Kelley, 2013, p. 75) More important, creating long-term solutions for the nurse faculty shortage will ensure a registered nurse workforce that is adequate to care for U.S. patients. “Deans (and directors) of nursing must be able to foster adaptation and focus on how things will get done now while also preparing for the future” (Broome, 2013, p. 327).

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Appendices

Appendix A: Open Ended Guiding Questions-A Semi-structured Interview Guide

1. Tell me about your experiences recruiting faculty and the length of time nurse faculty positions remain unfilled (open).
2. Tell me how you use local, national, or international search tools.
3. Describe your experiences regarding faculty retention.
4. Provide examples of newer faculty employed who resigned.
5. Provide examples of newer faculty employed who remained in their faculty role but do not appear to be a good fit.
6. Describe your role as an educational leader within your university/college.
7. Give your perceptions of the nurse faculty shortage.
8. The National League for Nursing 2012-2015 lists “building capacity” as an indicator of nursing leaders’ success. Give an example at your nursing program.
9. Give your opinion of how colleagues, faculty, and administrators at your university perceive the nurse faculty shortage.
10. Discuss causes of the nurse faculty shortage.
11. Chat about some of the challenges you encounter as an educational leader related to the causes of the nurse faculty shortage.
12. Describe solutions to the nurse faculty shortage you have seen other educational leaders implement.
13. Describe solutions to the nurse faculty shortage you have implemented successfully.
14. Describe solutions to the nurse faculty shortage you have attempted to implement but encountered obstacles.
15. How many searches for open faculty positions do you have currently? How many one, two, and three years ago?
16. Describe faculty development offered new hires, non-tenured, and tenured faculty.
17. Do your faculty leaving employment participate in exit interviews?
18. If there is something you would have liked to have been asked about the nurse faculty shortage that we did not discuss, please talk about it now.

Appendix B: Critical Incident Record

Aim of the research: Experiences of nursing deans and directors grappling with the nurse faculty shortage. Successful strategies & Unsuccessful strategies.
Researcher interviews with a nonjudgmental and confidential approach.
Narratives are audio-recorded

University (pseudo name) / date /
time

Major Categories of Information Collected for Each Critical Incident:

1.

2.

Interviewees-successful strategies

- Content-oriented statements
 - Strategies for potential success in nurse faculty hiring& retention
 - List of criterion
 - Associated factors
- Relational-oriented statements

Themes:

Interviewees-unsuccessful strategies

- Content-oriented statements
 - Strategies for potential unsuccessful nurse faculty hiring& retention
 - List of criterion
 - Associated factors
- Relational-oriented statements

Themes:

Appendix C: Follow-up Invitation Letter

(On EMU Letterhead)

Date

Dear *insert name and title*:

I am an Eastern Michigan University Doctoral Candidate in Educational Leadership interested in the nursing faculty shortage. In order to better understand this shortage and potential solutions, I plan to interview nurse administrators (deans/directors/department heads). I am especially interested in your views about the nurse faculty shortage. If you would be willing to participate in this study, simply e-mail me at dfox2@emich.edu or phone me at 517-605-5204.

I will contact you to set up a confidential interview to be conducted at a time and place that is convenient to you. The interview will last approximately 45 minutes and no longer than one hour. Then a follow-up interview will be conducted to clarify any information and this may be via telephone, Skype, or video conferencing.

Thank you for your interest in the nurse faculty shortage.

Sincerely,

Diane Porretta Fox, RN, MSN, CNE
EMU Doctoral Candidate in EDLD

I also sent, as an attachment in the email, a copy of the consent form with the official approval from the Eastern Michigan University Human Subjects Institutional Review Board. If you participate in the study you will sign the consent prior to the interview at our first meeting. This will allow you to ask me questions if needed at that time.

Appendix D: Written Consent to Participate in a Dissertation Research.

Title: Deans/ Directors/ Department Heads of Nursing BSN Programs:
Grappling with the Nurse Faculty Shortage

Hi, my name is Diane Porretta Fox and I am working in a research study called “Deans and Directors of Nursing BSN Programs: Grappling with the Nurse Faculty Shortage.” I am the principal investigator. The purpose of this qualitative study is to explore the current experiences and processes of deans/directors of nursing in colleges and universities regarding the nurse faculty shortage when reflecting on this subject in interviews with the researcher. There will be a total of two interviews over the course of as few as two weeks or as many as eight weeks.

The first phase of the research will consist of completing a brief demographic survey of less than 20 questions. This demographic survey will take approximately 3 to 5 minutes. You will be given this survey at our first meeting for the initial interview. The first interview session will follow in this first phase.

Each interview session will last approximately 45 minutes to 1 hour. No identifying information will be recorded nor used in the transcription to keep your identity confidential. Each interview will be tape-recorded to explore the study subject regarding the nurse faculty shortage. The interviews will be taped for verbatim transcription but the tapes will be identified by code initials. Only the researcher will know who the participants are and records will be kept in a locked box. After the research is completed, transcribed by a professional transcriptionist, and accuracy verified by me all identifying information regarding participants will be destroyed.

The researcher will review general information and data via a computer web search prior to the first meeting with each dean/director. The researcher will also ask the dean/director of nursing if there is any information they would like to volunteer that would be helpful to this investigation of the nurse faculty shortage.

The second and final phase of the research will include a second interview within 2 to 8 weeks. . Any previous interview clarifications or questions from the first interview session will be completed to the satisfaction of the participant before the researcher begins this second interview. This final interview will be an agreed upon access chosen by the interviewee; Skype, on-line-chat, video-conferencing, or a telephone interview and again a minimum of 45 minutes.

Your participation is completely voluntary and participants may withdraw at any time during the study. This means you do not have to participate in this study unless you want to. There is no penalty for refusal to participate. If so desired by the participant, any data collected up to the point of withdrawal will not be used in the study results and will be destroyed. There is no physical risk involved and the psychological risk is minimal since the discussion interview will involve reflection on the nurse faculty shortage and on ways to improve the shortage from the participants’ perspectives.

The probability and magnitude of harm or discomfort anticipated from participating in this research interview are not greater in and of themselves than those ordinarily encountered in daily work-life as a department head/director/dean. Benefits to study participants, may be satisfaction of expressing opinions and ideas about increasing the number of nurse educators. The benefits to the nursing profession and educational leaders include increased knowledge of nurse educators’ workplace and nurse administrators’ needs and expectations.

The research will be published as a dissertation and journal articles may result from the findings. Your identity will remain confidential by the use of pseudonyms for all names and locations in any publication or presentation related to this study. Any participants who may want to collaborate in journal submissions resulting from this research will be welcome and will be appropriately acknowledged for their contribution. This journal collaboration will involve only research qualitative narratives of their own interview session and any other qualitative narratives from interviews will be transcripts only containing pseudonyms for all names and locations. To request collaboration for a journal contact me via email at dfox2@emich.edu
Subjects may request findings of the results from this research by contacting me via email at dfox2@emich.edu and these findings will be sent following final publication of this dissertation.

For questions about the research, please feel free to contact the researcher at 517-605-5204 or dfox2@emich.edu or Ron Williamson, Dissertation Chair at 734-487-0255.

The project protocol and informed consent has been reviewed and approved by the University Human Subjects Review Committee (UHSRC) for use from [May 13, 2013] to [May 13, 2014]. If you have any questions about the approval process, please contact the UHSRC at human.subjects@emich.edu or call 734-487-0042.

Consent to participate:

I have read all of the above information about this research study, including research procedures, possible risks, and the likelihood of benefit to me. I understand that I may choose **not** to answer certain questions, and that I may withdraw and discontinue participation at any time. I further understand that my identity will be protected at all times and that a pseudo name will be assigned to me after the interviews are completed, and that any identifying characteristics will be deleted. I further understand that my tapes and transcripts will be destroyed after the project is completed.

The content and meaning of this information has been explained and I understand. All of my questions, at this time, have been answered. I hereby consent and do voluntarily offer to follow the study requirements and take part in this study.

PRINT NAME: _____

Signatures:

Participant _____ Date _____

Investigator: _____ Date _____

(Both the research investigator and you the participant will be provided a copy of this signed informed consent)

Appendix E: Follow-up Email

Dear *insert name*,

Thank you for speaking briefly with me regarding your possible participation in this nurse faculty shortage research, understanding this shortage is a problem worthy of study. As a doctoral student in Educational Leadership at Eastern Michigan University, I am asking for your help to identify strategies for recruitment and retention of nurse faculty and exploration of the current faculty situation. This study will involve two interviews, with one being face-to-face, completion of a brief demographic profile (less than 20 questions). Please see Letter of Invitation and Informed Consent for more details.

I know your time is valuable and I appreciate your consideration to take part in this important research.

Thank you so much. I look forward to hearing from you soon.

Email: dfox2@emich.edu

Phone: 517-605-5204

Sincerely,

Diane Porretta Fox, RN, MSN, CNE

Eastern Michigan University Doctoral Candidate in Educational Leadership. Please see 2 attachments: Letter of invitation, Informed Consent

Appendix F: Participants' Demographic Profile

As part of this research, would you please respond to the following questions for background demographic information for this study:

1. What is your birth year? _____
2. What is your gender? _____
3. What is your highest earned degree? _____
4. What other degrees have you earned? _____
5. Certifications? _____
6. How long have you been dean or director at this college/university? _____
7. How many years total have you been employed at this university? _____ at other universities? _____
8. Years of previous leadership/management experience and in what capacity/capacities? _____ in _____.
9. Clinical area of expertise? _____ how many years of clinical experience? _____
10. How many tenured or tenure track full-time nursing faculty are currently at this college/university? _____
11. Full-time nursing faculty teaching load credits per semester? _____
12. How many part-time nursing faculty members at this college/university? _____
13. Desired number of full-time nursing faculty at this college/university? _____
14. Number of full-time nursing faculty positions currently open for hire? _____
15. Number of part-time nursing faculty positions currently open for hire? _____
16. Approximate number of faculty currently eligible to retire now and in the next 5 years? _____

Appendix G: Uniform Checklist for Gathering Nursing Program/University

Information*

Name of University (Website information)				
Faculty	Students	Human Resources	Faculty Development	Nursing Education
Total=	Total=	Faculty Positions Posted =	New hire orientation	Credit Total BSN=
Nursing Total=	Nursing Total=	Adjunct positions=	Research Support	BSN courses required + BSN handbook
Tenured/ Tenure-Track Nursing=	Number of Nursing Clinical Sites=	Application for adjunct faculty position=	Conferences/ travel	NCLEX pass rate BSN graduation rate/yr
Adjunct Nursing=	Number of BSN student applicants=	Application for tenure/tenure-track=	Research Awards	Number/type online BSN courses
Total Nursing Faculty Positions Posted on HR=	Number of BSN students admitted last year /previous yr./ next yr.=	Health plan	Mentoring program	Simulation Lab What courses?
Faculty to student class ratio Nursing=	BSN student info Average age= M/F=	Retirement	Interdisciplinary Research?	Nursing Dept. Operating Budget= Self-study doc
Organizational chart		Part-time post retirement?		Fast track BSN to MSN/DNP?

*This checklist is a work-in progress. Additions and changes will be implemented as needed.

Appendix H: Eastern Michigan UHSRC Approval

EASTERN MICHIGAN UNIVERSITY

Education First

May 18, 2013

UHSRC Initial Application Determination: EXPEDITED APPROVAL

To: Ms. Diane P. Fox
Teacher Education

Re: UHSRC #130503 Category: Approved Expedited Research Project
Approval Date: May 13, 2013

Title: Deans/Directors/Department Heads of Nursing BSN Programs: Grappling with the Nurse Faculty Shortage

The Eastern Michigan University Human Subjects Review Committee (UHSRC) has completed their review of your project. I am pleased to advise you that your **expedited research has been approved** in accordance with federal regulations.

Renewals: Expedited protocols need to be renewed annually. If the project is continuing, please submit the **Human Subjects Continuation Form** prior to the approval expiration. If the project is completed, please submit the **Human Subjects Study Completion Form** (both forms are found on the UHSRC website).

Revisions: Expedited protocols do require revisions. If changes are made to a protocol, please submit a **Human Subjects Minor Modification Form** or new **Human Subjects Approval Request Form** (if major changes) for review (see UHSRC website for forms).

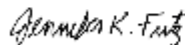
Problems: If issues should arise during the conduct of the research, such as unanticipated problems, adverse events, or any problem that may increase the risk to human subjects and change the category of review, notify the UHSRC office within 24 hours. Any complaints from participants regarding the risk and benefits of the project must be reported to the UHSRC.

Follow-up: If your expedited research project is not completed and closed after three years, the UHSRC office will require a new **Human Subjects Approval Request Form** prior to approving a continuation beyond three years.

Please use the UHSRC number listed above on any forms submitted that relate to this project, or on any correspondence with the UHSRC office.

Good luck in your research. If we can be of further assistance, please contact us at 734-487-0042 or via e-mail at gs_human_subjects@emich.edu. Thank you for your cooperation.

Sincerely,



Dr. Jennifer Kellman Fritz
Faculty Chair
University Human Subjects Review Committee

University Human Subjects Review Committee · Eastern Michigan University · 200 Boone Hall
Ypsilanti, Michigan 48197
Phone: 734.487.0042 Fax: 734.487.0050
E-mail: human.subjects@emich.edu
www.ord.emich.edu (see Federal Compliance)

The EMU UHSRC complies with the Title 45 Code of Federal Regulations part 46 (45 CFR 46) under FWA00000050.

EASTERN MICHIGAN UNIVERSITY

Education First

March 25, 2014

UHSRC Determination: EXPEDITED CONTINUATION APPROVAL

To: Diane P. Fox
Eastern Michigan University - College of Education

Re: UHSRC # 140309C (#130503)
Category: Approved Continuation Expedited Research Project
Approval Date: March 25, 2014

Title: Deans/Directors/Department Heads of Nursing BSN Programs: *Grappling with the Nurse Faculty Shortage*

The Eastern Michigan University Human Subjects Review Committee (UHSRC) has completed their review of your continuation for a previously approved expedited project. I am pleased to advise you that your research continuation has been approved in accordance with federal regulations.

Renewals: Expedited protocols need to be renewed annually. If the project is continuing, please submit the **Human Subjects Continuation Form** prior to the approval expiration. If the project is completed, please submit the **Human Subjects Study Completion Form** (both forms are found on the UHSRC website).

Revisions: Expedited protocols do require revisions. If changes are made to a protocol, please submit a **Human Subjects Minor Modification Form** or new **Human Subjects Approval Request Form** (if major changes) for review (see UHSRC website for forms).

Problems: If issues should arise during the conduct of the research, such as unanticipated problems, adverse events, or any problem that may increase the risk to human subjects and change the category of review, notify the UHSRC office within 24 hours. Any complaints from participants regarding the risk and benefits of the project must be reported to the UHSRC.

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Please use the UHSRC number listed above on any forms submitted that relate to this project, or on any correspondence with the UHSRC office.

Good luck in your research. If we can be of further assistance, please contact us at 734-487-0042 or via e-mail at gs_human_subjects@emich.edu. Thank you for your cooperation.

Sincerely,



Dr. Jennifer Kellman Fritz
Faculty Co-Chair
University Human Subjects Review Committee

University Human Subjects Review Committee - Eastern Michigan University - 200 Boone Hall
Ypsilanti, Michigan 48197
Phone: 734.487.0042 Fax: 734.487.0060
E-mail: human.subjects@emich.edu
www.ord.emich.edu (see Federal Compliance)

The EMU UHSRC complies with the Title 45 Code of Federal Regulations part 46 (45 CFR 46) under FWA00000050.

Appendix I: Carnegie Classifications. Table 2

Colleges and Universities Carnegie Classification: Deans and Directors of Nursing Participants*

Adapted from Carnegie Foundation for the Advancement of Teaching Institution Lookup
 (http://classifications.carnegiefoundation.org/lookup_listings/)

Dean/Director Name College or University Name	Level/ Control	Classification	Category
Director Andrews Saint Mary’s University	4-year or above/ Private not-for-profit	Undergraduate Instructional Program	Prof+A&S/SGC: Professions plus arts & sciences, some graduate coexistence
		Graduate Instructional Program	Postbac-Prof/Bus: Post baccalaureate professional (business dominant)
		Enrollment Profile Undergraduate Profile Size and setting Basic	VHU: Very high undergraduate PT4: Higher part-time four-year S4/R: Small four-year- year, primarily residential Master’s M: Master’s Colleges and Universities (medium programs)
Director Baker Bridgeport College	4-year or above/ Private not-for-profit	Undergraduate Instructional Program	Prof-F/NGC: Professions focus, no graduate coexistence
		Graduate Instructional Program	S-Postbac/Other: Single post baccalaureate (other field)
		Enrollment Profile Undergraduate Profile Size and setting Basic	VHU: Very high undergraduate MFT4/S/LTI: Medium full-time four-year, selective, Lower transfer-in VS4/NR: Very small four-year, primarily residential
			Baccalaureate Colleges—Diverse Fields

Dean/Director Name College or University Name	Level/ Control	Classification	Category
Dean Cornish Blue Lakes University	4-year or above/ Public	Undergraduate Instructional Program	Prof+A&S/SGC: Professions plus arts & sciences, some graduate coexistence
		Graduate Instructional Program	Postbac-Prof/Ed: Post baccalaureate professional (education dominant)
		Enrollment Profile Undergraduate Profile Size and setting Basic	VHU: Very high undergraduate
			FT4/S/HTI: Full-time four-year, selective, higher transfer-in
			M4/R: Medium four- year, primarily residential
			Master's L: Master's Colleges and Universities (larger programs)

Dean/Director Name College or University Name	Level/ Control	Classification	Category
Director Drake Green Hills University	4-year or above/ Public	Undergraduate Instructional Program	Prof-F/SGC: Professions focus, some graduate coexistence
		Graduate Instructional Program	Postbac-&S/Other: Post baccalaureate with arts & sciences (other dominant fields)
		Enrollment Profile Undergraduate Profile Size and setting Basic	VHU: Very high undergraduate
			MFT4/S/HTI: Medium full-time four-year. Selective, higher Transfer-in
			L4/R: Large four-year, primarily residential
			Master's L: Master's Colleges and Universities (larger programs)

Dean/Director Name College or University Name	Level/ Control	Classification	Category
Dean Everett University of Forest Lakes	4-year or above/ Private not-for-profit	Undergraduate Instructional Program	Prof+A&S/SGC: Professions plus arts & sciences, some graduate coexistence
		Graduate Instructional Program	Doc/Prof: Doctoral, professional dominant
		Enrollment Profile Undergraduate Profile Size and setting Basic	MU: Majority undergraduate MFT4/S/LTI: Medium full-time four-year, selective, lower transfer-in
			M4/NR: Medium four- year, primarily nonresidential Master's L: Master's Colleges and Universities (larger programs)
Dean Forbes Hillside University	4-year or above/ Public	Undergraduate Instructional Program	Bal/SGC: Balanced arts & sciences/professions, some graduate coexistence
		Graduate Instructional Program	Doc/STEM: Doctoral STEM dominant
		Enrollment Profile Undergraduate Profile Size and setting Basic	HU: High undergraduate MFT4/S/HTI: Medium full-time four-year, selective, higher Transfer-in rate LA/NR: Large four-year, primarily nonresidential DRU: Doctoral/Research Universities

Appendix J: BSN Nursing Student Admissions: Size and Selection

The reported annual pre-licensure student nurse admissions ranged from 16 students to 445 students. Five of the annual admissions were reported. University of Forest Lakes Dean did not provide the number of annual student nurse admissions.

Annual admissions of pre-licensure nursing students at St. Mary's University were as follows; 2011= 16 students, 2012=16 students and 2013=18 students. Director Andrews explained the admittance process.

The goal was to admit 24 students each year but the students are required to have a 3.0 grade point in all sciences required for entry. All nursing students are admitted in their sophomore year after successful completion of the required courses with a 3.0 or greater.

Annual admissions of pre-licensure nursing students at Bridgeport College were as follows; 2011= 20, 2012= 20 students, 2013= 20 students. Director Baker explained the admittance process. There were 20 credits of pre-requisite courses with a minimum of a 2.0 grade point for admission. Additionally, there are 42 credits of general education courses required. Once admitted to the nursing program 62 credits of nursing major courses are taken for BSN completion. Director Baker shared the fact that she was seeking applicants for this new pre-licensure BSN program and not looking for only the A student. She then told this researcher.

The goal has been 24 students each year but we have been admitting 20 and expect this number to increase in the future. Our first class to graduate will be only 18 students in 2014 because two students dropped out from this cohort.

Pre-licensure BSN admissions

Annual admissions of pre-licensure nursing students at Blue Lakes University were as follows; 2011= 128, 2012= 356 (merged to new five semester nursing curriculum from six semester curriculum), 2013= 192. Dean Cornish further explained the numbers of students.

...we admit 64 in the fall and 64 in the winter term, and this past year, because we phased in our new curriculum, we actually had 128 in the fall and the winter, because we, we're teaching in the old and out the new, or vice versa, in the new and out the old, and our old curriculum was six semesters and our new is, five; as it just turned out, we had the P1's, which is the old curriculum, and the N1's at the same time. So we had clinical placements and 128 students (each semester), whereas normally, it would have been 64 (students each semester). .

The annual admissions of pre-licensure nursing students at Green Hills University were as follows; 2011= 88 student, 2013= 88 students, and 2013= 88 students. Director Drake explained the admission process.

...for the (pre-licensure) BSN program, we admitted twice a year, and then, we actually three times a year, cause I admit two traditional cohorts 32 each and then 24 accelerated second degree in the summer. So I admit 88 a year.

The admittance of pre-licensure nursing student numbers was not available, according to Dean Everett. Dean Everett did not discuss the admission process or the pre-licensure student numbers. This researcher gathered the following information from University of Forest Lakes website. University of Forest Lakes has a traditional pre-licensure BSN nursing program. University of Forest Lakes also admits pre-licensure students to a second

baccalaureate degree program. The admittance process on the University of Forest Lakes website required a minimum grade point average (GPA) of 2.5 or greater, and a minimum ACT (American College Testing®) score of 21 or 1000 on the SAT®. Once admitted to the pre-licensure nursing program 130 semester hours of required courses must be completed with a minimum GPA of 2.5 in all nursing courses and supportive core course, and a cumulative GPA of 2.5 overall. Additionally, each pre-licensure nursing student must take the Health Education Systems Inc. Exam (HESI) ® and pass with a minimum score of 75 %. This pre-entrance exam can be retaken once.

Hillside University School of Nursing pre-licensure BSN annual admissions was explained to me only for this year as 110 students twice a year= 220 students and 75 second degree students three times a year= 225students for a total of 445 pre-licensure BSN students admissions per year. Students are admitted to the School of Nursing on a competitive basis and completion of minimum requirements does not guarantee admission. Students are required to meet the minimum 125 credits and achieve a 2.5 final grade or higher in all nursing courses. The graduation process from the School of Nursing required all pre-licensure BSN students to take the ATI Comprehensive Exam and achieve an 88% on the “Predicted Probability of Passing NCLEX-RN on the first attempt”. All pre-licensure BSN students were required to retake this ATI Comprehensive Exam until achieving a minimum 88% score.