

2022

Strategies for Retaining Nurses in Rural Healthcare Settings

Michelle Lee Pratt Yeater
Walden University

Follow this and additional works at: <https://scholarworks.waldenu.edu/dissertations>



Part of the [Health and Medical Administration Commons](#), and the [Nursing Commons](#)

This Dissertation is brought to you for free and open access by the Walden Dissertations and Doctoral Studies Collection at ScholarWorks. It has been accepted for inclusion in Walden Dissertations and Doctoral Studies by an authorized administrator of ScholarWorks. For more information, please contact ScholarWorks@waldenu.edu.

Walden University

College of Management and Technology

This is to certify that the doctoral study by

Michelle Pratt Yeater

has been found to be complete and satisfactory in all respects,
and that any and all revisions required by
the review committee have been made.

Review Committee

Dr. Warren Lesser, Committee Chairperson, Doctor of Business Administration Faculty

Dr. Deborah Nattress, Committee Member, Doctor of Business Administration Faculty

Dr. Lisa Cave, University Reviewer, Doctor of Business Administration Faculty

Chief Academic Officer and Provost
Sue Subocz, Ph.D.

Walden University
2022

Abstract

Strategies for Retaining Nurses in Rural Healthcare Settings

by

Michelle Pratt Yeater

HCMBA, The George Washington University, 2014

BSW, Marshall University, 2003

BBA, Marshall University, 2000

Doctoral Study Submitted in Partial Fulfillment

of the Requirements for the Degree of

Doctor of Business Administration

Walden University

December 2022

Abstract

Rural healthcare leader deficiency in implementing successful strategies to retain nurses can deleteriously impact the quality of patient care and impede the organization's financial performance. Grounded in Herzberg's two-factor theory, the purpose of this qualitative multiple-case study was to explore successful nurse retention strategies used by rural healthcare leaders. Data were collected from semistructured interviews with eight pastoral healthcare leaders in the eastern region of the United States who improved nurse retention and a review of relevant supporting documentation from company websites. Coding was used for data analysis and theme determination. Three themes emerged: effective nurse retention incentives, meaningful relationships with leaders, and competitive advantage benefits. A primary recommendation is for rural healthcare leaders to establish solid and supportive relationships with nurses while minimizing dissatisfiers such as lower pay and non-competitive benefits. The implications for positive social change include the potential for improved nurse retention in rural healthcare facilities. Adequate nursing staff can enhance quality patient care and decrease the potential for adverse patient events, which may improve the quality of life for citizens in rural communities.

Strategies for Retaining Nurses in Rural Healthcare Settings

by

Michelle Pratt Yeater

HCMBA, The George Washington University, 2014

BSW, Marshall University, 2003

BBA, Marshall University, 2000

Doctoral Study Submitted in Partial Fulfillment

of the Requirements for the Degree of

Doctor of Business Administration

Walden University

December 2022

Dedication

I want to dedicate this study to my husband, Scott, and my children, Kendra and Abbygail. My family has sacrificed a great deal for me to pursue my doctorate; without their support, this would not have been possible. During weekends, evenings, and family vacations, they allowed me the opportunity to complete homework assignments and work on my study with encouragement and understanding. Over the years, my parents, Bruce and Brenda Pratt, always pushed me to achieve my goals. Not only did they serve as a sounding board for my journey, but they also helped to pay for some of my tuition, books, and fees. I can never repay their kindness.

Acknowledgments

I want to acknowledge my former chair, Dr. Jonathan D. Schultz, who helped guide me along this arduous journey to achieve my doctorate. Your guidance and encouragement have proven invaluable during this chapter of my life. You provided insight and examples from your experience to assist when I was discouraged. Dr. Deborah Nattress, I am grateful for you joining as my second committee member later in the process and offering insight into some positive changes to my final study. Dr. Warren Lesser joined my committee at the end of the journey as my chair, and I appreciated the guidance to the finish line. My university research reviewer, Dr. Lisa Cave, was a bright light and offered invaluable feedback that lent itself to creating a better final product.

Table of Contents

List of Tables	iv
List of Figures	v
Section 1: Foundation of the Study.....	1
Background of the Problem	1
Problem Statement	2
Purpose Statement.....	2
Nature of the Study	2
Research Question	4
Interview Questions	4
Conceptual Framework.....	5
Operational Definitions.....	6
Assumptions, Limitations, and Delimitations.....	7
Assumptions.....	7
Limitations	7
Delimitations.....	8
Significance of the Study	8
Contribution to Business Practice.....	9
Implications for Social Change.....	10
A Review of the Professional and Academic Literature.....	10
Herzberg’s Two-Factor Theory of Motivation	13
Criticism of the Conceptual Framework.....	17

Alternative Theories.....	18
Nursing in Rural Health Settings	24
Lack of Opportunities for Professional Development	28
Compensation and Nonfinancial Incentives	31
Lack of Mentors.....	36
Job Burnout.....	40
Inadequate Support and Relationship With Leadership.....	43
Sense of Place	47
Safety Concerns/Conditions of Facilities.....	49
Transition and Summary.....	51
Section 2: The Project.....	52
Purpose Statement.....	52
Role of the Researcher	52
Participants.....	55
Research Method	57
Research Design.....	59
Population and Sampling	60
Ethical Research.....	63
Data Collection Instruments	64
Data Collection Technique	65
Data Organization Technique	67
Data Analysis	68

Reliability and Validity.....	70
Reliability.....	70
Validity	71
Transition and Summary.....	73
Section 3: Application to Professional Practice and Implications for Change	74
Presentation of the Findings.....	74
Theme 1: Effective Nurse Retention Incentives	76
Theme 2: Meaningful Relationships With Leaders	81
Theme 3: Competitive Advantage Benefits	84
Applications to Professional Practice	88
Recommendations for Action	90
Implications for Social Change.....	92
Recommendations for Further Research.....	93
Reflections	94
Conclusion	95
References.....	96
Appendix A: Interview Questions	128
Appendix B: Interview Protocol	129

List of Tables

Table 1 *Study Participant Roles*..... 75

Table 2 *Effective Nurse Retention Coding from NVIVO*..... 76

List of Figures

Figure 1 <i>Travel Nursing Coding Using NVIVO</i>	79
Figure 2 <i>Meaningful Relationships With Leaders Coding With NVIVO</i>	83
Figure 3 <i>Competitive Advantage Benefits Coding With NVIVO</i>	86

Section 1: Foundation of the Study

Background of the Problem

Nurses are the foundation of the healthcare industry, providing critical care to all patients across healthcare organizations. Nurses provide 80% of the hands-on care in healthcare facilities and serve in healthcare organizations (Mancuso & Davidson, 2020). Retaining qualified nurses is challenging for healthcare leaders because the job causes physical, social, and emotional difficulties leading to increased turnover possibilities (Keyko et al., 2016). The nursing shortage is expected to grow by 1.1 million by 2022, causing further disruptions in care delivery (Spurlock, 2020). Nursing shortages impact healthcare organizations' ability to offer quality healthcare services (Goslee et al., 2020). Nursing shortages pose a more significant issue in rural areas because the resources available to provide patient care are already limited. In addition, rural healthcare leaders face challenges because rural areas are less appealing than metropolitan ones (Hines et al., 2020).

Rural healthcare leaders must develop strategies to retain nurses in their organizations to ensure adequate healthcare is available in their communities. Retaining nursing staff starts before a nurse is hired and should be a continuous process after employment (Ziebert et al., 2016). Smith et al. (2019) identified that nurses play a more critical role in rural settings than in their urban counterparts because they have expanded job duties due to physician shortages that combine with nurse retention challenges. To replace one registered nurse can cost upwards of \$56,000 for a healthcare organization (Colosi, 2020), making it critical to improve nursing turnover.

Problem Statement

In rural health settings, healthcare leaders face challenges in retaining nursing staff, leading to a lack of ability to offer specialized care and serve additional patients (George et al., 2019). Nursing turnover rates in the United States range from 8.8% to 37% depending on the nursing specialization and geographic region (Haddad & Toney-Butler, 2020). The general business problem was that it is difficult for leaders to retain nurses in rural settings, making it challenging to maintain profitability. The specific business problem was that rural healthcare leaders lacked the strategies needed to retain nurses.

Purpose Statement

The purpose of this qualitative multiple case study was to explore the strategies that rural healthcare leaders used to retain nurses. The participants included two charge nurses, four unit/department leaders, and two recruiter/nurse managers from six rural healthcare centers within southern Ohio and West Virginia, who had improved nurses' retention. The positive social impacts of the research findings include the leader's ability to improve nursing retention, decrease the potential for adverse patient events, and improve the healthcare organization's financial performance.

Nature of the Study

Qualitative research is the methodology used when nonnumerical data are collected and analyzed to gain a deeper understanding of a phenomenon (Moalusi, 2020). Researchers conducting a qualitative study use various data collection techniques and analyze the information through a nonstandardized approach, allowing their questions

and procedures to have an interactive and natural response (Saunders et al., 2015). I used the qualitative method to gain a deeper understanding of rural nurse retention through analyzing data collected through semistructured interviews with participants and reviewing relevant supporting documentation. In contrast, quantitative methodology includes numerical data and involves testing a theory about variables' characteristics and/or the relationships among two or more variables (Bloomfield & Fisher, 2019). Quantitative methodology was not ideal for the current study because my research question focused on the strategies that rural healthcare leaders lack and not on variables' characteristics or the relationships among variables. The mixed-methods researcher relies on qualitative and quantitative analysis through analytical methods (Saunders et al., 2015). The mixed-methods approach was not the best fit for my study because the quantitative method was not necessary to address the study's purpose.

For researchers who conduct qualitative research, the most common designs are case studies, ethnography, phenomenology, and narrative inquiry (Cadena, 2019). Researchers use the case study design to investigate issues using multiple data collection techniques, allowing for a more comprehensive picture of the problem studied and providing an answer to the research question (Zahle, 2019). A single case study focuses on one organization, while multiple case designs involve participants from several organizations (Yin, 2018). I used a multiple case study design for the current study to identify and compare experiences to determine the strategies used by rural health leaders to improve retention among nurses. Ethnography is the study of a culture or ethnic population's origins in anthropology (Saunders et al., 2015). The ethnographic design did

not apply to the purpose of my study because it did not involve the culture of rural health leaders. Researchers using the phenomenological design focus on the participants' personal versus business-related experiences and their views of those experiences (Saunders et al., 2015). The phenomenological design was not appropriate for the current study because I did not focus on the meaning of participants' personal lived experiences. In narrative inquiry, the researcher takes the participants' experiences and compiles them into their personal stories rather than examining them through data analytics (Saunders et al., 2015). I did not examine participants' personal stories because it would not have resulted in relevant data to answer the research question; therefore, a narrative inquiry design was not applicable for this study.

Research Question

What strategies do rural healthcare leaders use to retain nurses?

Interview Questions

1. Based on your experience, how does running a rural healthcare facility affect your ability to retain nurses at your organization?
2. What strategies do you utilize to retain an adequate level of nurses in your organization?
3. What strategies has your organization implemented to retain nurses that have not worked, and, based on your experiences, why were they not successful?
4. What were the key barriers to implementing successful strategies for nurse retention?

5. How did you address the key barriers to implementing successful strategies for nurse retention?
6. How did you assess the effectiveness of the strategies for nurse retention?
7. What research does your organization conduct on why a nurse has left the organization?
8. What additional information would you like to share regarding your organization's nurse retention strategies?

Conceptual Framework

Herzberg developed the motivational hygiene theory in the late 1950s (Herzberg et al., 1959). Herzberg's motivational hygiene theory states that motivational factors lead to job satisfaction, and the absence of hygiene factors leads to job dissatisfaction (Johansen et al., 2018). Motivational factors are intrinsic, and hygiene factors are extrinsic (Butt, 2018). Motivating factors are responsibility, recognition of accomplishments, advancement, and the work completed (Johansen et al., 2018). Johansen et al. (2018) further stated that hygiene factors that lead to job dissatisfaction include pay, status at work, working conditions, company policies, supervision, and relationships at work with others.

Nursing is a profession that can involve long hours, high patient workloads, and low wages in rural settings, leading to dissatisfaction. Understanding Herzberg's theory may enable rural healthcare leaders to identify the areas they can address to retain nurses. Herzberg's theory allowed me to identify and understand rural healthcare leaders' strategies to retain nurses.

Operational Definitions

Operational definitions address vital terms used in the study, which may be technical or not clearly defined in everyday language. Understanding the context of the terms used in this study is necessary for the reader to understand their application to the research.

Hygiene factors: The main extrinsic factors that can impact the degree of job dissatisfaction for an employee but not increase or decrease satisfaction, and can include things such as the working conditions, salary, administrative policies of the organization, relationships with peers, and supervision (Alrawahi et al., 2020; Cox, 2019; Herzberg, 1966).

Motivating factors: The intrinsic factors that lead to satisfaction at work, including achievements, recognition, responsibility, and opportunities for work advancement; intrinsic factors must be combined with hygiene factors to lead to work satisfaction (Alrawahi et al., 2020; Cox, 2019; Herzberg, 1966).

Nurse retention: A healthcare organization's ability to engage an employee to continue employment with the company through interventions to increase engagement and commitment to stay in their role and reduce turnover (Khalil & Alameddine, 2020; Labrague et al., 2018).

Nursing shortage: An inadequate supply of nursing staff to meet patient and organizational needs sometimes resulting in an imbalance between life and work demands for nurses and additional responsibilities placed on the current team to provide critical services to the community (Dousin et al., 2020; Keyko et al., 2016).

Turnover intention: A nurse's desire to leave an organization or the field in the foreseeable future (Efendi et al., 2019; Nowrouzi et al., 2016).

Assumptions, Limitations, and Delimitations

This study was conducted to identify rural healthcare leaders' strategies to retain nurses in their healthcare organizations. The study included several assumptions, limitations, and delimitations.

Assumptions

When exploring a topic of interest, researchers have certain assumptions that they believe to be true regarding the information they seek to address (Verma & Abdel-Salam, 2019). Eliminating bias in qualitative research is challenging because the researcher participates in the study, and the assumptions they maintain on the topic can impact the data analysis (Clark & Vealé, 2018). Researchers have qualitative and quantitative data assumptions impacting their research design (Moon et al., 2019). The assumptions surrounding the current study included that participants would be accessible, have the knowledge necessary to contribute to the research topic, discuss their experiences freely, and have experience in rural healthcare leadership and nurse retention practices.

Limitations

Limitations in studies are the areas of potential weakness in the research that are beyond the researcher's control and are associated with the research design used, the statistical model's constraints, or other factors (Theofanidis & Fountouki, 2018). Theofanidis and Fountouki (2018) identified that limitations could impact the study results and the conclusions, so limitations must be clearly defined within the study.

Limitations of my study included the interview instrument used. Participants may have preferred a survey instrument so the data could be anonymous. Leaders' employment agreements could have contained a confidentiality clause prohibiting organizational data sharing. All participants agreed to volunteer information and did not withdraw their participation.

Delimitations

Delimitations in research are the study's components within the researcher's control, such as the objectives, research questions, variables, sample selection, and theoretical or conceptual framework (Theofanidis & Fountouki, 2018). Researchers establish these parameters to ensure the study objectives can be achieved (Theofanidis & Fountouki, 2018). For the current study, the delimitations included the participants selected and the geographic area. Because the research focused on rural health, the geographic location included rural areas of southern Ohio and West Virginia. The results may have varied had participants worked in other states or geographic areas, so generalization is not possible. Additionally, due to the interview questions' sensitive nature, participants may not have been inclined to allow recording of their interview, but all consented.

Significance of the Study

The study has the potential to positively impact rural healthcare organizations through the identification of strategies that leaders may use to improve nurses' retention. Between 2014 and 2024, nurses' needs will continue to increase by 16% (Weaver et al., 2018). As the U.S. population continues to age, rural leaders must be prepared with an

adequate level of nursing staff to meet the demands for care. As life expectancy increases each year, the aging population will continue to strain rural healthcare organizations that do not have an adequate supply of nurses (Stafford & Kuh, 2018). Rural healthcare organizations can improve their capacity and performance by ensuring that nurses care for more patients each day and offer more specialized services to generate additional revenue opportunities. The results of this study may aid leaders in developing new approaches to retaining nurses in rural settings to improve their organizations' performance.

Residents in rural communities find it challenging to locate adequate care for their healthcare needs due to shortages in nurses to assist providers with service provision. According to Caldwell et al. (2016), 65% of rural areas face shortages with insufficient healthcare providers, including nurses. The current study has the potential to benefit rural communities' citizens by improving health outcomes. Improving community citizens' health may increase resources available to invest in the area and sustain or increase tax revenues.

Contribution to Business Practice

Rural healthcare leaders face challenges with ensuring their facility has an adequate supply of nursing staff. In the United States, vacancy rates for registered nurses range between 9% and 17%, 16.7% intend to leave within a year, and 23.8% intend to leave within 3 years (Cao & Chen, 2021). The nursing shortage is an issue identified in rural areas of the United States and globally. The current study results could provide rural healthcare leaders with strategies to improve retention among key nursing staff. Nurses

serve as key employees in the healthcare setting, including nursing homes (Choi et al., 2022). Without an adequate supply of nursing staff, organizations cannot provide the community's care, and health outcomes face increased instances of adverse events (Choi et al., 2022).

Implications for Social Change

Improving nursing staff retention may enable healthcare leaders to reduce overall operating costs and expand the services offered to patients. Nursing shortages will continue to grow if not addressed, and by 2022 the gap could increase by 1.1 million (Spurlock, 2020). Rural healthcare organizations face nursing turnover challenges, and the level of care provided will continue to decline with increased shortages. Continued gains in nursing turnover can lead to adverse patient outcomes and decrease the quality of the care supplied (Majeed & Jamshed, 2020).

A Review of the Professional and Academic Literature

My literature review was conducted to determine rural leaders' strategies to retain nurses. Reviewing the existing literature helped me to determine the research gaps and implications for further research. Rural healthcare leaders must ensure an adequate supply of nurses. Nurse retention impacts the organization's ability to offer quality care, and retention issues can decrease patient satisfaction, patient safety, and the quality of services the organization provides to the community (Gensimore et al., 2020). Retention is affected due to issues within the healthcare organization, such as lack of communication, heavy workloads, lack of autonomy, misalignment of social capital, and burnout (Gensimore et al., 2020). Nursing retention challenges exist globally but are

compounded in rural areas due to an already limited number of nurses working in those areas compared to urban settings (Sellers et al., 2019). The baby boomer population continues to age and retire, making the need for nursing retention critical due to a projected 1.2 million vacancies of registered nurses between 2014 and 2022 (Daniel & Smith, 2018).

The literature review focuses first on the purpose of the review and what resources I used to examine the topic of the study. Exploration of the issue of rural nurse retention in healthcare was completed using the conceptual framework of Herzberg's two-factor theory, including criticism of the approach. The overall nursing problem in rural health settings is reviewed, and the reasons for the challenges affecting nursing retention in rural facilities are discussed. Reasons for nurse retention challenges in rural health include lack of opportunities for professional development, compensation and nonfinancial incentives, lack of mentors, job burnout, inadequate support and relationship with leadership, sense of place, safety concerns, and conditions of facilities.

Completing the study allowed me to determine the strategies that rural healthcare leaders used to combat nursing retention issues. The literature review helped me shape the background of the study and identify the research question. The study addressed what issues impact nursing retention in rural health settings and how those obstacles are overcome in those geographic areas. Yin (2018) discussed how the literature review serves as a way for the researcher to demonstrate their mastery of the subject matter, support the logic behind why the study is needed, and address the research question.

Walden University Library was used to research the topic and provide insight into the literature review. Most articles selected for this study were peer reviewed and published between 2015 and 2022. Articles and books published before 2016 were included in the literature review because they provided a foundation for the conceptual framework and helped me address the research question. The databases used included EBSCOhost, Ovid, Google Scholar, ProQuest, Sage Premier, and Thoreau. The search terms included *nurse retention*, *rural nurse retention*, *Herzberg's motivational theory*, *nursing turnover intention*, and *strategies rural healthcare leaders lack in nurse retention*. Articles were chosen based on their application to the challenges surrounding rural nurse retention and the strategy healthcare leaders in those environments used to prevent nurse turnover intentions. The literature review contained 179 peer-reviewed journal articles published from 2015 to 2022.

Nursing shortages in rural health settings present difficulties in the services that organizations can provide for the community. The health outcomes of rural communities are impacted by having an adequate level of nursing staff to meet the healthcare needs of the residents (Kenny et al., 2021). Nurses are the foundation of rural health organizations, and their desire to continue practicing in rural settings is influenced by the challenges that rural healthcare presents. In rural health settings, nurses must perform additional responsibilities and roles they would not otherwise play in an urban environment. Rural healthcare facilities operate with fewer resources than those in urban settings (Smith et al., 2020). Due to limited resources and challenges with the recruitment and retention of nurses, rural facilities operate with high staff-to-patient ratios (Smith et al., 2020). Those

nurses must take on additional responsibilities to fill the gaps left by an inadequate supply of nursing staff (Smith et al., 2020). Nurses in rural settings must prioritize their care due to time limitations, which can impact the patient's health outcomes because care that is not a priority can be left undone (Smith et al., 2020). There are fewer opportunities for professional development, challenging staffing patterns, and higher workloads for nurses serving in a generalist capacity (Jones et al., 2019).

Herzberg's Two-Factor Theory of Motivation

For the current study, the conceptual framework used was Herzberg's two-factor theory of motivation. The theory was established in 1959 by Herzberg (Herzberg et al., 1959). Herzberg et al. (1959) examined the factors that cause employees to be satisfied or dissatisfied in their role with their current employer and their intent to leave the organization. Motivational factors are intrinsic, and hygiene factors are extrinsic, and both influence a nurse's motivation to stay in their role (Cox, 2019; Herzberg et al., 1959). Herzberg et al. (1959) highlighted how motivating (or intrinsic) factors include responsibility, recognition of accomplishments, advancement, and completed work. Hygiene factors, otherwise known as extrinsic factors, are the items that lead to job dissatisfaction, such as pay, work status, conditions of the work environment, policies of the organization, supervision, and relationships at work with peers and leaders (Herzberg et al., 1959; Johansen et al., 2018). Hasani (2020) discussed how motivation in Herzberg's theory comes from the basic need for survival and aids organizations by having motivated employees to help them through advancement in their career, the daily work, potential for growth, responsibility, recognition of success, and achievement.

According to Herzberg's two-factor theory, hygiene factors can cause employees to become pessimistic and dissatisfied and potentially quit their job (Toytok & Acar, 2021). Motivating factors bind employees to the organization, help them form a sense of connection, and make them happy to work for the company (Toytok & Acar, 2021).

Motivating and hygiene factors must be balanced to impact the overall desire of nurses to continue employment with their organization. Alrawahi et al. (2020) discussed the impact of motivators on an individual's satisfaction in their position, including the ability to advance in their organization, their level of responsibility, and their recognition for job performance. For a nurse to be motivated and satisfied in their job, rural healthcare leaders must learn how to balance the motivating factors with the hygiene factors because employees can simultaneously be satisfied and dissatisfied with their position (Alrawahi et al., 2020). Herzberg highlighted that when nurses feel the work is rewarding, motivating factors other than pay and benefits are essential such as autonomy, respect, and recognition (Curran et al., 2020). Four mechanisms indicate turnover intentions for nurses working in rural areas and include lack of social and personal opportunities in the area, no connection between the decisions that management makes to professional logic, standards of service operations that are challenging to accept, and lack of potential to improve their financial situation (van de Klundert et al., 2018).

For nurses to desire to stay employed in their current organization, rural healthcare leaders must work to ensure they meet nurses' financial needs and help meet their professional and personal goals. Nurses desire involvement in the decision-making process versus a top-down approach. Job satisfaction correlates with how well staff

perform in their role, absenteeism, turnover rates, relationship with coworkers, and physical and mental well-being (Mehrad, 2020). Herzberg's theory is classified as a needs theory in that an individual is motivated in their position by their desire to meet their needs (Yasin et al., 2020). Yasin et al. (2020) further highlighted how working in a rural setting can impact the motivating factors of nurses, such as home community satisfaction, availability of resources in the community, and interpersonal relationships. Motivating factors can aid rural healthcare leaders in retaining an adequate level of qualified nurses.

Items such as patient-to-staff ratios, professional development opportunities, a positive and safe work environment, and financial incentives are types of hygiene factors. Hygiene factors are leading causes of job dissatisfaction among employees (Herzberg, 1966). However, hygiene or extrinsic factors cannot increase or decrease satisfaction, only the employee's degree of dissatisfaction (Alrawahi et al., 2020). Hygiene factors include compensation, interpersonal relationships, working environment, and job stability (K. W. Kang et al., 2021). The need for nurses will grow by 15% between 2016 and 2026 due to the aging population, a focus on preventive care, and an increased population living with chronic medical conditions (Cox, 2019). The need to retain nurses is more pressing given the current shortages and vacancies in the future, so considering the intrinsic and extrinsic factors that enable organizations to retain nurses is critical for rural healthcare organizations to consider for their survival. Researchers found that a nurse's intention to stay was positively impacted by promotional opportunities, a manageable workload, and the work environment (Krishnamoorthy et al., 2020). Researchers

identified that if healthcare organizations work to create a work environment that is safe and positive, create a structured approach to promotional opportunities, and maintain an adequate number of nursing staff to improve patient-to-nurse staffing ratios, they can improve retention (Krishnamoorthy et al., 2020).

In rural healthcare, hygiene factors play a crucial role in the retention of nurses. Rai et al. (2020) found in their study on Herzberg's two-factor theory that to increase motivation among nurses, hygiene factors are critical elements because they improve satisfaction levels. Retaining nurses in rural healthcare settings is vital to ensure that patient care needs are met. When satisfaction improves, so does the opportunity to retain the employee (Rai et al., 2020). Khalil and Alameddine (2020) identified four items that aid organizations in recruiting and retaining healthcare workers in rural and remote settings. Those four items are considered hygiene factors: education, regulation, financial incentives, and professional support. Some financial incentives included housing subsidies, health insurance, tuition reimbursement, and car ownership (Khalil & Alameddine, 2020).

Furthermore, improving primary health centers helped enhance recruitment and retention (Khalil & Alameddine, 2020). Financial incentives are challenging to offer due to the poverty in rural and remote areas (Khalil & Alameddine, 2020). Hygiene factors such as professional support can be a low-cost method of improving retention if leaders can either carve time into their schedule for mentoring or identify someone to assist. The cost of replacing a nurse in healthcare organizations can be a financial burden on any

healthcare provider but is more challenging for rural providers who already experience budgetary constraints.

Schroyer et al. (2020) indicated that organizations might incur between \$82,000 and \$88,000 per registered nurse when turnover occurs. With the high cost of training new nursing staff, the need to retain nurses beyond a year of employment is critical. Nursing is a stressful role, and with a high level of stress placed on them at all times, the level of burnout is high, and nurses will leave organizations at an alarming rate (Schroyer et al., 2020). Edwards-Dandridge et al. (2020) found that nurse turnover intention was impacted by job satisfaction but not work engagement. If leaders focus retention efforts on job satisfaction, the turnover level of registered nurses could decrease. By decreasing the level of turnover of registered nurses, healthcare organizations can provide a higher level of care and better quality, benefiting the community that is accessing their services (Edwards-Dandridge et al., 2020). Using Herzberg's two-factor theory can provide rural healthcare leaders with strategies to reduce turnover in their organizations.

Criticism of the Conceptual Framework

Herzberg's theory has faced criticism as to whether the approach helps to improve motivation and satisfaction for employees. Yousaf (2020) discussed how Herzberg's theory had been criticized because the theory could not explain employee motivation. Further, the original framework of hygiene and motivating factors failed to address motivation and satisfaction (Yousaf, 2020). The job tasks performed carry the most weight on employee satisfaction, and leaders need to focus on their relationships with their employees (Yousaf, 2020). Fareed and Jan (2016) found that other researchers had

proven that Herzberg's two-factor theory cannot be supported except for the area surrounding the work itself, which is supported in the research conducted by Sobaih and Hasanein (2020). Rai et al. (2021) highlighted that Herzberg's theory is correct in some researchers' assumptions regarding motivating and hygiene factors. However, many researchers refuted the claims made by Herzberg regarding the applicability of the approach to improving satisfaction and motivation in employees across all business sectors (Rai et al., 2021). Other researchers investigating Herzberg's theory concluded that their results did not match Herzberg's (Fareed & Jan, 2016). Despite the studies that indicated Herzberg's theory is not applicable, others supported the framework. Herzberg's theory applied to the current study because there was sufficient evidence that the theory applied to nursing retention.

Alternative Theories

Transformational Leadership

An alternative theory to Herzberg's two-factor theory is transformational leadership. Transformational leadership was founded by Burns in 1978 (Northouse, 2019). The original conceptual framework selected for the current study was transformational leadership. After further review of the framework, I determined that Herzberg's two-factor theory was better for analyzing rural nursing retention challenges. A transformational leadership style focuses on the values, ethics, standards, long-range goals, and emotions to help leaders and their followers transform their relationship to help achieve the goals of both the leader and the follower (Northouse, 2019).

Further, transformational leadership focuses on helping followers reach their potential and consists of idealized influence, inspirational motivation, intellectual stimulation, and individualized consideration (Northouse, 2019). According to Chipeta et al. (2016), leaders who use a transformational style can impact retention among nurses, improve their relationships, and improve job satisfaction. Hussain and Khayat (2021) discussed how the use of a transformational leadership style could aid healthcare leaders in improving the commitment of their team members, job satisfaction of medical staff, quality of care provided to patients, and reduction of adverse events. Healthcare leaders can improve organizational performance through an individual approach to transformational leadership (Lauritzen et al., 2021). Identifying how to approach transformational leadership can be challenging because the leader must adapt their style to each follower.

Leaders who use a transformational leadership style must ensure that their team members know the organization's vision to improve the overall satisfaction of the nurses and the culture. Transformational leaders must articulate a clear vision for the organization in conjunction with an individualized approach to help their team reach their full potential (Lauritzen et al., 2021). Healthcare leaders can increase loyalty, create a work environment that encourages enthusiasm among nurses, improve job satisfaction among nurses, and improve retention through a transformational leadership style (Xie et al., 2020). Xie et al. (2020) discussed how transformational leadership improves the organization's culture, thereby increasing nurses' job satisfaction. When the culture and climate of a healthcare organization are appropriate for the nurse, it can lead to

empowerment in their position, which can provide positive outcomes for the organization and the nurse (Trus et al., 2018). Anselmann and Mulder (2020) found that using the transformational leadership style improves the overall performance of nursing teams when the leader fosters a safe work environment. Although a transformational leadership style could be beneficial to research on nursing retention, it was not an ideal fit for the current study given the focus on rural nursing retention. Rural organizations face limited resources and staff, so having the time to dedicate to transformational leadership did not seem appropriate.

Engaged employees are proven to produce at higher levels than those who are not. The use of transformational and transactional leadership has been shown in research to inspire and engage employees (Muddle, 2020). Transformational leadership allows leaders to help shift their team's focus from their own needs to that of the organization (Nurtjahjani et al., 2020). When subordinates focus their attention on the organization's needs, it can help the organization achieve its metrics. Transformational leadership improves communication, helps develop problem-solving initiatives, and leads to higher employee engagement levels that aid the organization with improved patient outcomes (Muddle, 2020). When employees are engaged, they are more likely to produce results for their organization. Transformational leadership can aid rural healthcare leaders with improving communication in their teams, which improves engagement. Rural leaders must work to improve their communication of the vision for the organization to impact the results of their team.

For rural healthcare leaders to be impactful to their organization through transformational leadership, they must exhibit charismatic behaviors while communicating the needs of their followers for the organization to be successful. Broome and Sorenson (2020) highlighted how transformational leadership is not just a style of leadership that a healthcare leader can utilize, but it is a process in which they can help influence their followers by changing how they understand what items are essential to their team. Transformational leaders must commit to their organization and team, be inspiring, have a vision, bring energy to their role, and establish trust to achieve results beyond what is expected (Broome & Sorenson, 2019). Transformational leadership utilizes the Multifactor Leadership Questionnaire (MLQ) created by Bass and can measure the leader's level of transformational leadership (Northouse, 2019). The MLQ did not apply as transformational leadership is not the conceptual framework for this study.

Path-Goal Theory

Path-goal theory is a leadership style that focuses on creating a work environment that supports employees' strengths and resolves their weaknesses. House and Mitchell are two of the founders of the leadership style of path-goal theory in 1974 (Northouse, 2019). Evans, in 1970, and Dessler, in 1974, also discussed the approach in their research on leadership (Northouse, 2019). Path-goal theory addresses follower needs and motivations (Northouse, 2019). The path-goal theory aims to improve performance and satisfaction by focusing on the items that motivate the employees and the nature of the worker's tasks (Northouse, 2019). When leaders utilize path-goal theory, they are directive, supportive,

achievement-oriented, and participative (Mango, 2018). For leaders to effectively utilize path-goal theory, they must create a work environment that will complement the employee's abilities and compensate for their deficiencies (O'Connor et al., 2021).

Nasser et al. (2021) completed a study on path-goal theory and the ability of the conceptual framework to aid organizations in achieving their strategic goals. Nasser et al. (2021) indicate that path-goal theory dictates that leadership falls into 4 styles: guiding pattern, supportive or supportive style, poster style, and achievement-oriented style.

Leaders who practice the path-goal theory style of guiding pattern leadership give their employees clear instructions on how to perform in their role and do not garner their participation in the decision-making process (Nasser et al., 2021). Path-goal theory's supportive or supportive style occurs when leaders treat staff as equals, are friendly, have an easy-going demeanor, and work to support the needs of their followers (Nasser et al., 2021). In their study on the path-goal theory, Nasser et al. (2021) discussed that the third type of leadership is poster style, which occurs when the leader involves their staff in the organization's decision-making process. Finally, the fourth leadership style of path-goal theory is achievement-oriented style (Nasser et al., 2021). The leader will set high expectations for their team and expect them to achieve those results through self-confidence and a focus on performance (Nasser et al., 2021). Leaders must determine what path-goal leadership style to utilize with their staff which is challenging to define to aid their staff with bringing out their strengths and minimizing their deficiencies. Path-goal leadership can aid organizations with achieving their performance metrics but can be challenging to implement due to the time commitment required by the leader.

Path-goal theory is challenging for healthcare leaders to utilize as it relies upon the leader to have sufficient time to meet the needs of each team member and provide direction to help them achieve organizational goals. The issue with path-goal theory is that the leadership style must fit the employee and the work environment to guide the follower down a path to achieving the company's established goals (House & Mitchell, 1974; Rana et al., 2019). Leaders who attempt to offer additional instruction to their employees in highly structured tasks in their role end up negatively impacting the staff's performance outcomes and morale (Rana et al., 2019). Path-goal theory also requires the leader to have time in their workday outside of their regular responsibilities to adapt their leadership style to meet the needs of a specific team member and to continue to help guide them down the correct path to meet organizational goals (Lahiri et al., 2021). Providing the time needed to practice a path-goal leadership style, and provide the support necessary to be effective, can be daunting for the leader (Lahiri et al., 2021). In rural healthcare organizations, leaders complete additional tasks due to staff shortages that limit their ability to devote the time needed to practice a path-goal leadership style. When time and resources are a commodity, path-goal leadership may present additional challenges to the leader and organization and lead to a negative outcome.

In rural nursing leadership, the path-goal theory was not an appropriate fit for the research question. Rural health faces a shortage of resources daily. The leader adapting their leadership style to the employee and work environment to achieve the organization's goals did not support the conceptual framework needed to help address the research question.

Nursing in Rural Health Settings

Healthcare leaders in rural settings experience challenges delivering adequate healthcare services due to nursing shortages. Blouin and Podjasek (2019) discussed the nursing shortage in the United States. Even though nurses are the largest group of providers in healthcare, with 3 million licensed currently to practice, there are still gaps in coverage due to increased demands for their services (Blouin & Podjasek, 2019). Additional strains are being placed on the healthcare system due to an aging population, and rural healthcare leaders must identify strategies to combat the issue so that organizations can meet the government's quality standards and offer services to residents in the communities in which they reside. In rural health settings, nursing shortages play a more critical role as resources are already limited, and nurses play a more significant role than in urban environments in helping to fill the gaps from other provider shortages that are in addition to those of the nurse retention challenges (Smith et al., 2018). As physicians enter the field of medicine, there are decreasing rates of those that select primary healthcare as their practice environment (Barnes et al., 2018). Shortages in physicians practicing in rural health lead to increased burdens on individuals such as nurse practitioners and registered nurses with additional education and training (Barnes et al., 2018).

Having an adequate supply of nurses impacts a rural healthcare organization's ability to offer comprehensive services and impact patient safety. The baby-boomer generation continues to reach retirement age in increasing numbers, and by 2030, 1 million baby-boomer nurses will have retired from the field (Sofer, 2018). These

retirements will exacerbate the shortages in nurses and take with them years of experience and knowledge in the field.

The baby boomers will equate to over 70 million Americans who will be over the age of 65 and require a higher severity of healthcare than they previously have needed (Sofer, 2018). Regions of the United States, such as the Pacific and New England, have had zero growth in nurses, whereas the East and the West have increased by over 40% (Fields et al., 2018). Although some areas have grown in the profession, rural areas continue to struggle.

The risk of adverse events due to nursing shortages is a global issue that will only increase as the population ages and increases access to healthcare services. Nursing shortages lead to additional challenges in providing healthcare as it impacts the ability of organizations to offer specialized services to meet the needs of the community (Marcé et al., 2019). Shortages in nurses affect healthcare organizations in the United States, but it is a global issue that needs to be addressed through changes in world health policies (Marcé et al., 2019). Rural leaders experience issues with improving access to care, an aging population, retention of services in the community, and retention of healthcare staff to provide the services (Anolak et al., 2018). Nurses working in rural settings must offer a vast range of services and have more general knowledge than those in urban environments, as there are specialist providers who do those services in urban practice.

In contrast, in rural health, they do not have the resources to do so (Anolak et al., 2018). There is a strong correlation between having adequate nursing staff and the health outcomes of the patients that organizations treat (Park & Yu, 2019). Qualitative and

quantitative factors impact the quality of healthcare provided (Park & Yu, 2019). Park and Yu (2019) discuss how the qualitative aspects are the proper placement of nursing staff, job satisfaction, education of nurses, and career length of the nursing staff that impact health outcomes and help maintain a nursing staff to meet patient and organizational needs. The quantitative factors are the nurse to patient staffing ratios (Park & Yu, 2019). Park and Yu (2019) found that a multi-dimensional approach was best suited for addressing the challenges around nurse shortages globally. Healthcare organizations must work with government agencies to make impactful policy changes to improve nursing retention efforts (Park & Yu, 2019). Nursing retention in rural health settings is a challenge beyond the United States. Rural healthcare leaders must use a combination of qualitative and quantitative factors as a strategy to improve nursing retention.

Retaining healthcare workers in rural and remote settings is challenging, and healthcare leaders must develop solutions that solve the immediate need of improving retention but provide solutions that continue to combat the issue. Kartika (2018) explored three questions surrounding the retention of healthcare workers in rural and remote areas. Those questions were what boundaries exist for workers to stay and work in rural and remote settings, what factors encourage them to want to stay and work in those areas, and what current policies are related to the retention of healthcare employees that are likely to be successful. Long-term solutions are needed to prevent further issues surrounding the retention of healthcare employees in rural and remote settings (Kartika, 2018). Six strategies aid healthcare organizations with retaining staff and consist of providing

adequate financial incentives, offering opportunities for career and professional development, recruiting students that are from rural areas, improving the working conditions, working on living conditions, and strengthening the role that the local government plays with the central government (Kartika, 2018). Retaining nursing staff in rural health settings relies on healthcare leaders to improve the financial offerings to their nurses and improve the overall community to entice existing residents to pursue a career in nursing.

Rural healthcare leaders must identify strategies to improve nurse retention as the need will continue to grow and impact the health outcomes of the community members they serve. Spurlock (2020) discussed that the need for nurses will only continue to grow, and by 2022 there will be a shortage of 1.1 million vital healthcare workers. There is a moral obligation and a duty to patients living in rural health settings to ensure that there are nurses to treat their needs. Individuals living in rural communities should not face potential adverse health outcomes due to a lack of access to care. LaSala (2017) examined how nurses' distribution in rural and urban settings impacts the recruitment and retention of nursing staff. In nursing, there is an inequitable distribution of healthcare workers to meet the community's needs. Some areas have too many nursing staff, and others with gaps in coverage (LaSala, 2017). Part of the challenge healthcare leaders face in urban and rural environments is that knowing the staffing needs at any given time can be challenging. Although there are formulas to help calculate staffing ratios, they are not foolproof (LaSala, 2017). The nursing shortage is exacerbated by an aging population and increased home care and ambulatory services (LaSala, 2017).

Rural healthcare is not attractive to nurses who reside outside the geographic area. LaSala (2017) indicated that it is more challenging for small, rural hospitals as they have higher nurse vacancy rates than large hospitals. Alluhidan et al. (2020) discussed how nursing shortages in rural settings are due to poor living and working conditions compared to urban environments. If the nurse is not from a rural or remote area, it can deter them from their desire to work in such settings (Alluhidan et al., 2020). Working in a rural health setting is not attractive to nurses that reside in other geographic areas as the salaries are not adequate to help cover their cost of living, housing is inadequate, opportunities for continuing education are reduced, and there are fewer opportunities for spouses and significant others to identify work opportunities (Alluhidan et al., 2020). Rural healthcare leaders must develop strategies to retain nurses within rural organizations to prevent further disruptions to care provision through nurses leaving rural settings for opportunities in urban environments.

Lack of Opportunities for Professional Development

Nurses must have opportunities for professional development to keep their skills and knowledge current. Continuing education is a predictor of job satisfaction for nurses working in rural hospitals as they lack confidence in their professional skills (Smith et al., 2019). Allowing opportunities for professional development is a critical component to nurses ensuring they are knowledgeable and keep their skills up to date on new treatment methods (Mlambo et al., 2021). Nurses require access to continuing education opportunities to improve their performance in their job, which can decrease mortality rates and improve the health outcomes of the population they serve (Bendezu-Quispe et

al., 2020). In addition, the continuing education opportunities provided to nurses should be reflective of the environment in which they practice, so those working in remote settings should have training catered to the specific needs of that population (Bendezu-Quispe et al., 2020). The culture of a healthcare organization can determine the extent of opportunities available for professional development for nurses. Nurses need the organization's and leader's support and a culture that supports continued professional development that meets the healthcare organization's needs and that of the nurses (Mlambo et al., 2021). Offering professional development opportunities is critical but can be a challenge. The study by Mlbamo et al. (2021) found that nurses list the barriers to continued professional development as inadequate staffing levels, heavy workloads, lack of funding available for professional development, inability to find time to study, lack of relevant continuing education programs, and a culture that does not support continuing professional development. Ju and Li (2019) found in their study on employee training and turnover intentions that offering both on the job and off the job training helps improve the effectiveness of individuals and teams. Training opportunities are crucial as the inability to provide continued education will result in those focused on their careers looking for new job opportunities that offer the ability to further their skills through training (Ju & Li, 2019). Nurses must have opportunities for professional development opportunities that cater to the specific type of nursing they practice. When nurses do not have opportunities to continue their education, it can lead to adverse outcomes for the patient population they treat and turnover potential.

Retention of nurses in rural healthcare presents challenges as there is various economic, cultural, and overall lack of opportunities available for nurses practicing in a rural environment. Continuing education allows rural healthcare companies to improve retention as it allows the nurses to continue to develop their skills and professional network. Nurses must be provided opportunities for continued professional development to ensure they can practice safely, be competent, and deliver patient-centered care (Baloyi & Jarvis, 2020). In rural health settings, it can be challenging to provide opportunities for face to face continuing education for nurses due to the unique challenges the areas present, but such instruction is crucial access need to help improve the health outcomes of the communities in which they serve (Baloyi & Jarvis, 2020). Nurses' ability to continue developing their skills and to have opportunities for personal growth is one method that healthcare leaders can utilize to combat nursing retention challenges (Tang et al., 2019). Nurses in rural and remote Canada desire healthcare organizations to implement items such as continuing education programs to help reduce turnover intentions (Stewart et al., 2020). If nurses are provided career and educational advancement opportunities, then there is a chance that the organization will retain the nurse (Nowrouzi et al., 2016). Rural healthcare leaders experience unique challenges due to socioeconomic factors; the area's culture, political concerns, isolation, workload, and time constraints all impact the ability of rural nurses to receive adequate continued professional development (Lima et al., 2020). Zapata et al. (2020) examined the recommendations of the World Health Organization (WHO) and the sixteen policy changes they recommend combatting nursing retention difficulties, and professional and

personal support is one area of suggested changes to positively impact retention levels. Professional and career development opportunities influence nurses' desire to stay within their current organization and include proper training opportunities (Bharath, 2021). Continuing education impacts retention among nurses in rural areas. Nurses in rural settings operate in a generalist capacity, limiting the amount of time and resources available to complete training opportunities.

Compensation and Nonfinancial Incentives

Compensation is thought to be the primary driver of retention challenges in nursing staff in rural communities, but it is only a small part of rural healthcare leaders' obstacles in keeping nurses in their facilities. Dousin et al. (2020) completed a study on nurse retention in rural areas of Malaysia and found that money was not the main factor in the intention of nurses to stay, but high workloads, lack of career opportunities, and inadequate compensation all played a role. The study results indicated that nurses found the balance between their work and personal life was not equitable, and due to shortages, they had to work extended hours. Due to the extended hours required, their pay does not equal their effort and time commitment (Dousin et al., 2020). The nurse to patient workload in Malaysia would sometimes require them to treat 50 patients a shift, while their counterparts in Saudi and Australia would see between 10-12 for better wages (Dousin et al., 2020).

Compensation is not a key driver in nurse turnover. Wakerman et al. (2019) found that compensation is not the sole reason nurses leave their current employment, but interpersonal relationships with their coworkers and management are a vital determinant

of a nurse's desire to stay in place. In addition, offering incentives, including retention bonuses, can help healthcare leaders improve retention and avoid utilizing contract nurses, burdening healthcare organizations financially (Wakerman et al., 2019). Incentive programs are a global method to combat challenges with rural nursing shortages (Soherwardy & Crouch, 2020). Soherwardy and Crouch (2020) found that loan forgiveness programs, family considerations, lifestyle accommodations, and guaranteed income help attract healthcare professionals to work in rural health as well as a background or connection to rural areas. Okereke et al. (2021) completed a study on rural nursing retention for those working in primary healthcare within Nigeria. 51.8% of study participants have received some form of a financial incentive to work in rural health, such as stipends for additional job duties such as immunization clinics, loans, a per diem rate for attending conferences and training, and a rural posting allowance (Okereke et al., 2021). However, the nurses state it is not enough, and they also have to perform other jobs such as farming, home birth attendants, and patent medicine vendors to supplement their income (Okereke et al., 2021). Nurses in rural areas seek incentives to continue employment in rural healthcare organizations. The rural nurses have turnover as leaders provide inadequate compensation and lack opportunities for professional development. Nurses working in rural areas have to work in other positions to support themselves and their families, so rural healthcare leaders must address their needs to improve retention.

Relationships with team members and the community can impact patient care and help improve nurse retention. The healthcare organization's environment is critical to ensuring that nurses feel safe in their organization and job duties. The components of

rural health practice that leaders need to focus on to attract nursing students include clinical, managerial, practical, fiscal, familial, and geographical aspects (Terry et al., 2021). Of the items that rural healthcare leaders need to focus on, the clinical aspects are the most important to attract nurses to rural health include items such as the relationship between the nurses and other medical staff, an expectation of an emphasis on quality and clinical care provided to patients, and the morale of the work environment and stability (Terry et al., 2020). Nurse retention and attracting nurses to rural health is critical, and leaders must take an overall approach to non financial incentives to improve the likelihood of nurses staying employed and attracting new ones to the geographic area.

Nurses in rural health settings practice in a generalist capacity, and pay is not aligned with their job responsibilities but is not the sole factor in nursing retention. In rural areas of Malawi, Berman et al. (2021) found that study participants were .67 times as likely to choose a position in a rural practice setting when the pay is increased by 50% compared to an offer in an urban environment. As the percentage of the salary increases, so does the individual's chance of selecting a rural position over an urban setting (Berman et al., 2021). In addition, housing and the facilities' condition impact the nurses' decision to choose rural health settings to practice (Berman et al., 2021). Healthcare leaders can positively impact retention in rural settings through financial incentives and other strategies, such as providing professional and personal development opportunities (Behera et al., 2019). A source of dissatisfaction for nurses in any setting is that their pay is not aligned with the job responsibilities performed or the workload (Umamaheswari et al., 2021). Umamaheswari et al. (2021) also found in their study that job performance is

positively impacted by compensation and job satisfaction. Nurses must be compensated for the work they perform if healthcare leaders want to retain these crucial employees. Rural healthcare leaders face challenges in being competitive with their urban counterparts in attracting and retaining nurses as they do not have the resources to offer financial and nonfinancial incentives like healthcare organizations in urban areas can provide (Sirili & Simba, 2021). Part of the challenge in delivering rural health services is that there is a limited pool of patients and staff to meet the needs of the community, and there are preconceived ideas about life in rural settings such as fewer opportunities, less access, and less to offer to make it challenging to attract healthcare professionals to work in those areas (George et al., 2019). Compensation is a part of the necessary changes to improve the retention of nurses in rural settings, but it is not the sole method to bring change.

The use of nonfinancial incentives allows rural healthcare leaders to improve overall satisfaction and the desire of a nurse to continue employment. Nonfinancial incentives can improve the likelihood of a nurse staying employed with an organization (Krishnamoorthy et al., 2020). Rural health leaders can utilize nonfinancial incentives to improve healthcare service quality, reduce turnover, and address performance issues (Krishnamoorthy et al., 2020). Healthcare leaders must cater their nonfinancial incentive programs to their staff as what can be impactful can vary from organization to organization. The nurse's intention to stay was positively impacted by promotional opportunities, a manageable workload, and a work environment (Krishnamoorthy et al., 2020). Researchers identified that if healthcare organizations work to create a work

environment that is safe and positive, create a structured approach to promotional opportunities, and maintain an adequate number of nursing staff to improve patient to nurse staffing ratios, they can improve retention (Krishnamoorthy et al., 2020). Dobre et al. (2017) found that financial incentives are not the only way to impact the motivation of employees, and leaders need to identify which nonfinancial incentives would work in combination with financial ones.

Stakeholders, including rural healthcare leaders, government officials, donors, funders, and public employment agencies, need to work together to develop compensation programs to retain nursing staff (World Health Organization, 2020). Rural communities that welcome outside healthcare providers choosing to work in rural health is a role that the communities must take on (Sirili et al., 2021). The community can foster a good relationship to retain healthcare workers in rural health settings by being welcoming to new residents of the community, linking the workers to others in the community, placing a high value on healthcare workers choosing to practice in rural health settings, and working together to resolve challenges in the facilities and with the workforce (Sirili et al., 2021). Choosing which financial and nonfinancial incentives to provide to entice workers to practice and remain working in rural health can be difficult for rural healthcare leaders to identify (Gadsen et al., 2021). Nonfinancial incentives such as opportunities for professional development, a balance between work and personal life, improvements in the work environment, ability to practice autonomously are all proven means to have a positive impact on not only helping rural healthcare organizations help recruit staff but also retain them as well (Hines et al., 2020). Rural healthcare leaders

must work to meet all of the needs of the nurses to retain them. Nonfinancial incentives, when paired with an equitable work and personal life balance, help shape a positive culture and help improve the retention of nurses in rural settings. Opportunities for professional development are crucial to ensure that the nurse's skill set is current and helps to increase satisfaction. The type of nonfinancial incentives offered by rural healthcare organizations will vary based on the wants and needs of the nurses in each healthcare facility. In some organizations, the ability of the organization to offer professional development opportunities may be impactful in improving both recruitment and retention initiatives. Offering a work life balance that allows for a life outside the healthcare organization can help improve nurse retention. A combination of financial and nonfinancial incentives offers an ideal scenario for aiding rural healthcare leaders in improving the retention of nurses.

Lack of Mentors

Mentorship programs for nurses help to improve their connection with the organization and their coworkers leading to improved retention. Schroyer et al. (2020) completed a study on how to increase retention with registered nurses by utilizing a mentor to aid them in their new careers. Over 581,000 registered nurse positions will be created and place additional strains on healthcare organizations' hiring needs (Schroyer et al., 2020). With the high cost of training new nursing staff, the need to retain nurses beyond a year of employment is critical. Nursing shortages, and the need for mentors, impact all areas of nursing, such as the floor and management. Nurses with clinical experience entering into teaching roles may not have the skills to be effective nurse

educators (Sodidi & Jardien-Baboo, 2020). Nurses who enter new healthcare roles lack direction and confidence in their new position (Sodidi & Jardien-Baboo, 2020).

Mentoring a peer is not beneficial as both lack experience, leading to a need for mentors to mentor new staff (Sodidi & Jardien-Baboo, 2020). Nursing is a stressful role, and with a high level of stress placed on them at all times, the level of burnout is high, and nurses will leave organizations at an alarming rate (Schroyer et al., 2020). Mentors help provide a role model and discuss challenges that may lead a new nurse to leave an organization (Schroyer et al., 2020). Schroyer et al. (2020) indicate that it can cost an organization between \$82,000 to \$88,000 per registered nurse when turnover occurs. By implementing a mentorship program, the retention rate can increase by 25% more than those who do not participate in a mentoring program (Schroyer et al., 2020). Also, implementing a mentoring program helped improve morale and reduce training costs (Schroyer et al., 2020). Stewart et al. (2020) stated that mentoring programs need to be established to help meet the needs of nurses and improve retention. Mentoring programs can aid rural healthcare leaders in assisting nurses in developing relationships with their peers and helping to strengthen a sense of belonging and the ability to retain nurses.

Nurses' intent to leave their current position is a concern for rural healthcare leaders as they are already experiencing a shortage of nurses. According to Stewart et al. (2020), in their study on nursing retention, one in four registered nurses and nurse practitioners expressed an intent to leave their organization in the next year, and 22.2% of LPNs. With a current nursing shortage, rural healthcare organizations cannot afford to lose additional staff. New nurses practicing in rural and remote settings need to be

supported but also challenged, require assistance in developing their skills, support that changes as the nurse evolves in her role, a structured, tiered transition program, human resources policies that support rural and remote employment needs, and employment opportunities versus professional development (Calleja et al., 2019).

Clinical rotations can play a role in exposing nursing students to opportunities in healthcare that they may not realize exist. The operating room is a primary driver of a hospital's financial success, and in rural settings, that could mean being able to continue to provide services to the community they serve. It can take approximately one year and close mentoring of a seasoned perioperative nurse manager to orient a new employee (Doyle, 2018). The cost to replace a nurse with experience in a specialty can exceed \$64,000 (Laflamme et al., 2019). The operating room can generate up to 60% of its overall revenue in many healthcare organizations, so it is critical to have appropriately trained perioperative nurses and managers (Doyle, 2018). For rural health organizations, experiencing costs incurred to replace a surgical nurse and potentially not offer surgical care can be detrimental to the operations of a rural facility. Follow up and support of new nurses can aid managers and leaders in identifying those ideal for entering perioperative nursing and mentoring them to become managers (Doyle, 2018). In a rural hospital, offering surgical services could impact their ability to continue serving the public and keeping their doors open, so keeping an adequate supply of perioperative nurses on staff is vital. Rural healthcare leaders can impact the retention of surgical nurses by working to improve the interpersonal relationship between the nurse, their coworkers, and the overall healthcare team. Partnering with institutions that train nurses for clinical rotations can

expose nursing students to opportunities in the operating room and help identify mentors for new nurses entering the field.

A study completed by Rohatinsky & Jahner (2016) indicated that for nurses to be effectively recruited and retained in rural health settings, the leader must align mentors with building relationships and developing a sense of trust. Rohatinsky and Jahner (2016) indicated that barriers to mentorship programs in rural healthcare organizations included low staffing numbers, a limited selection of potential mentors, and a lack of mentor training.

Rohatinsky and Jahner's (2016) study participants indicated that sometimes their job requires them to operate outside of their scope of training and experience, causing concerns for continued employment in rural settings. Mentorship programs are critical in rural health settings as recruiting and retaining nurses is challenging due to the need for nurses to work in a generalist capacity, staffing challenges, lack of resources, and limited support from the community (Rohatinsky et al., 2020). Implementing a mentorship program that is specific to rural health needs and challenges can help to transition nurses to working in a rural setting and dealing with the intricacies of practicing in those geographic areas, strengthening their ties to the community, and encouraging recruitment and retention (Rohatinsky et al., 2020). Nurses entering practice in rural health need the support of their leader, mentor, and teammates to make a successful transition. Critical components of a rural mentorship should focus on connection, communication, and support (Rohatinsky et al., 2020). In the context of a rural specific mentorship program, mentees form relationships with their mentor, the organization, colleagues, and the

community (Rohatinsky et al., 2020). Rohatinsky et al. (2020) discuss how communication includes all communication between the mentee and the mentor, coordinators of the mentorship program, and future communication on the program. The support provided in the rural mentorship program is the professional and interpersonal assistance given to the mentee from the mentor and management in the organization (Rohatinsky et al., 2020). For nurses entering practice or those moving into a new setting, it is critical to have a mentor to provide support and ease the transition for the nurse. Nursing is a challenging position with the role's responsibilities, and having support from a mentor can aid with connection and retention.

Job Burnout

In healthcare organizations, nurses are the most crucial team member of the facility and even more so in rural settings. Job burnout occurs in nursing due to inadequate distribution of nurses to patients, increased workload, conflict in the values of the nurse and the organization, scarce resources, poor feedback and support from management, and the exclusion of their role in making decisions that impact the organization and their position (Hailay et al., 2020). Nurses are patients' primary point of contact, and burnout can include emotional exhaustion with fatigue and frustration, a low sense of personal accomplishment, and depersonalization (Hailay et al., 2020). Nurses who work in rural healthcare tackle additional job responsibilities due to an overall shortage of healthcare providers practicing in rural settings. Burnout in nursing occurs when nurses experience emotional exhaustion, anxiety, and feelings of less personal accomplishment that are easy to identify by the age group, work location, and seniority

the nurse holds in the organization (Cook et al., 2021). Rural healthcare leaders must take action to help nurses learn coping mechanisms to deal with the issues surrounding burnout, as it can lead to adverse health outcomes for the facility's patients (Cook et al., 2021). Having adequate social and family support can aid nurses in improving their anxiety and emotional exhaustion (Cook et al., 2021). Over half of the world lives in a rurally designated area but only employs 38% of the nursing workforce and 24% of physicians (Smith et al., 2019). Nurses play a more crucial role in areas with a physician shortage than in urban settings, as they must take on additional responsibilities to serve the patient population (Smith et al., 2019). When nursing staff experience job burnout, it impacts the entire healthcare organization and those they serve. Those nurses experiencing job burnout have lower job commitment, decreased work performance, and higher turnover intentions than those not experiencing burnout in their role (Xu et al., 2020). Shortages in healthcare staff, increased patient access to care, and increased job duties due to changes brought on by healthcare reform have all increased the level of job burnout among healthcare professionals (Xu et al., 2020). Burnout among nurses impacts the nurse, the patients they treat, and their employers. In rural health, burnout is common as there is limited staff, so they must take on other duties that more than one individual may perform in an urban setting.

Job burnout can occur in nurses due to the increasing demands placed on their position due to increased access to care and overall staffing shortages in healthcare. In rural settings, nurses take on a generalist approach due to a lack of resources, which leads to frustration (Jones et al., 2019). Liu et al. (2020) found that nurses experience

occupational burnout in eight countries. Occupational burnout causes stress and depression for nurses, can lead to adverse health outcomes for patients, impact the mental and physical health of the nursing staff, and impact the services provided by their organization (Liu et al., 2020). There is an inequity of nursing staff, including midwives, between urban and rural areas in the Democratic Republic of Congo, causing challenges with maternal and newborn mortality rates (Baba et al., 2020). Due to physicians' inadequate levels, there are additional gaps in care (Baba et al., 2020). The study results by Baba et al. (2020) found that although organizations know how to improve midwives' recruitment and retention, they fail to execute the plan. Enhancing the living and working conditions, increasing financial incentives, rural placement allowances, and registration of health workers help improve midwives' recruitment and retention but continue not to be implemented or poorly executed (Baba et al., 2020). Rural areas face a challenge as a maldistribution of nurse-midwives between urban and rural areas, causing even more significant service provision challenges (Baba et al., 2020). One method of retention indicated by the study from Baba et al. (2020) showed that if nurse-midwives who work in rural areas marry someone local, there is an increased chance of them staying within the community and not leaving better opportunities. Shortages in all healthcare positions lead to increased workloads for nursing staff. Rural healthcare leaders may plan ways to improve the retention of nurses but fail to execute the plan to impact retention. Offering financial and nonfinancial incentives help to improve retention, but the connection in the community is a crucial driver, such as marrying someone local.

Allowing nurses to voice their opinions in rural healthcare organizations can improve burnout and retention. Al Sabei et al. (2020) examined the role of job satisfaction on the relationship between work environment and job satisfaction among nurses in Oman to determine their intentions to leave the field or organization. Burnout among nurses is a global issue that leads to high turnover, impacting the quality of patient care (Al Sabei et al., 2020). Listening to nurses' ideas on operations can improve burnout and retention of rural health nurses. Al Sabei et al. (2020) identified that when nurses are involved in hospital affairs and have adequate staffing levels, perceived quality of care improves and improves burnout and turnover intention. According to a study completed by Zhang et al. (2019), new nursing graduates who have entered the profession leave in droves, with 17.5% leaving the field within their first year of employment. With the existing nursing shortages, rural healthcare organizations cannot afford to lose additional staff due to high levels of burnout, as it will lead to inequity of nurses to meet the demands of the healthcare system.

Inadequate Support and Relationship With Leadership

Having a positive relationship with their leaders is crucial to preventing nursing turnover. Adequate support from the administration is one of the strongest predictors of job satisfaction among those in a nurse manager role (Cox, 2019). A nurse's intent to stay with an organization depends on job satisfaction, commitment to the organization, quality of their work-life, work environment, leadership style, bullying, family reasons, and job security (Al Zamel et al., 2020). A nurse's positive relationship with their leader is a way to improve retention and decrease the possibility of a nurse turnover in their role. When

nurses have a sense of belonging and connection to an organization, it can positively impact retention, but that cannot occur when their relationship with leadership is negative or nonexistent. Nurses' relationship with their rural healthcare leaders can influence their desire to continue employment and negatively impacts turnover. The support received from leadership affects the ability to retain new nurses entering the field, as leaders lack the skills necessary to be effective (Collard et al., 2020). Nursing retention is a challenge across all healthcare providers and is a global issue. New nurses entering rural health practice desire to be involved in the decision making process (Terry et al., 2021). The leadership style practiced by the rural leader can impact the relationship they have with their team and the ability of the nurses to feel they can share what they feel can change the culture and environment of the organization in a positive direction. New nurses want to contribute by making decisions on equipment, organizational processes, and technology selection, which is critical in their decision to work in a rural health setting (Terry et al., 2021).

Home healthcare presents unique challenges to nursing retention as they often see patients in the field. In the home healthcare setting, nurses leave the field at an alarming rate causing high levels of turnover (Garza & Taliaferro, 2021). One of the causes of nurse turnover is leadership, as they impact job satisfaction for their staff (Garza & Taliaferro, 2021). Nurses who did not receive adequate support indicated they were overwhelmed, unhappy, and hostile toward their position (Garza & Taliaferro, 2021). The nurses who indicated their leader supported them in the study by Garza and Taliaferro (2021) expressed that they were happy and optimistic about their role and the teamwork

in their organization. Providing support and identifying why nurses desire to leave home healthcare is critical to reducing turnover.

Communication and leadership style play a role in the retention of nurses in rural settings. The leadership style of management also plays a role in turnover intention (Fontes et al., 2019). Employees who worked within a private healthcare institution were negatively associated with moderate turnover intention (Fontes et al., 2019). If nurses held more than one job and had a leader who practiced a low relationship-oriented leadership style, nurses positively associate workplace and personal bullying (Fontes et al., 2019). Relationship oriented leadership positively correlates with nursing turnover and satisfaction (McKay et al., 2018). Nurses who have a leader who communicates and practices a leadership style desirable to the nurse are more inclined to continue employment. A high level of turnover intention was indicated in nurses that worked for the facility between 5-10 years and had a low relationship oriented leadership style of their leader (Fontes et al., 2019). As the length of employment increases, if healthcare leaders do not practice a relational leadership style, turnover intention increases. A moderate level of turnover intention was found in those with a bachelor's degree, who worked in a philanthropic institution, and who had a low relationship-oriented style (Fontes et al., 2019).

Nurses' relationship with their leaders impacts their desire to stay with the organization. The nurse stays in their role due to their relationship with their managers (Steele-Moses, 2021). If the nurse manager steps in to help when the unit is busy, respects their contributions, and makes time for them, they feel valued. Coustas (2019)

identified that relationships with management, and management challenges, impact nurse retention in rural areas within South Africa. Although the study by Coustas (2019) focused on South Africa, the same challenges exist in rural areas within the United States and other countries. Healthcare leaders can develop a vision for the organization that will benefit the institution and the employees, but they fail to communicate that vision and strategy to their team (Fletcher et al., 2019). Challenges with communication from leaders can cause additional obstacles in nursing staff relationships and lead to turnover. Turnover places a strain on already challenged rural areas and countries as the current worker to patient load is at levels that are not conducive to meeting the population's needs (Girma et al., 2021). Millennial nurses have different perspectives and requirements than those before them, so leaders need to explore how to cater to their desires (Tyndall et al., 2019). The average age of nurses is lowering as more nurses retire, and new graduates enter the field. In 2013, nurses' average age was 50, which moved to 48 in 2015 (Tyndall et al., 2019). Rural healthcare leaders need to cater their communication and leadership style to meet the needs of the team they are working with to improve their relationship with their team.

Communication and nurses' relationship with their superiors impacts their satisfaction and job performance. Nurses leave their positions due to a lack of support from management and other supervisors, such as the head nurse (Marufu et al., 2021). Healthcare leaders, including nursing leadership, who have an ineffective leadership style and do not show appreciation for their nursing staff impact the desire for nurses to stay employed (Marufu et al., 2021). Marufu et al. (2021) discussed how a lack of

communication by leaders on organizational changes impacts the satisfaction of the nursing staff and can negatively impact turnover. Nurses' relationship with leadership affects their job satisfaction, retention, provides intrinsic motivation to meet safety goals, and performance (Campbell et al., 2021). Building a rapport with their nurses can aid rural healthcare leaders in improving their relationships, thereby positively impacting retention and helping nurses develop a sense of place with the organization.

Sense of Place

Sense of place impacts nursing retention as it helps the nurses feel connected to their place of employment. Malatzky et al. (2020) explored how inadequate staffing in nursing levels leads to health disparities for patients in rural versus metropolitan settings. Employees who feel connected to their place of employment are less likely to leave their organization. Countries like Canada and Australia face challenges due to their geographic landscape making recruitment and retention difficult and replacing nurses high due to the remote areas with indirect costs of not providing quality and effective care (Malatzky et al., 2020). A sense of place is when an employee develops a relationship with their work (Malatzky et al., 2020). According to Malatzky et al. (2020), belonging in place is when employees establish a connection to the organization from the social interactions they have encountered while employed. Developing close interpersonal relationships with peers and management plays a role in helping to create connections in the community and the organization. The final factor Malatzky et al. (2020) identified that can help improve nursing staff retention in rural settings is place attachment. Place attachment is an emotional bond employees have with their employers on the individual and community

levels (Malatzky et al., 2020). An attachment to a place of employment helps nurses feel important to their organization and emotionally bonds them to their team and company. Recruitment and retention of nurses are challenging in the existing environment, but developing a sense of place can improve the ability to attract new talent and decrease turnover.

A rural healthcare organization can retain nurses when the organization and the community where the nurses live and work are welcoming and provide opportunities for social connection. Nurses working in rural health facilities find satisfaction in their role when they have not only a sense of belonging to the town that they reside and work within but also in the ability of the town to meet their personal aspirations and that of their family (Cosgrave, 2020). Cosgrave (2020) indicated that when nurses first begin working and living in a rural area, they feel alienated and disconnected from their social life if they are newcomers. However, feelings of a sense of belonging begin to increase in rural nurses the longer they work and live in those geographic settings (Cosgrave, 2020). Developing social connections with the community and coworkers aids those not from a rural upbringing develop a sense of place in their organization (Beccaria et al., 2021). The turnover intention of nurses is present when they experience low levels of organizational commitment (Wubetie et al., 2020). The low level of commitment leads to a low sense of belonging and increases the potential of the nurse to have an intent to turnover in their role (Wubetie et al., 2020). Individuals not from a rural area can face challenges when moving from an urban to a rural area. Establishing relationships with coworkers and others in the community help to create a sense of belonging that can

improve the chances of a rural organization retaining the nurse. Rural healthcare leaders can help develop personal relationships for new nurses in their rural organization and community and improve feelings of alienation for the employee and their family members.

Safety Concerns/Conditions of Facilities

Nurses face safety concerns that are not only physical but mental as well due to the patients and traumas they observe in their role. Due to limited staffing numbers, nurses are at a higher risk for incidents in rural healthcare facilities than their urban counterparts. Jahner et al. (2020) take on a new approach to examining the challenges with nurse retention in rural health settings. Jahner et al. (2020) focused on the exposure that nurses in rural settings face as they are exposed to traumatic events more frequently than those in urban environments due to the lack of adequate staffing to meet the demand for care. Results found that of the 3,822 participants, 32% reported that they had experienced a traumatic event in the last two years, and 65% stated that they did not receive the support they needed from the administration after the event (Jahner et al., 2020). Exposure to such events leaves the nurses feeling unsafe, anxious, and vulnerable (Jahner et al., 2020). Three themes were identified: rural/remote nurses' experiences of distressing incidents, experiencing or witnessing severe violence or aggression, and failure to rescue or protect patients or clients (Jahner et al., 2020). Jahner et al. (2020) stated that three themes were identified for the nurses' perception of their support. The three themes identified included: feeling well supported in the work setting with debriefing and reliance on informal peer support, lack of acknowledgment and support

from leaders on the nature and impact of distressing events, and barriers influencing access to adequate mental health services in rural/remote settings (Jahner et al., 2020). Leaders of rural healthcare organizations do not understand the need for nurses to feel supported in their work environment.

Coustas (2019) found that nurses who trained in countries with large rural areas, such as South Africa, were lured into working in other countries due to the conditions of the work environment and other factors. Nurses become more satisfied in their role when environmental changes are made in conjunction with competitive pay, better benefits, and improved equipment (Gorgich et al., 2017). Quality of work environment and job satisfaction plays a vital role in nursing staff turnover (Tyndall et al., 2019). Another factor for rural healthcare leaders to consider is the setting where the nurse is practicing and the safety level they feel in their organization.

Working with patients in a mental health setting presents physical safety concerns for all employees. Nurses in psychiatric facilities desire adequate staffing levels due to concerns about their safety when there are potential shortages (Curran et al., 2020). Due to the diagnosis of patients in psychiatric settings, employee safety serves as a baseline motivator for nurses that work in such environments (Curran et al., 2020). Personal safety is a concern of nurses practicing in rural health settings. Nurses are on the front line of traumatic events in healthcare, and the mental and physical impacts of those events can lead to turnover. The condition of the working environment is another component of improving nursing retention and plays into the environment's safety.

Transition and Summary

Section 1 of the study presented the background of the problem and the interview questions completed with study participants in Section 3. The conceptual framework I utilized for this research study was Herzberg's two-factor motivational hygiene theory. I discussed applying Herzberg's theory to the nursing profession for leaders in rural healthcare settings and how the techniques combat retention challenges. In Section 1, I defined the operational definitions and discussed assumptions, limitations, and delimitations. I explored in the literature review why rural healthcare leaders face challenges with nurses' retention and how turnover improves through focused strategies.

In Section 2 of the study, I completed a review of the role of the research participants was discussed and the role of the researcher. Further, I completed a review of the design and method of the research in Section 2. Section 3 of the study reviewed the presentation of findings and how to impact social change and rural nursing retention. I contacted recommendations for future research and action in Section 3.

Section 2: The Project

Purpose Statement

The purpose of this qualitative multiple case study was to explore the strategies that rural healthcare leaders use to retain nurses. The target population included leaders in six rural healthcare centers in southern Ohio and West Virginia who had improved nurses' retention. The positive social impact of this study includes the leader's ability to improve nursing retention, decrease the potential for adverse patient events, and improve the healthcare organization's financial performance.

Role of the Researcher

The researcher is the main instrument to collect and analyze the data captured in qualitative research (Clark & Vealé, 2018). The researcher must reflect upon themselves and the subject they are exploring. Reflexivity is a critical process for the researcher in qualitative studies because it concerns reflecting on the researcher's human dimension (Karagiozis, 2018). The process of reflexivity is a way for researchers to question their assumptions regarding the study topic (Mason-Bish, 2019). Because the researchers are the instrument in qualitative research, it impacts data collection and analysis. This factor is a weakness of qualitative methodology. Reflexivity helps the researcher address those concerns in the data by questioning how their personal experience and preconceptions of the topic impact their study (Geddis-Regan et al., 2021). The researcher's role is to ensure that any bias is recognized and resolved to confirm the data's validity within their study (Baldwin et al., 2022).

My previous employment experience with rural nurse retention stemmed from leadership roles in the home care industry. Experience on the topic came from working in rural health for the past 6 years as a director of two home care agencies. Retaining nurses in rural areas is a complex issue that has prohibited growth for some home care locations. Before this study, I did not know potential participants in the targeted geographic area. This was my first study on rural nurse retention issues and healthcare leaders' strategies to combat the challenge.

The National Research Act of 1974 established the National Commission for the Protection of Human Subjects of Biomedical and Behavioral Research. The commission created *The Belmont Report* to establish guidelines for researchers (Office of Human Research Protections, 2021). *The Belmont Report* established three ethical principles for research with human subjects: respect for persons, beneficence, and justice (National Commission for the Protection of Human Subjects of Biomedical and Behavioral Research, 1979). Anabo et al. (2019) discussed how *The Belmont Report* addressed the ethical steps researchers must take to pursue knowledge. Researchers must ensure that they obtain informed consent, that participants are aware of the risks and benefits of their inclusion in the study, and that participants are located in a manner that is fair and equitable to prevent harm, coercion, and inclusion of participants who are members of a vulnerable population (Anabo et al., 2019).

Researchers have an obligation to their readers and topic to ensure their work is ethical. Researchers should follow the tenets of ethical communication outlined by the Society of Technical Communication Ethical Guidelines, including legality, honesty,

confidentiality, quality, fairness, and professionalism (Dragga & Dan Voss, 2020).

Although educational institutions have institutional review boards (IRBs), the burden of applying ethical standards in research lies on the researcher and not the IRB (Cumyn et al., 2019).

The four types of potential bias in qualitative research that can occur are questions, sampling, conceptual, and anticipated outcome (Wadams & Park, 2018). Wadams and Park (2018) noted that question bias can occur when researchers do not consider all factors that could impact the responses, such as the ethnicity of study participants. Sampling bias occurs when researchers select a sampling method that is inappropriate for the topic and does not address the experiences that the researcher is exploring. Conceptual bias occurs when researchers justify the data through extrapolation of the findings to fit the concept of their study. Finally, anticipation bias occurs when researchers think of an idea or believe specific ideas they feel are true on their topic, and the findings generally reflect those beliefs or assumptions. Researchers should acknowledge any conscious or unconscious bias throughout their study and recognize how their own experiences or vested interest in the research topic can impact the interactions with study participants, the analysis of the data, and potential follow-up questions asked of participants (Peterson, 2019).

To address potential bias in the current study, I used open-ended interview questions to allow participants to offer their own information on each item. The sampling method was ideal for the study because it allowed participants from multiple healthcare organizations in rural areas to participate. Conceptual bias was addressed through

ensuring data were valid for the study. Finally, I addressed anticipation bias by reviewing interview data through member checking with study participants.

In qualitative research, the data collection techniques include observations, diary entries, written documents, interviews, and other methods that can be unstructured or semistructured but not structured (Kyngäs, 2020). According to Yin (2018), conducting interviews allows the researchers to focus on the topic and provide insight through participants' personal views on the research question being addressed. Interviews aid the researcher in having a purposeful conversation with the participants, but researchers must build rapport with the participants and establish trust to garner responses that will benefit the researcher in answering the research question (Saunders et al., 2015). Semistructured interviews were the interview method chosen as part of the current multiple case study. I asked questions of the participants in the same order for all interviews. Each study participant answered a question if they could provide any information. The interview protocol included a script of how I greeted participants and the flow of the questions. By using an interview protocol, I was able to prevent bias. I sorted responses according to the interview questions and then analyzed the data.

Participants

The selection of participants causes ethical issues in the design of any study because the researcher must follow the ethical principle of do no harm while adapting the study to the needs of the participants (Saunders et al., 2015). In addition, researchers have a duty to their participants to accept if they refuse to answer questions or decide to discontinue their participation in the study and not pressure them to participate (Saunders

et al., 2015). Participants for the current study were at least 18 years of age; worked in a rural healthcare organization for at least 1 year; and served in a leadership capacity in nursing supervision, recruitment, or human resources for a minimum of 1 year.

Gaining access to the participants was challenging and the most difficult component of the data collection process. In qualitative research, researchers must prepare for obstacles while gaining access to study participants (Moser & Korstjens, 2018). In the beginning stages of identifying candidates for the interviews, I completed research on the healthcare facilities in southern Ohio and West Virginia. I identified potential institutions and organizations to target for rural healthcare leaders who oversaw the nursing staff or served in a human resources-related role focused on nursing retention. Each organization's website contained information that helped me identify the contact information for the individuals who served in the critical roles. Study participants were provided information on the doctoral study and indicated whether they were willing to participate. Each interview was one-on-one, ensuring that privacy and confidentiality were maintained. Participants could complete the interview face-to-face, telephonically, or via Zoom. All participants chose Zoom as the preferred method of participation because it allowed them to work around their work and life commitments. The participants worked within six rural healthcare organizations, so a multiple case study approach was the best fit for this study. Organizations included a hospital-owned physician practice and rural hospitals.

Establishing rapport with participants is crucial for researchers to impact the results of the data obtained. Involving participants in helping to plan, implement, and

evaluate the interview questions promotes rapport and trust between the researcher and the participants (Hall et al., 2021). In the current climate with COVID-19, researchers can use technology to assist with data collection, unlike in prior years. Participation via electronic means aids researchers in increasing engagement, confidence, and honesty from the participants that may not have occurred in a face-to-face environment (Hall et al., 2021). Participants in the current study opted to complete the interviews via Zoom, so I read the consent form before any research questions. Obtaining consent ensured participants were willing and confirmed that I had the documentation to support their agreement. In addition, I introduced myself before the interview via telephone and communicated with participants via email, text, and Facebook Messenger until the interview.

Research Method

There are three primary research methodologies: qualitative, quantitative, and mixed methods (Abutabenjeh & Jaradat, 2018). Selecting the research design for a study is daunting because it is difficult to determine which design would benefit the research question (Paraskevopoulou-Kollia, 2019). Qualitative researchers use different methods and strategies to examine a research topic. Designs can involve case studies, observing participants in a setting, interviews, ethnography, and obtaining an oral history (Lanka et al., 2021). Such methods are not the only ways to facilitate qualitative research (Lanka et al., 2021). Lanka et al. (2021) highlighted how qualitative researchers view a process, people, cases, and social situations to determine how individuals' experiences inform the answer to the research question. For the current study, a qualitative methodology helped

me understand why nurse retention is challenging for rural healthcare leaders. Using an interview approach allowed participants to share how their experience as rural leaders impacted nursing retention. Each participant provided insight into the research topic and helped me answer the research question. Researchers who use qualitative methodology must realize that to answer the research question they wish to explore, they must envelop themselves in the area they are researching and aim not for generalizability but to produce theories, conceptual understanding of the topic, or descriptions that can be applied in other contexts (Cristancho et al., 2018).

Researchers who use a quantitative method examine variables related to the research question and the assumptions surrounding those variables (Paraskevopoulou-Kollia, 2019). In quantitative studies, researchers use instruments such as questionnaires to ask questions in a specific way with predetermined answers and create a similar environment for all participants (Paraskevopoulou-Kollia, 2019). Researchers who use quantitative methodology examine numbers analyzed by a method to evaluate the proposed hypothesis. The researcher wishes to discover a result that is an increase, level, trend, share, or a combination of items (D. Kang & Evans, 2020). D. Kang and Evans (2020) stated that quantitative researchers seek to analyze the subject's frequency through statistical analysis. The research on rural healthcare leaders' strategies to improve nurse retention did not involve numerical data, so quantitative methodology was unsuitable for this study.

A mixed-methods study is a hybrid approach between qualitative and quantitative methods. Mixed-methods research occurs when a researcher used qualitative and

quantitative approaches in the same study (Tashakkori et al., 2020). For example, researchers may use semistructured interviews and closed-ended questionnaires in a mixed-methods study, which can be an effective tool in researching unique challenges facing healthcare systems (Kajamaa et al., 2020). A mixed-methods approach was inappropriate for the current study because a combination of interviews and closed-ended questions would not have generated the data necessary to answer the research question.

Research Design

Qualitative research consists of several designs including case study, ethnography, phenomenology, and narrative inquiry (Bansal et al., 2018). These qualitative designs are the most common. I chose a multiple case study design because it allowed me to answer the research question in the setting where the topic of interest occurred (see Sheills et al., 2020). Having participants from multiple rural healthcare organizations allowed me the opportunity to identify whether the strategies that the leaders used were consistent across multiple organizations. Sheills et al. (2020) discussed how using a multiple case study design can provide insight into the differences and similarities in more than one setting. Due to the dynamic nature of having multiple centers that operate in a tri-state rural area that serves Ohio and West Virginia, it was vital to include participants from multiple organizations to determine whether the challenges with nursing retention were similar or different in the problem and solutions that rural healthcare leaders use. Therefore, a multiple case study design was suitable for the research topic.

Researchers who conduct an ethnographic study focus on participants' stories and experiences in an unstructured format to analyze a broader social issue (Celikoglu et al., 2020). In ethnographic studies, analyzing data and quantifying results are not the focus, but the narratives received from participants help the researcher create theories and describe and explain the research question being posed (Celikoglu et al., 2020). An ethnographic design was inappropriate for the current study because the topic was not rooted in anthropology. Researchers use Groenewald's (2019) phenomenological design to study the participants' lived experiences and their views of those experiences. Because I was not asking research questions that focused on the lived experiences of rural healthcare leaders, the phenomenological design was not appropriate. Narrative inquiry is the qualitative research design in which the researcher collects personal data from participants and their experiences and compiles the information into stories rather than using data analytics, as with other designs (Saunders et al., 2015). Personal stories were irrelevant to studying rural health nursing challenges and were not included in this study. Data saturation in qualitative research is achieved when no new information can be obtained from completing additional interviews (Fofana et al., 2020). I achieved data saturation when no new information was obtained through additional interviews.

Population and Sampling

Selecting the correct sample size is a critical component of a study. If the sample size is too small, researchers can conclude that the topic of interest lacks evidence or reasoning, but if the sample is too large, the data set can become too complex and yield results that are not accurate (Nanjundeswaraswamy & Divakar, 2021). In research, the

population is the researcher's group, and the sample is a selection of that group (Nanjundeswaraswamy & Divakar, 2021). Nonprobability sampling is used in qualitative research, and probability sampling is used in quantitative research (Ellis, 2019). Nanjundeswaraswamy and Divakar (2021) stated that nonprobability sampling methods are convenient, and the researcher's judgment in selecting the sample helps to ensure unbiased sampling.

For this research study, I used purposeful nonprobability sampling. Purposeful sampling is a form of nonprobability sampling that helps improve the credibility, transferability, dependability, and confirmability of the research data and the subsequent results of the study (Campbell et al., 2020). In addition, purposeful sampling can help improve the rigor of the data (Campbell et al., 2020). Researchers utilizing a purposeful sampling method should include individuals with views and ideas about the study's questions (Campbell et al., 2020). I explored rural healthcare leaders' strategies within specific organizations in Ohio and West Virginia for this research study. The participants had experience in organizations that served rural communities and were aware of the complex issues surrounding retaining qualified nursing staff in their organizations. A random sampling of participants would not yield the data necessary to answer the research question. Random sampling allows for selecting any individuals within a population to participate in research (Nanjundeswaraswamy & Divakar, 2021). Participants had to possess at least a year of experience in nursing supervision, recruitment, or human resources for this research study; worked in a rural organization for at least a year; and were at least 18 years of age. Six healthcare organizations

employed study participants in the targeted area: hospital owned physician practices and hospitals.

Guest et al. (2029) discussed how data saturation is achieved when no new information is generated, or very little information is garnered about the research question within the study. I completed interviews for this research study with rural healthcare leaders from multiple organizations in two states to ensure data saturation by reviewing the interview transcripts, taking notes during the sessions, and reviewing all data for accuracy.

I selected participants by researching online healthcare institutions in rural Ohio and West Virginia. Individuals needed at least a year of experience in nursing supervision, recruitment, or human resources capacity with direct responsibility for the retention of nursing staff in a rural healthcare setting. Participants had to be a minimum of 18 years old for inclusion in the research study. To determine possible participants for a research study, researchers must identify healthcare organizations in the target geographic area. I reviewed the websites of local rural healthcare organizations and located information on individuals and departments in my target demographic. I selected individuals who met the inclusion criteria to determine their desire to participate. The participants gave informed consent on the audio recording once I read the informed consent form. Participants were allowed to choose to meet face to face in a setting of their choosing, telephonically, or via ZOOM. All study participants opted to complete the interview via ZOOM. Interviews are the most effective data collection method in qualitative research to allow participants to share their insight into the research topic

without the researcher putting their ideas into the interview process (Thelwall & Nevill, 2020).

Ethical Research

Ethics plays a vital role in research studies, and researchers must ensure that their study participants do not experience harm in the pursuit of answering the research question. IRBs function to ensure that researchers in any study protect the rights and privacy of study participants while following ethical practices (Ballantyne et al., 2020). Participants in research studies must consent to their participation and understand the data generated for public consumption. Informed consent is the process of research participants expressing their intent to participate and understanding the study (Xu et al., 2020). I completed a briefing with study participants and read the consent form on the purpose of this research study. While reading the consent form, I reviewed how their input helped provide insight into the strategies utilized to resolve the unique challenges surrounding nurse retention in rural health settings. At the end of my reading of the consent form, participants indicated their consent to participation by stating they consented. In addition, I educated participants on how I used their information in the study and maintained confidentiality to protect their privacy. Participants did not receive incentives for their inclusion in the research study.

Before the interview, I discussed during the review of the informed consent form how participants could withdraw from the research study at any time. Ngozwana (2018) discussed how participants should be informed of their ability to withdraw from a research study at any point without consequence. I do not name participants in the study,

nor do I include any identifying information. I identified study participants through an alphanumeric coding format, such as *Participant A and Participant B*. Data from the research study will be kept in a locked safe in the researcher's home to maintain confidentiality for a minimum of 5 years. The final study will be on OneDrive with a passcode needed to access a Dropbox folder to ensure the data is secure. Destruction of all original interview transcripts will occur after 5 years. The Walden University IRB approval number is 04-19-22-1022141 for this study.

Data Collection Instruments

Researchers are the method of data collection in qualitative research. Since researchers are the data collection method, they must realize their role in how participants respond to their process by being both reflective and reflexive in collecting data (Leng-Hsien Soh et al., 2020). For this doctoral study, a semistructured interview was ideal, with open-ended questions asked of participants to allow for additional feedback and insight to help answer the research question. Interviews help to provide insight into the research topic (Thelwall & Nevill, 2021). The options to complete the interview were face to face at a location of the participant's choice, telephonically, or via ZOOM. All study participants opted to complete the interviews via ZOOM. Participants provided their consent to record the interview utilizing ZOOM, so I could recall aspects accurately. Once I completed interviews, I transcribed the data with Otter.ai and uploaded to NVIVO to code themes. The interview protocol helped ensure that all participants were asked the same questions in the same format, plus I confirmed data trustworthiness with relevant information from my second source of data: company websites.

A summary of the interview transcript was sent to the participants to review and ensured accuracy. A review of the summary of the interview transcript benefited me as the researcher as it ensured that the data analysis was accurate and the themes extracted to identify common elements across the information shared by study participants (Herrero et al., 2020). A critical component of the research study was ensuring the researcher had confirmed the interpretation of the participant's responses. Participants were allowed to check the transcript summary for 2 weeks to make corrections and return. The interview questions are in Appendix A, and the interview protocol is contained in Appendix B. Providing participants with the transcript summary to review ensured that any discrepancies were identified and corrected before submission. Once finalized and approved, the researcher will mail participants a summary of the study results. For qualitative research, the quality and quantity of data determine when data saturation is achieved and not until those are reached (Johnson et al., 2020). The sample size for qualitative research can vary depending on the complexity of the research question and study. An interview research methodology between 5 and 60 interviews can help achieve data saturation (Hennick & Kaiser, 2022). To ensure data saturation, I completed three additional interviews even though my fifth interview produced no new meaningful information.

Data Collection Technique

Data collection methods for this research study included ZOOM interviews as a virtual option. Completing the interviews via ZOOM allowed me to accommodate the schedule of participants and allowed me to be able to save time by not having to travel to

a location for the interview. I notified participants that the interviews would be recorded via ZOOM and transcribed with Otter.ai to recall their answers accurately. I notified them of this prior to the interview. Interviews were semistructured and contained open-ended questions to allow for a significant contribution from participants on each question. In addition, participants selected the day and time to complete the interview to accommodate their schedules. Participants were read the consent form before conducting the interview. The interview questions are in Appendix A, and the interview protocol is in Appendix B.

An interview protocol helps ensure that researchers obtain rich data and helps to understand how the participant's experience relates to the topic of the research study (Yeong et al., 2018). Yeong et al. (2018) discussed how an interview protocol helps ensure that the interview is effective and helps facilitate the interview process through an organized manner that helps explore any potential issues before the involvement of study participants. Participants had the option to complete face to face interviews, but no one opted to do so. After the interview, I provided participants with a summary of their interview transcript to ensure the accuracy of the data. The participants had 2 weeks to provide feedback on the transcript. Participants can receive a summary of the final study once approval is received.

Face to face interviews have been a preferred design for qualitative studies, but with the advancement of technology, more researchers are offering new methods to conduct interviews with study participants, such as telephonically and virtually (Gray et al., 2020). Researchers utilizing qualitative methods such as interviews can gather

information from participants to answer complex research questions (Rahman, 2017).

When researchers offer participants the ability to participate in the interview process via telephonic or virtual means, it can help reach participants in areas outside the researcher's geographic location (Pszczółkowska, 2020). However, it is challenging to read the nonverbal cues the researcher can see in a face to face setting (Pszczółkowska, 2020). Pszczółkowska (2020) highlighted how virtual interviews such as ZOOM allow the researcher to physically see the participant and notice the non-verbal messages. Still, it can sometimes be challenging due to technical issues.

I sent participants a summary of the interview transcript for member checking of their interview for accuracy and allowed them to provide any additional insight they desired. Journal reviewers request that researchers have completed some form of member checking with study participants in the research. Therefore, participants had the opportunity to review the summary of the transcript from their interview and validate their data within (Hamilton, 2020). Validation of the interview data through member checking allowed me to support the data of my study and helped to provide rigor.

Data Organization Technique

Each participant's interview was recorded utilizing ZOOM and transcribed with Otter.ai. I reviewed the recording to ensure that the software accurately transcribed the data provided for the interview questions. After I transcribed interview recordings, I identified key words, uploaded files to NVIVO, and coded by theme. Participants were asked not to speak their names in the interview recording, as participants were coded alphanumerically, such as *Participant A* and *Participant B*. Such practices ensured that

confidentiality and privacy were maintained. Transcribing interview data has long been utilized in qualitative research and helps researchers ensure that the participants' explicit statements are recorded and helps organize the information into themes (Craig et al., 2021).

All data for the interview, including transcripts and coded information, will be stored in a locked safe in my home for 5 years. The final study document will be stored on OneDrive with a password to protect the information and Dropbox. Destruction of study documents will occur after 5 years.

Data Analysis

Data analysis for the researcher can be time consuming with qualitative studies as the method is time consuming and challenging (O'Kane et al., 2021). Moser and Korstjens (2018) discussed that data analysis must occur not when all research is completed, but as the researcher concludes each interview, the information should be analyzed, and they need to take notes. For case studies, methodological triangulation allows researchers to analyze the data generated. Methodological triangulation involves using multiple data analysis methods such as interviews and literature reviews (Abdalla et al., 2018). For this research study, I reviewed existing literature on nursing retention challenges in rural health settings and organization information on their website. I compared information from the literature review, participant interviews, and information on company websites for common themes. The literature review helped define the interview questions and provided opportunities to identify rural healthcare leaders' challenges before entering the research phase. After a review of the literature, research on

rural healthcare organizations in the targeted geographic area was necessary prior to interviews.

Additionally, I explored any individuals that served in a leadership capacity in nursing, human resources, or recruiting and determined if they have a year of experience. Once the review of websites was complete, I contacted the potential participants in the target population to discuss the purpose of the study and determined if they were interested in participating. The purpose of the study and sample questions were provided to potential participants to review and approve prior to their interview schedule.

Follow-up questions helped clarify the information given by the participants to the interview questions and helped to prompt them to provide additional information they otherwise would not have shared (Kontogianni et al., 2020). Once I completed interviews and transcription, I sent the interview summary to study participants for member checking for 2 weeks. I sorted the keywords and phrases into themes utilizing Excel and uploaded the transcription documents to NVIVO for coding.

Coding is a way for researchers to take the data generated from the study and sort the information into a word or short phrase to answer the research question (Linneberg & Korsgaard, 2020). Once I sorted the data, I completed a reflexive thematic analysis to compare how the data related to Herzberg's two-factor theory. The reflexive thematic analysis involves the researcher constructing the data into themes and is how the researcher impacts the data (Ayre & McCaffery, 2022). The information helped me answer the research question and identified rural nurse retention challenges and the strategies leaders utilized to combat those difficulties.

Reliability and Validity

Reliability

Researchers can demonstrate reliability when other researchers utilize similar methods and approaches and achieve comparable results and analysis (Rose & Johnson, 2020). Further, reliability is concerned with the methods utilized in a research study and how they are applied, with a justification for the methods selected and the analytical processes chosen by the researcher (Rose & Johnson, 2020). Dependability in qualitative research is similar to reliability in that other researchers can obtain similar results with similar conditions following the same procedures, but a different conclusion could be reached (Stenfors et al., 2020). A pilot study was conducted to determine if the interview questions had a logical progression and flow. The pilot study was completed with two participants from nationwide homecare agencies. Still, the participants had oversight for nurses who work within rural areas of South Carolina, North Carolina, Kentucky, Ohio, and West Virginia. Adjustments were made to the interview questions to allow for additional participant feedback during the interview process. Pilot studies enable researchers to address any uncertainties in their research and make adjustments before completing the main task (Campbell et al., 2020).

Researchers that utilize member checking to validate the results of their data collection follow up with study participants to determine if the researcher misinterpreted the data transcribed from the interview or experienced errors in their analysis (Zairul, 2021). Member checking allows study participants to review their transcribed interview documents or summary and provide validity to the information contained (Motulsky,

2021). Member checking enables the researcher to ensure that all data is correct through study participants reviewing the information from their interview, so if the researcher misunderstood any information shared, it can be corrected (Motulsky, 2021). Interviews were recorded using ZOOM and transcribed through Otter.ai software. Once I transcribed interviews in Otter.ai, the transcript was uploaded into NVIVO and coded by theme. In qualitative research, there are three types of transcription of interview transcripts: multimodal, gisted, and verbatim transcript (Lester et al., 2020). Multimodal transcription is concerned with the methodology used and gisted the purpose of a research study (Lester et al., 2020).

In contrast, verbatim transcription captures every word participants give in the interview process (Lester et al., 2020). For this research study, verbatim transcription was utilized and completed by the researcher versus outsourcing the task to a transcription company. Lester et al. (2020) highlighted how having the researcher complete the transcription and review of the interviews allows them to understand the data generated from those and participants' viewpoints.

Validity

In qualitative research, the researcher is the main instrument to address any potential bias that can occur. The use of self in qualitative research allows the researcher to demonstrate validity and credibility (Shufutinsky, 2020). Bracketing is the method the researcher can use to mitigate preconceptions about the research (Shufutinsky, 2020). Epoche is the researcher's active recognition of any preconceived ideas reflectively (Shufutinsky, 2020). Credibility in qualitative research is when the researcher can prove

the trustworthiness of the process they utilize in their study (Wood et al., 2020). Member checking was used in this research study to aid in the credibility of the data produced. Participants reviewed a summary of the interview transcript to ensure the accuracy of the data. Using voice recognition software such as Otter.ai helped eliminate the need for manual transcription, decreasing the potential of human error caused by utilizing a transcriber (Vindrola-Padros & Johnson, 2020).

Transferability is the ability of the researcher to provide enough detailed information on their study participants and process so that anyone who reads the study can determine if the results apply to another setting (Korstjens & Moser, 2018). Korstjens and Moser (2018) discussed how the researcher does not determine if the results are transferable, but that is determined entirely by the reader. I followed a semistructured interview protocol to enhance study transferability during data collection. Using the interview protocol helped to ensure that I followed the methods and avoided bias.

Confirmability in qualitative research is the ability of the researcher to establish that the results and findings of the study are achievable by other researchers in the future (Korstjens & Moser, 2018). The gathered data were verified and analyzed through member checking. In addition, when participants provided an answer to a question that was unclear, I asked follow-up questions for clarification to ensure that the data was accurate.

Data saturation occurs when researchers no longer generate new information or themes from the data collection process (Braun & Clarke, 2021). An estimate of sample size in qualitative research occurs through data saturation, and saturation achievement

occurs when new information fails to provide additional insight in answering the research question (Guest et al., 2020). I discontinued participant interviews once I achieved data saturation and completed three additional interviews to confirm that additional data was not beneficial.

Transition and Summary

In Section 1 of the study, I defined the operational definitions, the background of the problem, the purpose and nature of the study, and the assumptions, limitations, and delimitations. Section 2 of this research study addressed the role of study participants, reviewed data collection techniques, data analysis, and reliability and validity. Section 3 of the study will discuss the findings and implications for social change, how the data applies to professional practice, recommendations for action, and further research.

Section 3: Application to Professional Practice and Implications for Change

The purpose of this qualitative multiple case study was to explore the strategies that rural healthcare leaders used to retain nurses. Participants were from six healthcare organizations in southern Ohio and West Virginia. Inclusion for the study required that participants be at least 18 years of age; work in a rural healthcare organization for at least 1 year; and serve in a leadership capacity in nursing supervision, recruitment, or human resources for a minimum of 1 year. Participants included two charge nurses, four unit/department leaders, and two recruiter/nurse managers from six rural healthcare centers within southern Ohio and West Virginia, who had improved nurses' retention. A total of eight semistructured interviews were conducted with the participants and recorded using Zoom.

I transcribed each interview recording with Otter.ai, identifying keywords in each participant interview. Some keywords I identified included *benefits, pay, staff, patients, retention, and rural healthcare*. I used Excel to identify the keywords and phrases. I uploaded each interview transcript from Otter.ai in NVIVO and coded the data. In my analysis, I identified the following themes: (a) effective nurse retention incentives, (b) meaningful relationships with leaders, and (c) competitive advantage benefits. Identifying the themes aided me in answering the research question.

Presentation of the Findings

The research question I wanted to answer in the study was the following: What strategies do rural healthcare leaders use to retain nurses? Participants included two charge nurses, four unit/department leaders, and two recruiter/nurse managers from rural

facilities in southern Ohio and West Virginia. To identify potential answers to the research question, I asked participants eight open-ended questions during the interview. All study participants opted to complete the interview via Zoom rather than meeting face to face or telephonically. Participants worked in six healthcare facilities that serve a rural population. To protect participants' confidentiality, I used pseudonyms such as PA, PB, PC, PD, PE, PF, PG, and PH. I identified participant organizations as O1, O2, O3, O4, O5, and O6. Table 1 includes the role and organization of each participant.

Table 1

Study Participant Roles

Participant	Role	Healthcare organization
PA	Recruiter/nurse manager	O1
PB	Department/unit leader	O2
PC	Department/unit leader	O2
PD	Department/unit leader	O3
PE	Charge nurse	O4
PF	Department/unit leader	O1
PG	Recruiter/nurse manager	O5
PH	Charge nurse	O6

In my analysis of the literature review results and participant interviews, the themes that emerged were (a) effective nurse retention incentives, (b) meaningful relationships with leaders, and (c) competitive advantage benefits. Rural healthcare leaders had developed strategies such as bonuses, pay increases, meaningful relationships with leaders, and competitive advantage benefits to combat competition challenges from travel nursing contracts.

Theme 1: Effective Nurse Retention Incentives

Retention incentives and bonuses were strategies that rural healthcare leaders used to improve the retention of nurses. Healthcare leaders nationwide have been facing nursing shortages, which have increased since the pandemic (Beckett et al., 2021). Rural healthcare leaders have experienced retention problems as nurses have left for other opportunities, such as travel nursing. Travel nursing opportunities have forced rural leaders to implement incentives and bonuses not only to retain the existing staff employed by the facility but also to attract new talent. Rural healthcare leaders utilized strategies such as allowing input into scheduling, retention incentives, bonuses, tuition reimbursement, and critical staffing pay to improve nurse retention. Table 2 shows the coding I completed of participants' responses to effective nurse retention incentives utilizing NVIVO software.

Table 2

Effective Nurse Retention Coding from NVIVO

Participant	Percentage of Effective Nurse Retention Responses
PE	19.61%
PC	13.14%
PD	8.87%
PA	6.97%
PH	5.69%
PF	4.23%
PG	2.56%
PB	0.39%

PC indicated that they are trying various strategies to improve nurse retention to eliminate shortages. One of the incentives leaders adopted was changing nurses' schedules, and now "all your RNs and LPNs are on three twelves, where we were not

before” (PC). This move helped improve satisfaction with some of the nurses, but those who had been there for extended periods felt they were losing hours because they had worked five 8-hour shifts. PD discussed how leaders had tried various means to improve retention, including nurse of the year, cookies to show appreciation, various offerings of food, and market adjustment of pay:

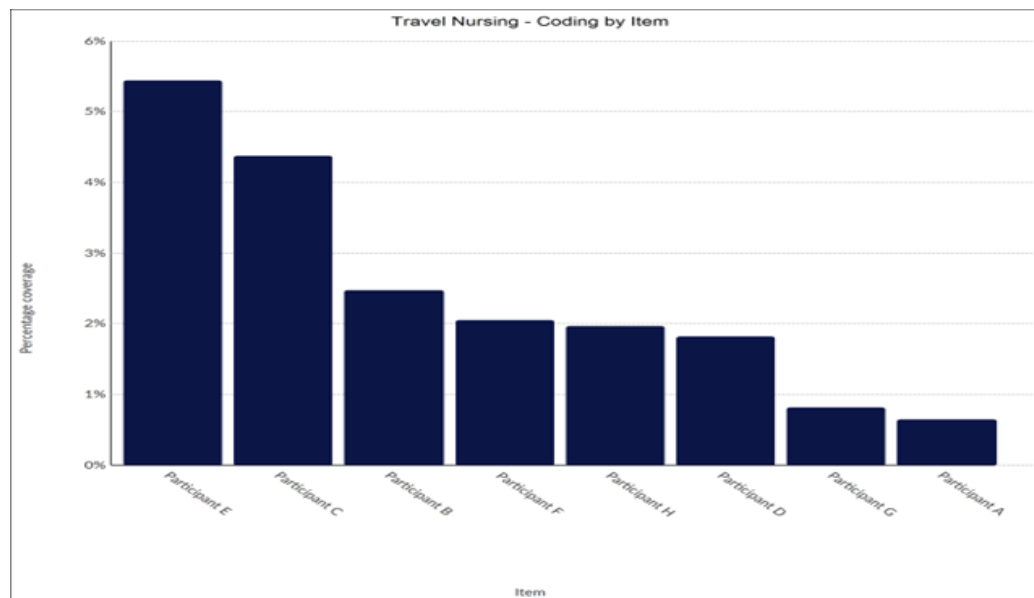
We implemented extra pay; once you hit your 40 hours, if you would pick up an extra shift, it could be in your unit or other units. But after your 40 hours, it pays time and a half plus an extra at one point; it was \$45. At another point, it was so bad with staffing that they offered two and a half times, plus, I think it was \$75.

I found during the literature review that a combination of incentives and bonuses can help improve the retention of nurses. Identifying what financial and nonfinancial incentives can impact the motivation of employees is critical, but there should be a combination of both areas to impact retention (Dobre et al., 2017). Healthcare leaders can avoid contract nursing by implementing incentives and retention bonuses because contract nurses place a heavy financial burden on facilities (Wakerman et al., 2019). Further, during my review of the literature, I found that incentive programs such as loan forgiveness, guaranteed income, lifestyle accommodations, and family considerations could help improve retention (Soherwardy & Crouch, 2020). The participant’s interview data aligned with the literature review findings. PG discussed how their organization “tripled the amount of money an employee could get for tuition reimbursement; we went from \$3,000 a year to up to \$9,000.” PG increased tuition reimbursement as an incentive to improve retention. PG also decreased the time the nurse must work after receiving the

incentive. Nurses are now required to work for the organization 6 months after the end of the semester in which reimbursement was received. Previously, nurses who received tuition reimbursement had to work for the organization for 2 years after receiving the incentive to avoid payback.

My results indicated that rural leaders could use Herzberg's two-factor theory to improve nurse retention. Rai et al. (2020) found that hygiene factors can improve nurses' satisfaction levels. Hygiene factors such as pay, company policies, and supervision can lead to dissatisfaction at work (Johansen et al., 2018). As indicated by current participants, rural healthcare leaders improved retention through incentives and bonuses. My research identified strategies that fell under retention incentives and bonuses. Participants confirmed those strategies 41 times during the interviews.

Rural leaders have faced challenges in nurse retention due to travel nursing contracts. Healthcare leaders have implemented additional financial and nonfinancial incentives to prevent nursing staff turnover as nurses explore more lucrative positions nationwide. Current participants indicated that travel nursing contract opportunities had forced rural leaders to develop new strategies to combat the issue. All eight participants indicated that travel nursing had impacted the leader's ability to retain nurses. Rural leaders positively improved nurse retention through implementing strategies such as allowing nurses to offer input into scheduling, retention incentives, bonuses, tuition reimbursement, and critical staffing pay. PG had the highest indication of travel nursing at 5.44%, and PA had the lowest at 0.64%. Figure 1 shows my coding of travel nursing in participant interviews with NVIVO.

Figure 1*Travel Nursing Coding Using NVIVO*

Other leaders had approached nurses with new opportunities to make more money by accepting travel nursing contracts. PE indicated that nurses could accept a travel nursing contract and make “\$3,000, \$4,000, or \$5,000, depending on the area you are in, in one week versus staying at home and making \$2,000 in 2 weeks.” Rural leaders had also tried retention tools such as offering lunches and increasing pay to improve retention. Dousin et al. (2020) discussed that nurses leave their positions because their pay is not equitable to their workload. Nurse leaders aim to be competitive in what they offer to compete with travel contracts. Current participants have used company float pools to provide shift coverage. PB stated that staffing ratios were “eight patients to one nurse on a lot of floors because they did not have anybody to cover.”

The hygiene factors of Herzberg’s theory are relevant to rural leaders’ abilities to retain nurses. Rural healthcare leaders have used nonfinancial and financial incentives as

a strategy to improve retention. The hygiene factors of Herzberg's theory allow leaders to address pay as an area that can cause dissatisfaction with staff (Johansen et al., 2018). PC stated that in identifying strategies to compete with travel nursing contracts, "Yeah, I mean, travel nursing has been our biggest obstacle. To be quite honest, like I said prior, we really were not having a huge problem with retention or even recruitment."

Participants improved nurse retention through implementing strategies to address the hygiene factors such as differential pay for critical staffing needs and bonuses.

Toytok and Acar (2021) posited how hygiene factors could cause employees to become pessimistic and dissatisfied and potentially quit their job. When existing nurses see travel contract employees come in and receive higher wages for the same role they have been filling for years, existing nurses can experience dissatisfaction because they can feel that if the leader can afford to pay the travel contract pay, then they can pay the current employees. PH indicated that they had implemented

something called critical staffing. And if a floor is short, they will send out a text, and if someone picks up that shift, they get paid overtime. If they were full time, and they pick it up, they get paid overtime plus \$125 an hour.

The critical staffing approach had been a strategy of participants to fill the shifts quickly due to the existing shortages and travel opportunities. Krishnamoorthy et al. (2020) discussed how nonfinancial incentives are methods to increase the likelihood of the nurse staying employed with the organization. Rural healthcare leaders can use the participants' strategies to be competitive with travel nursing contracts. Participant leaders improved nurse retention by garnering nurses' input into scheduling; offering retention

incentives, bonuses, and tuition reimbursement; and providing differential pay for critical staffing needs. Effective nurse retention incentives through a combination of methods would be the ideal approach to address nurse retention as evidenced by the results of my study. The results of my research indicated that rural leaders can use other strategic methods to improve nurse retention beyond compensation. Current participants used strategies such as allowing input into scheduling, retention incentives, bonuses, tuition reimbursement, and critical staffing pay to improve nurse retention. The rural healthcare leaders in the study improved retention and attracted new nurses by the implementation of the strategies because the organization was more competitive with travel nursing contracts and other facilities in the area.

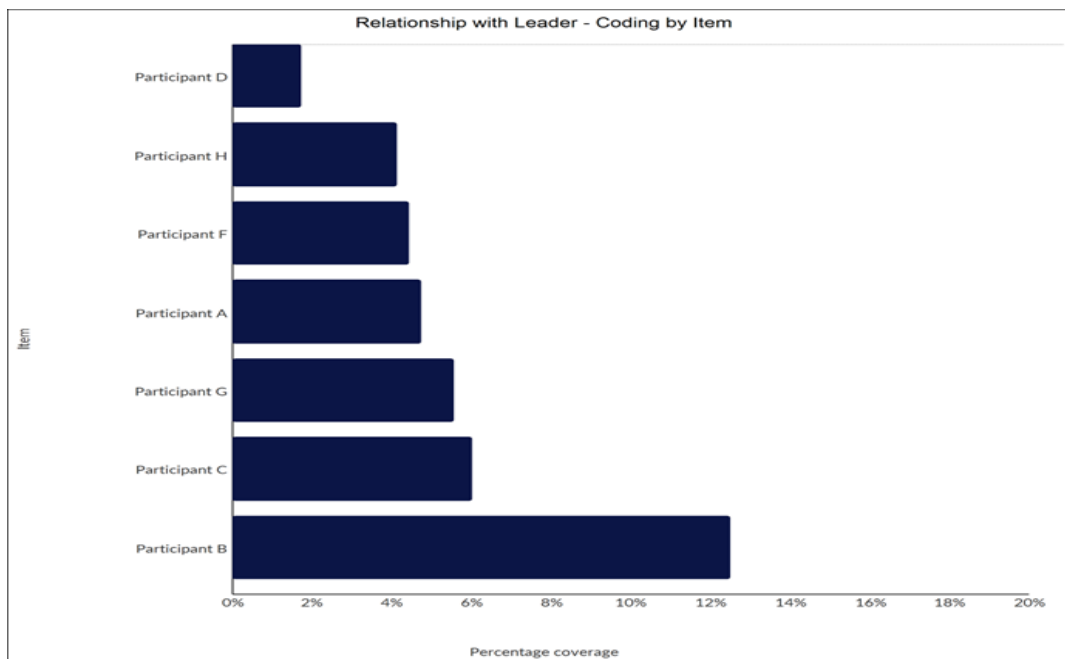
Theme 2: Meaningful Relationships With Leaders

The relationship between a leader and their team is a crucial component of the success of the organization and department. When there is a sense of belonging to the leader and the organization, the nurse is more likely to stay employed in their current position (MacKay et al., 2021). Organizational leaders who develop a mentoring program can help increase the retention of nurses (Sodidi & Jardien-Baboo, 2020). Mentor programs allow new nurses to become attached to the organization, their mentor, and their position. Malatzky et al. (2020) discussed how a sense of place helps staff develop relationships with their work. The literature review I completed indicated that the relationship between the leader and the nurse is critical to improve retention and promote a sense of place (Sodidi & Jardien-Baboo, 2020). As the baby boomer population is aging and entering retirement age, experienced nurses are taking their expertise when the nurse

retires. PB indicated, “you might have a nurse with 6 months of experience, and they make her charge nurse because no one else is available.” New nurses entering the field are not prepared to fill the roles of the nurses retiring (Nowak & Scanlan, 2021).

Mentoring programs help improve a sense of place and ensure new nurses have support in learning how to make appropriate care decisions (Kennedy et al., 2020).

The meaningful relationships with leaders were a key theme that I derived from the participant interviews. Seven participants indicated that the relationship with the leader was a crucial issue in the retention of nurses in rural healthcare. When I coded the data for PB’s interview, 12.4% of the transcribed data addressed the nurses’ meaningful relationships with leaders. PB identified creating a family atmosphere, being a working manager, and allowing for flexibility in scheduling as the strategies used to improve nurse retention. PB, PC, PF, and PH indicated that they and other leaders complete rounding, team meetings, or huddles to improve communication within their department and allow nursing staff to offer insight into how the department operates. Figure 2 shows the NVIVO coding of meaningful relationships with leaders.

Figure 2*Meaningful Relationships With Leaders Coding With NVIVO*

PA indicated that they try to improve relationships with their nurses by showing appreciation. By “leaving little notes at their desk, but also making them feel their worth to the company. You know, if they do something good, praise them.” Taking the time out of the leader’s day when additional responsibilities are on their plate due to shortages shows the nurses that the leader values their contributions to the organization. The involvement of the leader can reduce the possibility of turnover. Relating this finding to peer reviewed, published literature, Cox (2019) indicated that when nurses have support from their leaders, it can be the strongest predictor of job satisfaction. The study participants’ strategies to improve retention falls under Herzberg’s motivating factors. The theory by Herzberg posits how motivating factors, or intrinsic factors, include responsibility, recognition of accomplishments, advancement, and completed work

(Herzberg, 1959). By improving the motivating factors, rural leaders can increase the likelihood of the nurse staying employed at the organization (Toytok & Acar, 2021).

Hygiene factors under Herzberg's two-factor theory include compensation, interpersonal relationships, working environment, and job stability (Kang et al., 2021). Having a supportive relationship with their leader helps to increase the likelihood of the nurse staying employed within the facility. PG offered the following information in their interview:

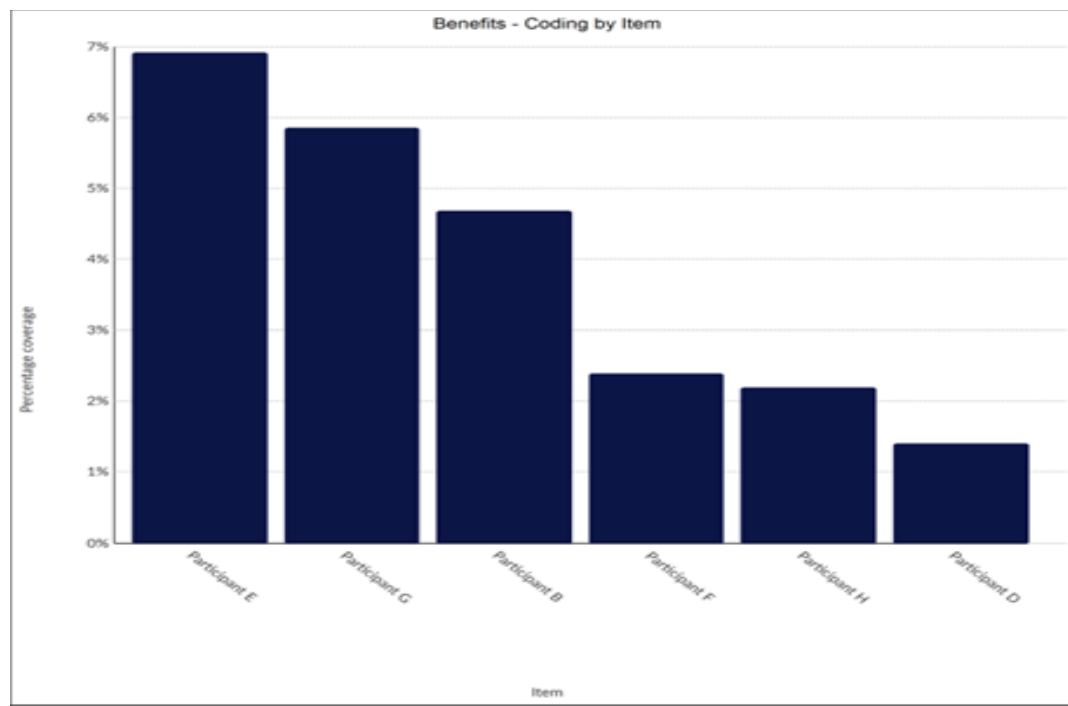
Many people stay because of their coworkers or manager, right? And, and some say they do not necessarily stay for the money, but they stay because they have been, they have been in that position for a long time. And they just cannot imagine working anywhere else, or they do not want to start over again.

My findings in this study relate to Herzberg's theory and provide insight into the strategies that rural healthcare leaders must focus on to improve nurse retention. Rural leaders who work to show appreciation for staff, establish meaningful relationships, and demonstrate support can improve nurse retention. Rural leaders must examine pay through market adjustments and incentives to increase retention. A multitiered approach emphasizing building positive and rewarding relationships between the leader and nurse is necessary to reduce nursing shortages in rural settings.

Theme 3: Competitive Advantage Benefits

The benefits offered by leaders can impact the leader's ability to retain staff. Rural healthcare leaders face a challenge in identifying benefits that meet the needs of the employee and their families while also being affordable to the insured and the

organization. Insurance premiums offered by leaders can deter nurses from wanting to accept employment with a competitive organization and stay in their current position. When leaders from competing organizations offer better benefits packages, nurses may decide to leave their present jobs for better opportunities. Nurses experience higher satisfaction when leaders work to change the work environment, improve pay, and augment benefits (Gorgich et al., 2017). Study participants indicated that offering competitive advantage benefits was a strategy to improve retention. Figure 3 demonstrates the coding of theme competitive advantage benefits with NVIVO.

Figure 3*Competitive Advantage Benefits Coding With NVIVO*

Six of the study participants indicated that leaders worked to improve the benefits offered to improve nurse retention. PB indicated they allocated financial resources towards improving benefits to address issues with retention.

They changed our deductibles to almost zero, and they are offering programs that if you complete, like a medical, physical, and smoking attestation, or quit smoking, it knocks \$500 off your medical bills for the year. And if you are married, your husband works, or you have a spouse, it also knocks \$500 off theirs.

Identifying which benefits require improvement requires rural leaders to talk with stakeholders about what modifications would be an improvement. The cost of the change to benefits requires leaders to consider the financial implications carefully. PB discussed

how leaders must continue to work on continuing education opportunities. PE indicated in their interview that their healthcare organization made a negative change to their benefits a few years ago, which has caused difficulties with the retention of nurses as it impacted their take home pay significantly. PE shared that “for most of my career as a bedside nurse insurance was free, you did not pay any premium or anything like that. So, when that change occurred, probably within the past 5 years, that was a big driver because pay had not really changed.” Further, “then all of a sudden, you are paying, you know, \$300-\$400, every 2 weeks for your family’s insurance, right, that made you know, that made a big difference, too.” PE discussed in their interview how they had tried several different modifications to their benefits to improve retention. PE discussed, “we are giving a lot more opportunities to grow in our practice. And like I said, we did offer the incentives with pay and things like that. We are now offering a little bit more help with tuition to grow as nurses.”

Benefits fall into Herzberg’s theory of motivation, and when nurses feel that the work performed is rewarding, motivating factors other than pay and benefits are essential such as respect and recognition (Herzberg, 1959; Curran et al., 2020). I identified alignment between the literature review and the study interviews and the importance of developing strategies to address benefits. In summary, to improve nurse retention, rural healthcare leaders must improve benefits for nurses by reducing out of pocket insurance premium costs and increasing tuition reimbursement. Existing literature I reviewed on rural nurse retention failed to define the need to formulate specific strategies regarding the development of meaningful competitive advantage benefits.

Applications to Professional Practice

Retention of nurses in rural healthcare settings is a complex issue that requires various strategies of the leader to encourage nurses to stay in place. Rural leaders are not alone in nurse retention difficulties, as it is a global crisis that requires further research (Terry et al., 2021). Rural leaders cannot operate their departments without an adequate supply of nurses. If nurses are not available to care for patients, leaders cannot run their departments at full capacity. The inability of leaders to have patients in every bed impacts financial performance. Access to healthcare services has increased as the baby boomer population is aging and starting to retire from the workforce. A gap exists between access to care and nurses available to serve (Grah et al., 2021).

Rural healthcare leaders have faced significant challenges as travel nursing contracts have led to nurses leaving facilities for more lucrative opportunities in other areas. Study participants implemented strategies of improving pay, offering incentives, establishing meaningful relationships with nurses, and competitive advantage benefits to improve retention of nurses. My study results indicate a critical need for rural leaders to implement my outlined strategies to combat nursing retention.

In all business sectors, the relationship between the leader and their subordinate is vital to retain the staff. Nurses have stressful positions and experience high levels of burnout. Mentorship programs for new nurses entering the field can help retain nurses by establishing a relationship between the mentor and the mentee. The mentoring relationship can help form a sense of place for the new nurse and improve the likelihood of retaining the nurse. Nurses in a mentoring relationship can experience a feeling of trust

with their mentor that improves retention (Ephraim, 2021). Rural healthcare leaders must work to create a mentorship program for new nurses entering the facility. A seasoned nurse should be paired with a new hire to orient the nurse to the role and ensure the nurse's questions are answered and needs met. Leaders should evaluate each mentoring relationship quarterly to ensure that the relationship is mutually beneficial.

Study participants faced issues with nurse retention as benefits impacted the ability to retain nurses. Rural healthcare leaders implemented the strategy of changes to benefits offered to all employees to improve retention. Rural leaders and organizations must work to identify ways to reduce the out of pocket costs of benefits to their employees. Examining the various insurance carriers available on the market and negotiating a reduction in rates is crucial to reducing the likelihood of turnover of nurses due to benefits. Leaders must pass the cost savings in reduced insurance premiums to employees.

Rural healthcare leaders must take action to reduce the incidence of nurses leaving the organization. Strategies by leaders to improve the working environment can increase retention but require a complex, proactive approach. Healthcare leaders can positively impact nursing shortages by implementing the successful strategies demonstrated by the healthcare leader participants in this study. The leaders included in the study improved retention through a comprehensive strategy, including relationships and mentorships. The importance of this combined approach is a critical point of differentiation in the findings from this study, compared to recommendations revealed in previous, published literature.

Recommendations for Action

A proactive approach by leaders utilizing the strategies outlined in the study can improve nurse retention. Retaining nurses in rural healthcare organizations is vital for success, patients' health outcomes, and overall financial performance. Study participants were leaders within six healthcare organizations in southern Ohio and West Virginia, including a hospital-owned physician practice and rural hospitals that experienced the same nurse-retention challenge. In the literature review, I identified a global issue with nurse retention. I recommend the following comprehensive combination of steps for rural healthcare leaders to take to improve nurse retention:

- Rural healthcare leaders must identify what travel nursing contracts offer to nurses and be competitive. Leaders can utilize bonuses or strategies such as increased tuition reimbursement to increase nurses' likelihood of staying in place.
- Study participants identified that improving benefits was a method they utilized to improve nurse retention. Leaders must work with stakeholders to identify the benefits that will increase competitive advantage with other facilities. Rural salaries and benefits are not as competitive as metro areas, but rural leaders can utilize the benefits of rural living to retain nurses, such as a lower cost of living. Nurses working in a rural environment can utilize the staff shortages to expand their clinical skills by working in a generalist capacity.

- Rural healthcare leaders used scheduling as a nonfinancial incentive to improve nurse retention. Nurses were allowed to provide insight on the schedule that would meet their needs and improve retention. Allowing nurses to provide input into the scheduling process should be used to reduce turnover.
- Rural healthcare leaders must continue identifying and developing relationships with local training schools for nurses. Offering internship opportunities and incentives for accepting positions with the organization upon graduation will help ensure a continued flow of nurses to the company. Leaders must establish a structured mentorship program with seasoned nurses to ensure competency of new hires. Mentors can ensure that the nurses are successful and do not experience burnout.
- Rural healthcare leaders should focus not just on recruitment, such as sign-on bonus opportunities, but also on how they can retain the qualified workforce they already employ. A task force of nurses from different departments and other key stakeholders should meet quarterly to discuss the issues that nurses are experiencing and the challenges surrounding retention. Leaders should implement any feasible ideas based on available financial resources.

Other researchers and rural healthcare leaders could utilize the results of this research study to identify strategies to improve nurse retention. To disseminate these important findings, I plan to share this information at nursing conventions and through publication in at least one medical journal.

Implications for Social Change

Nursing retention in rural health settings is critical to the leader's ability to provide adequate patient care and improve financial performance. Results of the study indicated that leaders who are proactive and comprehensive in their strategies could improve retention. Improving nurse retention allows leaders to have adequate staff to meet the patient care needs of the community.

In this study, rural healthcare leaders improved nursing retention by allowing flexible scheduling opportunities and a positive, supportive relationship with the leader. Participants allowed nurses to give insight into their department and holiday schedule. Being a part of the decision making process on the staff's schedule within the department has aided study participants with improving retention with their nurses. The nurse's relationship with the leader is critical to improving rural nursing retention. Study participants indicated that they had implemented leader rounding to improve communication and let staff know that their opinions and insight into how the organization operates are valuable to the leader and the organization. Improved communication can improve retention and ensure that patient care challenges are discussed and resolved to prevent potential adverse events. Improving patient health outcomes has a positive benefit to the financial impact potential lawsuits could pose to the organization when adverse events occur. The organization's reputation could improve, and patients could be at less risk of harm.

Several study participants indicated that they have a flow of students from local nursing schools that complete clinical rotations through various departments in the

organization. The students gain experience in the healthcare facility, and leaders can offer positions to those who meet the department's needs. Nurses with less than 6 months of experience are placed in charge nurse positions when they lack the experience to lead. Implementing a mentoring program can help improve patient health outcomes. Rural healthcare leaders can implement the strategies highlighted in the study to retain experienced nurses. Rural leaders must take proactive measures to improve retention.

Recommendations for Further Research

Further research is necessary on rural nursing retention as the study focused on a hospital owned physician practice and rural hospitals and participants in southern Ohio and West Virginia. The study results are not generalizable due to the focused geographic area. Additional studies would allow researchers to determine if similar themes would arise in other geographic areas. Further studies would help to identify if the critical themes identified in this research study are consistent between rural and metropolitan environments.

Limitations of my research study included the small sample size and limited geographic area of the organizations and study participants. The research methodology I used for this study may not have been the preferred method to garner additional participants. Individuals may have preferred an anonymous online survey tool versus an interview survey instrument. Researchers who wish to replicate the study may want to implement an online survey instrument to improve the response rate. Confidentiality clauses in further research studies may inhibit the ability to recruit participants, but I did not encounter this in my study.

Reflections

The DBA doctoral study process is not one that I entered lightly, but I did not realize the full impact of embarking on the journey. My initial coursework seemed to go well, and I was able to develop a schedule that seemed to work with my work and personal commitments. As the program continued, taking multiple courses while researching articles was a challenge, and it was sometimes difficult for me to determine what was a priority. The goals that I set for myself lacked the knowledge of the process. The expectations were not reasonable, and I faced many setbacks along the way. After receiving the IRB approval on my proposal, I thought the interview process would be a few weeks when in reality, it was 3 months due to individuals not responding to my requests for participation. The delays caused significant stress and financial impacts.

I minimized personal bias by completing member checking through participants' reviews of the interview summary and triangulating the data. Before the interviews with the study participants, I reviewed the organization's website of the participant. I recorded all interviews and transcribed with software to prevent my own bias from entering the results. I explored the facets of researcher bias and was able to mitigate personal bias when analyzing data and defining study themes and conclusions. Before my research study, I had noticed nurses' advertisements but was unaware of staffing shortages. Study participants implemented strategies to improve retention and address the issue. My results could help the participants develop additional strategies to impact nurse retention.

Conclusion

Nursing shortages in rural healthcare settings are a critical issue that must be addressed proactively and comprehensively by leaders and organizations. Rural leaders do not have an adequate supply of nurses to meet the demands of access to the system, impacting patient care and financial performance. More nurses of the baby boomer generation are reaching retirement age and leaving the workforce. Leaders of rural healthcare organizations can help fulfill nurse staff shortages by creating effective nurse retention financial incentives, establishing meaningful relationships with nurses, and augmenting competitive advantage job benefits.

References

- Abdalla, M. M., Lima Oliveira, L. G., Franco Azevedo, C. E., & Kuramoto Gonzalez, R. (2018). Quality in qualitative organizational research: Types of triangulation as a methodological alternative. *Administration: Teaching and Research*, 19(1), 66–98. <https://doi.org/10.13058/raep.2018.v19n1.578>
- Abutabenjeh, S., & Jaradat, R. (2018). Clarification of research design, research methods, and research methodology: A guide for public administration researchers and practitioners. *Teaching Public Administration*, 36(3), 237–258. <https://doi.org/10.1177%2F0144739418775787>
- Alluhidan, M., Tashkandi, N., Alblowi, F., Omer, T., Alghaith, T., Alghodaier, H., Alazemi, N., Tulenko, K., Herbst, C. H., Hamza, M., & Alghamdi, M. G. (2020). Challenges and policy opportunities in nursing in Saudi Arabia. *Human Resources for Health*, 18(1), 1–10. <https://doi.org/10.1186/s12960-020-00535-2>
- Alrawahi, S., Sellgren, S. F., Altouby, S., Alwahaibi, N., & Brommels, M. (2020). The application of Herzberg's two-factor theory of motivation to job satisfaction in clinical laboratories in Omani hospitals. *Heliyon*, 6(9), 1–9. <https://doi.org/10.1016/j.heliyon.2020.e04829>
- Al Sabei, S. D., Labrague, L. J., Miner Ross, A., Karkada, S., Albashayreh, A., Al Masroori, F., & Al Hashmi, N. (2020). Nursing work environment, turnover intention, job burnout, and quality of care: The moderating role of job satisfaction. *Journal of Nursing Scholarship*, 52(1), 95–104. <https://doi.org/10.1111/jnu.12528>

- Al Zamel, L. G., Lim Abdullah, K., Chan, C. M., & Piaw, C. Y. (2020). Factors influencing nurses' intention to leave and intention to stay: An integrative review. *Home Health Care Management & Practice*, 32(4), 218–228. <http://doi.org/10.1177/1084822320931363>
- Anabo, I. F., Elexpuru-Albizuri, I., & Villardón-Gallego, L. (2019). Revisiting the Belmont Report's ethical principles in internet-mediated research: Perspectives from disciplinary associations in the social sciences. *Ethics and Information Technology*, 21(2), 137–149. <https://doi.org/10.1007/s10676-018-9495-z>
- Anolak, H., Coleman, A., & Sugden, P. (2018). Is the “flipped” pedagogical model the answer to the challenges of rural nursing education? A discussion paper. *Nurse Education Today*, 66(2018), 15–18. <https://doi-org/10.1016/j.nedt.2018.03.026>
- Anselmann, V., & Mulder, R. H. (2020). Transformational leadership, knowledge sharing and reflection, and work teams' performance: A structural equation modelling analysis. *Journal of Nursing Management*, 28(7), 1627–1634. <https://doi.org/10.1111/jonm.13118>
- Ayre, J., & McCaffery, K. J. (2022). Research note: Thematic analysis in qualitative research. *Journal of Physiotherapy*, 68(1), 76–79. <https://doi.org/10.1016/j.jphys.2021.11.002>
- Baba, A., Martineau, T., Theobald, S., Sabuni, P., Nobabo, M. M., Alitimango, A., Katabuka, J. K., & Raven, J. (2020). Developing strategies to attract, retain and support midwives in rural fragile settings: Participatory workshops with health system stakeholders in Ituri Province, Democratic Republic of Congo. *Health*

Research Policy and Systems, 18(1), 1–14.

<https://doi.org/10.1186/s12961-020-00631-8>

Baldwin, J. R., Pingault, J. B., Schoeler, T., Sallis, H. M., & Munafò, M. R. (2022).

Protecting against researcher bias in secondary data analysis: challenges and potential solutions. *European Journal of Epidemiology*, 37(1), 1-10.

<https://doi.org/10.1007/s10654-021-00839-0>

Ballantyne, A., Moore, A., Bartholomew, K., & Aagaard, N. (2020). Points of contention:

Qualitative research identifying where researchers and research ethics committees disagree about consent waivers for secondary research with tissue and data. *PLoS ONE*, 15(8), 1–18.

<https://doi-org/10.1371/journal.pone.0235618>

Baloyi, O. B., & Jarvis, M. A. (2020). Continuing professional development status in the

World Health Organisation, Afro-region member states. *International Journal of Africa Nursing Sciences*, 13(2020), 1–7.

<https://doi.org/10.1016/j.ijans.2020.100258>

Bansal, P., Smith, W. K., & Vaara, E. (2018). New ways of seeing through qualitative

research. *Academy of Management Journal*, 61(4), 1189–1195.

<https://doi.org/10.5465/amj.2018.4004>

Barnes, H., Richards, M. R., McHugh, M. D., & Martsof, G. (2018). Rural and nonrural

primary care physician practices increasingly rely on nurse practitioners. *Health Affairs*, 37(6), 908–914. <https://doi.org/10.1377/hlthaff.2017.1158>

Beccaria, L., McIlveen, P., Fein, E. C., Kelly, T., McGregor, R., & Rezwanul, R. (2021).

Importance of attachment to place in growing a sustainable Australian rural health

workforce: A rapid review. *Australian Journal of Rural Health*, 29(5), 620–642.

<https://doi.org/10.1111/ajr.12799>

Beckett, C. D., Zadvinskis, I. M., Dean, J., Iseler, J., Powell, J. M., & Buck, M. B.

(2021). An Integrative Review of Team Nursing and Delegation: Implications for Nurse Staffing during COVID-19. *Worldviews on Evidence-Based Nursing*, 18(4), 251–260.

<https://doi.org/10.1111/wvn.12523>

Behera, M. R., Prutipinyo, C., Sirichotiratana, N., & Viwatwongkasem, C. (2019).

Retention of medical doctors and nurses in rural areas of Odisha state, India – A policy analysis. *International Journal of Workplace Health Management*, 12(4),

178–196. <https://doi-org/10.1108/IJWHM-05-2018-0057>

Bendezu-Quispe, G., Quijano-Escate, R., Hernández-Vásquez, A., Inga-Berrosipi, F., &

Condor, D. F. (2020). Massive open online courses for continuing education for nursing professionals in Peru. *Latin American Journal of Nursing*, 28(2020), 1–7.

<https://doi.org/10.1590/1518-8345.3803.3297>

Berman, L., Nkhoma, L., Prust, M., McKay, C., Teshome, M., Banda, D., Kabambe, D.,

& Gunda, A. (2021). Analysis of policy interventions to attract and retain nurse midwives in rural areas of Malawi: A discrete choice experiment. *PLOS one*,

16(6), 1–17. <https://doi.org/10.1371/journal.pone.0253518>

Bharath, M. (2021). Something beyond paycheque to boosting employee retention:

Evidence from a South Indian hospital. *Vilakshan-XIMB Journal of Management*,

Advance online publication, 1–16. <https://doi.org/10.1108/XJM-03-2021-0072>

Bloomfield, J., & Fisher, M. J. (2019). Quantitative research design. *Journal of the*

Australasian Rehabilitation Nurses' Association (JARNA), 22(2), 27–30.

<https://doi-org/10.33235/jarna.22.2.27-30>

Blouin, A. S., & Podjasek, K. (2019). The continuing saga of nurse staffing: Historical and emerging challenges. *Journal of Nursing Administration*, 49(4), 221–227.

<https://doi-org/10.1097/NNA.0000000000000741>

Braun, V., & Clarke, V. (2021). To saturate or not to saturate? Questioning data saturation as a useful concept for thematic analysis and sample-size rationales.

Qualitative Research in Sport, Exercise and Health, 13(2), 201–216.

<https://doi.org/10.1080/2159676X.2019.1704846>

Broome, M. E., & Sorensen Marshall, E. (2020) *Transformational Leadership in Nursing: From Expert Clinician to Influential Leader*, Springer Publishing Company.

<https://ebookcentral.proquest.com/lib/waldenu/detail.action?docID=6005330>.

Butt, R. S. (2018). Effect of motivational factors on job satisfaction of administrative staff in telecom sector of Pakistan. *Journal of Economic Development, Management, IT, Finance & Marketing*, 10(2), 47–57.

<https://doi.org/10.5296/hrr.v2i1.13672>

Cadena, S. J. J. (2019). Qualitative research: Interactions and experiences. *MedUNAB*, 22(3), 292–293. <https://doi.org/10.29375/01237047.3746>

Caldwell, J. T., Ford, C. L., Wallace, S. P., Wang, M. C., & Takahashi, L. M. (2016). Intersection of living in a rural versus urban area and race/ethnicity in explaining access to health care in the United States. *American Journal of Public Health*,

106(8), 1463–1469. <https://doi.org/10.2105/AJPH.2016.303212>

Calleja, P., Adonteng-Kissi, B., & Romero, B. (2019). Transition support for new graduate nurses to rural and remote practice: A scoping review. *Nurse Education Today*, 76(2019), 8–20. <https://doi.org/10.1016/j.nedt.2019.01.022>

Campbell, A. R., Kennerly, S., Swanson, M., Forbes, T., & Scott, E. S. (2021). Manager's influence on the registered nurse and nursing assistant relational quality and patient safety culture. *Journal of Nursing Management*, 1(2021), 1–10. <https://doi-org/10.1111/jonm.13426>

Campbell, M. J., Mansournia, M. A., & Lancaster, G. (2020). Methods matter: Pilot and feasibility studies in sports medicine. *British Journal of Sports Medicine*, 4(22), 1309–1310. <https://doi-org/10.1136/bjsports-2020-102631>

Campbell, S., Greenwood, M., Prior, S., Shearer, T., Walkem, K., Young, S., Bywaters, D., & Walker, K. (2020). Purposive sampling: Complex or simple? Research case examples. *Journal of Research in Nursing*, 25(8), 652–661. <https://doi-org/10.1177/1744987120927206>

Cao, X., & Chen, L. (2021). Relationships between resilience, empathy, compassion fatigue, work engagement and turnover intention in haemodialysis nurses: A cross-sectional study. *Journal of Nursing Management*, 29(5), 1054–1063. <https://doi.org/10.1111/jonm.13243>

Celikoglu, O. M., Krippendorff, K., & Ogut, S. T. (2020). Inviting ethnographic conversations to inspire design: Towards a design research method. *Design Journal*, 23(1), 133–152. <https://doi.org/10.1080/14606925.2019.1693209>

- Chipeta, E., Bradley, S., Chimwaza-Manda, W., & McAuliffe, E. (2016). Working relationships between obstetric care staff and their managers: A critical incident analysis. *BMC Health Services Research*, *16*(2016), 441–449.
<https://doi.org/10.1186/s12913-016-1694-x>
- Choi, S., Cho, E., Kim, E., Lee, K., & Chang, S.J. (2021). Effects of registered nurse staffing levels, work environment, and education levels on adverse events in nursing homes. *Scientific Reports*, *11*(1), 1–8.
<https://doi.org/10.1038/s41598-021-00946-8>
- Clark, K. R., & Vealé, B. L. (2018). Strategies to enhance data collection and analysis in qualitative research. *Radiologic Technology*, *89*(5), 482CT–485CT.
<https://www.tandfonline.com/loi/hebh20>
- Collard, S. S., Scammell, J., & Tee, S. (2020). Closing the gap on nurse retention: A scoping review of implications for undergraduate education. *Nurse Education Today*, *84*(2020), 1–8. <https://doi-org/10.1016/j.nedt.2019.104253>
- Colosi, B. (2020). National healthcare retention and R.N. staffing report. Nursing Solutions, Inc. <http://www.nsinursingsolutions.com>
- Cook, A., Sigler, C., Allen, L., Peters, J. A., Guthrie, C., Marroquin, M., Ndetan, H., Singh, K. P., Murry, J., Norwood, S., & Philley, J. V. (2021). Burnout and anxiety among trauma nursing specialties in a rural level I trauma center. *Journal of Trauma Nursing*, *28*(1), 26–36. <https://doi-org/10.1097/JTN.0000000000000554>
- Coustas, E. L. (2019). Factors impacting the retention of registered nurses recruited from India to work in South African hospitals: A case study. *International Journal of*

Africa Nursing Sciences, 10(2019), 6–13.

<https://doi-org/10.1016/j.ijans.2018.11.003>

Cox, C. A. (2019). Nurse manager job satisfaction and retention: A home healthcare perspective. *Nursing Management*, 50(7), 16–23.

<https://doi-org/10.1097/01.NUMA.0000558512.58455.68>

Craig, S. L., McInroy, L. B., Goulden, A., & Eaton, A. D. (2021). Engaging the senses in qualitative research via multimodal coding: Triangulating transcript, audio, and video data in a study with sexual and gender minority youth. *International Journal of Qualitative Methods*, 20(1), 1–12.

<https://doi-org/10.1177/16094069211013659>

Cristancho, S. M., Goldszmidt, M., Lingard, L., & Watling, C. (2018). Qualitative research essentials for medical education. *Singapore Medical Journal*, 59(12), 622–627. <https://doi.org/10.11622/smedj.2018093>

Cumyn, A., Ouellet, K., Côté, A.-M., Francoeur, C., & St-Onge, C. (2019). Role of researchers in the ethical conduct of research: A discourse analysis from different stakeholder perspectives. *Ethics & Behavior*, 29(8), 621–636.

<https://doi.org/10.1080/10508422.2018.1539671>

Curran, M. J., Rivera, R. R., Knaplund, C., Espinosa, L., & Cato, K. D. (2020). Engagement among psychiatric nurses: Is it different? How and why? *Nursing Management*, 51(8), 20–26.

<https://doi.org/10.1097/01.NUMA.0000688936.71663.0c>

Daniel, K. M., & Smith, C. Y. (2018). Present and future needs for nurses. *Journal of*

Applied Biobehavioral Research, 23(1), 1–5. <https://doi-org/10.1111/jabr.12122>

- Dobre, I., Davidescu, A. A., & Issa, M. T. (2017). Key factors of health employee motivation in Jordan. Evidence from dual-factor theory based on structural equation models. *Economic Computation & Economic Cybernetics Studies & Research*, 51(2), 39–54. <http://www.ecocyb.ase.ro/>
- Dousin, O., Collins, N., Bartram, T., & Stanton, P. (2020). The relationship between work-life balance, the need for achievement, and intention to leave: Mixed-method study. *Journal of Advanced Nursing*, 77(3), 1478–1489. <https://doi-org/10.1111/jan.14724>
- Doyle, D. (2018). Succession planning and the future of perioperative nursing leadership. *AORN Journal*, 108(2), 191–194. <https://doi.org/10.1002/aorn.12308>
- Dragga, S., & Voss, D. (2020). Research ethics is a tricycle not a unicycle: The role of researchers, reviewers and editors. *AMWA Journal: American Medical Writers Association Journal*, 35(4), 172–176. <https://www.amwa.org>
- Edwards-Dandridge, Y., Simmons, B. D., & Campbell, D. G. (2020). Predictor of turnover intention of registered nurses: Job satisfaction or work engagement? *International Journal of Applied Management & Technology*, 19(1), 87–96. <https://doi-org/10.5590/IJAMT.2020.19.1.07>
- Efendi, F., Kurniati, A., Bushy, A., & Gunawan, J. (2019). Concept analysis of nurse retention. *Nursing & Health Sciences*, 21(4), 422–427. <https://doi.org/10.1111/nhs.12629>
- Ellis, P. (2019). The language of research (part 20): Understanding the quality of a

qualitative paper (2). *Wounds UK*, 15(1), 110–111.

<http://www.wounds-uk.com/journal.shtml>

Ephraim, N. (2021). Mentoring in nursing education: An essential element in the retention of new nurse faculty. *Journal of Professional Nursing*, 37(2), 306–319.

<https://doi.org/10.1016/j.profnurs.2020.12.001>

Fareed, K., & Jan, F. A. (2016). Cross-cultural validation test of Herzberg's two-factor theory: An analysis of bank officers working in Khyber Pakhtunkhwa. *Journal of Managerial Sciences*, 10(2), 285–300. <http://www.qurtuba.edu.pk/>

Fields B.E., Bell J.F., Bigbee J.L., Thurston H, S.J. (2018). Registered nurses' preferences for rural and urban jobs: A discrete choice experiment. *International Journal of Nursing Studies*. 86(2018), 11–19.

<https://doi-org/10.1016/j.ijnurstu.2018.05.012>

Fletcher, K. A., Friedman, A., & Piedimonte, G. (2019). Transformational and transactional leadership in healthcare is seen through the lens of pediatrics. *Journal of Pediatrics*, 204(2019), 7–9.

<https://doi-org/10.1016/j.jpeds.2018.10.007>

Fofana, F., Bazeley, P., & Regnault, A. (2020). Applying a mixed methods design test saturation for qualitative data in health outcomes research. *PLOS ONE*, 15(6), 1–12. <https://doi-org/10.1371/journal.pone.0234898>

Fontes, K. B., Jacinto Alarcão, A. C., Santana, R. G., Pelloso, S. M., & de Barros Carvalho, M. D. (2019). Relationship between leadership, bullying in the workplace and turnover intention among nurses. *Journal of Nursing Management*,

27(3), 535–542. <https://doi-org/10.1111/jonm.12708>

Gadsden, T., Jan, S., Sujarwoto, S., Kusumo, B. E., & Palagyi, A. (2021). Assessing the feasibility and acceptability of a financial versus behavioural incentive-based intervention for community health workers in rural Indonesia. *Pilot and Feasibility Studies*, 7(1), 1–10. <https://doi.org/10.1186/s40814-021-00871-7>

Garza, J. A., & Taliaferro, D. (2021). Job satisfaction among home healthcare nurses. *Home Healthcare Now*, 39(1), 20–24.

<https://doi.org/10.1097/NHH.0000000000000921>

Geddis-Regan, A. R., Exley, C., & Taylor, G. D. (2021). Navigating the dual role of clinician-researcher in qualitative dental research. *JDR Clinical and Translational Research*, XX(X), 1–3. <https://doi-org/10.1177/2380084421998613>

Gensimore, M. M., Maduro, R. S., Morgan, M. K., McGee, G. W., & Zimbro, K. S. (2020). The effect of nurse practice environment on retention and quality of care via burnout, work characteristics, and resilience: A moderated mediation model. *JONA: The Journal of Nursing Administration*, 50(10), 546–553.

<https://www.doi-org/10.1097/NNA.0000000000000932>

George, J. E., Larmer, P. J., & Kayes, N. (2019). Learning from those who have gone before: Strengthening the rural allied health workforce in Aotearoa, New Zealand. *Rural & Remote Health*, 19(3), 1–9. <https://www.rrh.org.au/journal/article/4878>

Girma, F., Worku, F., Alayu, M., & Bizuneh, H. (2021). Turnover intention among health professionals working at primary public health facilities in Addis Ababa, Ethiopia: Facility based cross sectional study. *Primary Health Care: Open*

Access, 11(6), 1–6. <https://www.iomcworld.org>

- Gorgich, E., Arbabisarjou, A., Barfroshan, S., & Taji, F. (2017). Job satisfaction and external effective factors in operating room nurses working in educational hospitals in 2015: A cross-sectional questionnaire study. *Global Journal of Health Science*, 9(1), 74–81. <http://ccsenet.org/journal/index.php/gjhs>
- Goslee, E., Chesak, S., Forsyth, D. M., Foote, J., & Bergen, S. (2020). Implementation of a dedicated education unit model for ADN students in a rural primary care setting. *Nurse Educator*, 45(2), 97–101. <https://doi-org/10.1097/NNE.0000000000000711>
- Grah, B., Dimovski, V., Penger, S., Colnar, S., & Bogataj, D. (2021). Sustainability of health and care systems: Modelling the nursing employment dynamics in an ageing population. *Social Research: Journal for General Social Issues*, 30(2), 379–400. <https://doi.org/10.5559/di.30.2.10>
- Gray, L. M., Wong-Wylie, G., Rempel, G. R., & Cook, K. (2020). Expanding qualitative research interviewing strategies: ZOOM video communications. *The Qualitative Report*, 25(5), 1292–1301. <http://www.nova.edu/ssss/QR/index.html>
- Groenewald, T. (2018). Reflection/commentary on a past article: “A phenomenological research design illustrated.” *International Journal of Qualitative Methods*, 17(2018), 1–3. <https://doi-org/10.1177/1609406918774662>
- Guest, G., Namey, E., & Chen, M. (2020). A simple method to assess and report thematic saturation in qualitative research. *PLOS ONE*, 15(5), 1–17. <https://doi-org/10.1371/journal.pone.0232076>
- Haddad, L. M., & Toney-Butler, T. J. (2020). *Nursing shortage*. National Center for

Biotechnology Information, U.S. National Library of Medicine.

<https://www.ncbi.nlm.nih.gov/books/NBK493175/>

Hailay, A., Aberhe, W., Mebrahtom, G., Zereabruk, K., Gebreayezgi, G., & Haile, T.

(2020). Burnout among nurses working in Ethiopia. *Behavioural Neurology*,

2020(2020), 1–9. <https://doi.org/10.1155/2020/8814557>

Hall, J., Gaved, M., & Sargent, J. (2021). Participatory research approaches in times of

Covid-19: A narrative literature review. *International Journal of Qualitative*

Methods, 20(2021), 1–15. <https://doi.org/10.1177/16094069211010087>

Hamilton, J. B. (2020). Rigor in qualitative methods: An evaluation of strategies among

underrepresented rural communities. *Qualitative Health Research*, 30(2), 196–

204. <https://doi-org/10.1177/1049732319860267>

Hasani, F. (2020). Herzberg’s theory and job satisfaction of school nurses in Bahrain.

LIFE: International Journal of Health and Life-Sciences, 6(1), 1–16.

<https://dx.doi.org/10.20319/ijhls.2020.61.0116>

Herrero, P., Armellini, F., & Solar-Pelletier, L. (2020). Change management in the

context of the 4th Industrial Revolution: Exploratory research using qualitative

methods. *Journal of Modern Project Management*, 7(4), 1–22.

<https://doi.org/10.19255/JMPM02207>

Herzberg, F., Mausner B., & Snyderman, B. B. (1959). *The Motivation to Work*. John

Wiley.

Herzberg, F. (1966). *Work and the Nature of Man, first ed.* World Publishing Company.

Hines, S., Wakerman, J., Carey, T. A., Russell, D., & Humphreys, J. (2020). Retention

strategies and interventions for health workers in rural and remote areas: a systematic review protocol. *JBISIRIR*, 18(1), 87–96.

<https://www.doi-org/10.11124/JBISIRIR-2017-004009>

House, R. J., & Mitchell, R. R. (1974). Path-goal theory of leadership. *Journal of Contemporary Business*, 3(4), 81–97.

https://archive.org/details/pub_journal-of-contemporary-business?sort=-date

Hussain, M. K., & Khayat, R. A. M. (2021). The impact of transformational leadership on job satisfaction and organisational commitment among hospital staff: A systematic review. *Journal of Health Management*, 23(4), 614–630.

<https://doi.org/10.1177/09720634211050463>

Jahner, S., Penz, K., Stewart, N. J., & MacLeod, M. L. P. (2020). Exploring the distressing events and perceptions of support experienced by rural and remote nurses: A thematic analysis of national survey data. *Workplace Health & Safety*, 68(10), 480–490. <https://doi.org/10.1177/2165079920924685>

Johansen, L. J., Evanson, T. A., Ralph, J. L., Hunter, C., & Hart, G. (2018). Experiences of rural nurses who commute to larger communities. *Online Journal of Rural Nursing & Health Care*, 18(2), 224–264.

<https://doi.org/10.14574/ojrnhc.v18i2.540>

Johnson, J. L., Adkins, D., & Chauvin, S. (2020). A review of the quality indicators of rigor in qualitative research. *American Journal of Pharmaceutical Education*, 84(1), 138–146. <https://www.ajpe.org>

Jones, A., Rahman, R. J., & O, J. (2019). A crisis in the countryside-Barriers to nurse

recruitment and retention in rural areas of high-income countries: A qualitative meta-analysis. *Journal of Rural Studies*, 72(2019), 153–163.

<https://doi.org/10.1016/j.jrurstud.2019.10.007>

Ju, B., & Li, J. (2019). Exploring the impact of training, job tenure, and education-job and skills-job matches on employee turnover intention. *European Journal of Training & Development*, 43(3/4), 214–231.

<https://doi.org/10.1108/EJTD-05 2018-0045>

Kajamaa, A., Mattick, K., & de la Croix, A. (2020). How to do mixed-methods research.

The Clinical Teacher, 17(3), 267–271. <https://doi.org/10.1111/tct.13145>

Kang, D., & Evans, J. (2020). Against method: Exploding the boundary between qualitative and quantitative studies of science. *Science Studies*, 1(3), 930–944.

https://doi.org/10.1162/qss_a_00056

Kang, K. W., Jeong, H. T., Nam, Y. T., & Cho, E. K. (2021). Comparison of factors influencing job satisfaction by occupation in S tertiary hospital –Focused Herzberg’s motivation and hygiene factors. *Korean Journal of Clinical Laboratory Science*, 53(1), 96–104. <https://doi-org/10.15324/kjcls.2021.53.1.96>

Karagiozis, N. (2018). The complexities of the researcher’s role in qualitative research:

The power of reflexivity. *International Journal of Interdisciplinary Educational Studies*, 13(1), 19–31. <https://doi-org/10.18848/2327-011X/CGP/v13i01/19-31>

Kartika, L. W. (2018). Facilitators and barriers to health workforce retention in rural and remote setting of Indonesia: A literature review. *KnE Life Sciences*, 4(10), 140–

157. <https://doi.org/10.18502/cls.v4i10.3716>

- Kennedy, J. A., Jenkins, S. H., Novotny, N. L., Astroth, K. M., & Woith, W. M. (2020). Lessons Learned in Implementation of an Expert Nurse Mentor Program. *Journal for Nurses in Professional Development*, 36(3), 141–145. <https://doi.org/10.1097/NND.0000000000000624>
- Kenny, A., Dickson-Swift, V., DeVecchi, N., Phillips, C., Hodge, B., & Masood, Y. (2021). Evaluation of a rural undergraduate nursing student employment model. *Collegian*, 28(2), 197–205. <https://doi.org/10.1016/j.colegn.2020.07.003>
- Keyko, K., Cummings, G. G., Yonge, O., & Wong, C. A. (2016). Work engagement in professional nursing practice: A systematic review. *International Journal of Nursing Studies*, 61(1), 142–164. <https://doi-org/10.1016/j.ijnurstu.2016.06.003>
- Khalil, M., & Alameddine, M. (2020). Recruitment and retention strategies, policies, and their barriers: A narrative review in the Eastern Mediterranean Region. *Health Science Reports*, 3(4), e192–e202. <https://doi.org/10.002/hsr2.192>
- Kontogianni, F., Hope, L., Taylor, P. J., Vrij, A., & Gabbert, F. (2020). “Tell me more about this...”: An examination of the efficacy of follow-up open questions following an initial account. *Applied Cognitive Psychology*, 34(5), 972–983. <https://www.doi.org/10.1002/acp.3675>
- Korstjens, I., & Moser, A. (2018). Series: Practical guidance to qualitative research. Part 4: Trustworthiness and publishing. *European Journal of General Practice*, 24(1), 120–124. <https://doi-org/10.1080/13814788.2017.1375092>
- Krishnamoorthy, L., Muthuveloo, R., & Ping, T. A. (2020). The impact of non-financial incentives on intention to stay: A study among nurses in private hospitals in

Malaysia. *The Malaysian Journal of Nursing*, 12(1), 123–134.

<https://doi-org/10.31674/mjn.2020.v12i01.015>

Kyngäs, H. (2020). Qualitative Research and Content Analysis. In: Kyngäs, H.,

Mikkonen, K., Kääriäinen, M. (eds) *The Application of Content Analysis in Nursing Science Research*. Springer.

https://doi.org/10.1007/978-3-030-30199-6_1

Labrague, L. J., McEnroe-Petitte, D. M., Tsaras, K., Cruz, J. P., Colet, P. C., & Gloe, D.

S. (2018). Organizational commitment and turnover intention among rural nurses in the Philippines: Implications for nursing management. *International Journal of Nursing Sciences*, 5(4), 403–408. <https://doi-org/10.1016/j.ijnss.2018.09.001>

<https://doi-org/10.1016/j.ijnss.2018.09.001>

Lahiri, K., Indrasena, B. S. H., & Aylott, J. (2021). Unprecedented times in the

emergency department: “Board rounds” and leadership the missing links to improve patient flow? *Leadership in Health Services*, 35(1), 1751–1879.

<https://doi.org/10.1108/LHS-06-2021-0056>

Lanka, E., Lanka, S., Rostron, A., & Singh, P. (2021). Why we need qualitative research

in management studies. *RAC-Contemporary Administration Magazine*, 25(2), 1–

7. <https://doi.org/10.1590/1982-7849rac2021200297.en>

Lasala, K. (2017). Nursing workforce issues in rural and urban settings: Looking at the

difference in recruitment, retention and distribution. *Online Journal of Rural*

Nursing and Health Care, 1(1), 8–24. <https://www.rno.org/>

Lauritzen, H. H., Grøn, C. H., & Kjeldsen, A. M. (2021). Leadership matters, but so do

co-workers: A study of the relative importance of transformational leadership and

team relations for employee outcomes and user satisfaction. *Review of Public Personnel Administration*, Advance online publication, 1–27.

<https://doi.org/10.1177/0734371x211011618>

Leng-Hsien Soh, S., Lane, J., & Tan, C-W. (2020). Researcher as instrument: A critical reflection using nominal group technique for content development of a new patient-reported outcome measure. *International Practice Development Journal*, 10(2), 1–9. <https://doi-org/10.19043/ipdj.102.010copy>

Lester, J. N., Cho, Y., & Lochmiller, C. R. (2020). Learning to do qualitative data analysis: A starting point. *Human Resource Development Review*, 19(1), 94–106.

<https://doi.org/10.1177/1534484320903890>

Lima, Â. R. A., González, J. S., Ruiz, M. D. C. S., & Heck, R. M. (2020). Nursing interfaces in rural care: An integrative review. *Text & Context-Nursing*, 29(1), 1–14. <https://doi.org/10.1590/1980-265X-TCE-2018-0426>

Linneberg, M. S., & Korsgaard, S. (2019). Coding qualitative data: A synthesis guiding the novice. *Qualitative Research Journal*, 19(3), 259–270.

<https://doi-org/10.1108/QRJ-12-2018-0012>

Liu, Y., Aunguroch, Y., Gunawan, J., & Zeng, D. (2021). Job stress, psychological capital, perceived social support, and occupational burnout among hospital nurses. *Journal of Nursing Scholarship*, 53(4), 511–518.

<https://doi.org/10.1111/jnu.12642>

MacKay, S. C., Smith, A., Kyle, R. G., & Beattie, M. (2021). What influences nurses' decisions to work in rural and remote settings? A systematic review and meta-

synthesis of qualitative research. *Rural & Remote Health*, 21(1), 1–26.

<https://doi.org/10.22605/RRH6335>

Majeed, N., & Jamshed, S. (2020). Nursing turnover intentions: The role of leader emotional intelligence and team culture. *Journal of Nursing Management*, 29(2), 229–239. <https://doi-org/10.1111/jonm.13144>

Malatzky, C., Cosgrave, C., & Gillespie, J. (2020). The utility of conceptualizations of place and belonging in workforce retention: A proposal for future rural health research. *Health and Place*, 62(2020), 102279-102284.

<https://doi-org/10.1016/j.healthplace.2019.102279>

Mancuso, L., & Davidson, P. (2020). Thirty million strong. *American Journal of Nursing*, 120(5), 11. <https://doi.org/10.1097/01.NAJ.0000662720.40824.48>

Mango, E. (2018). Rethinking leadership theories. *Open Journal of Leadership*, 7(01), 57–88. <https://doi.org/10.4236/ojl.2018.71005>

Marć, M., Bartosiewicz, A., Burzyńska, J., Chmiel, Z., & Januszewicz, P. (2019). A nursing shortage—a prospect of global and local policies. *International Nursing Review*, 66(1), 9–16. <https://doi.org/10.1111/inr.12473>

Marufu, T. C., Collins, A., Vargas, L., Gillespie, L., & Almghairbi, D. (2021). Factors influencing retention among hospital nurses: Systematic review. *British Journal of Nursing*, 30(5), 302–308. <https://doi-org/10.12968/bjon.2021.30.5.302>

Mason-Bish, H. (2019). The elite delusion: Reflexivity, identity and positionality in qualitative research. *Qualitative Research*, 19(3), 263–276.

<https://doi-org/10.1177/1468794118770078>

- McCay, R., Lyles, A. A., & Larkey, L. (2018). Nurse leadership style, nurse satisfaction, and patient satisfaction: A systematic review. *Journal of Nursing Care Quality*, 33(4), 361–367. <https://doi-org/10.1097/NCQ.0000000000000317>
- Mehrad, A. (2020). Evaluation of academic staff job satisfaction at Malaysian universities in the context of Herzberg's motivation-hygiene theory. *Journal of Social Science Research*, 15(1), 157–166. <https://doi.org/10.24297/jssr.v15i.8725>
- Mlambo, M., Silén, C., & McGrath, C. (2021). Lifelong learning and nurses' continuing professional development, a metasynthesis of the literature. *BMC nursing*, 20(1), 1–13. <https://doi.org/10.1186/s12912-021-00579-2>
- Moalusi, K. (2020). Numbers conceal the intricacies in categorising qualitative research in organisational studies: What lies beneath the surface? *SA Journal of Industrial Psychology*, 46(0), e1–e12. <https://doi.org/10.4102/sajip.v46i0.1692>
- Moon, K., Blackman, D. A., Adams, V. M., Colvin, R. M., Davila, F., Evans, M. C., Januchowski-Hartley, S. R., Bennett, N.J., Dickinson, H., Sandbrook, C., Sherren, K., St. John, F. A. V., van Kerkhoff, L., & Wyborn, C. (2019). Expanding the role of social science in conservation through an engagement with philosophy, methodology, and methods. *Methods in Ecology and Evolution*, 10(3), 294–302. <https://doi.org/10.1111/2041-210X.13126>
- Moser, A., & Korstjens, I. (2018). Series: Practical guidance to qualitative research. Part 3: Sampling, data collection and analysis. *European Journal of General Practice*, 24(1), 9–18. <https://doi-org/10.1080/13814788.2017.1375091>
- Motulsky, S. L. (2021). Is member checking the gold standard of quality in qualitative

research? *Qualitative Psychology*, 8(3), 389–406.

<https://doi.org/10.1037/qup0000215>

Muddle, G. R. (2020). Relationship between leadership style and hospital employee engagement in Papua New Guinea. *Asia Pacific Journal of Health Management*, 15(4), 42–55. <https://doi-org/10.24083/apjhm.v15i4.441>

Nanjundeswaraswamy, T. S., & Divakar, S. (2021). Determination of sample size and sampling methods in applied research. *Proceedings on Engineering Sciences*, 3(1), 25–32. <https://doi-org/10.24874/PES03.01.003>

Nasser, A. A., & Al-Taie, A. K. B. (2021). The behavior of the security leader and its impact on achieving strategic initiatives within the framework of (path-goal) theory. *PalArch's Journal of Archaeology of Egypt/Egyptology*, 18(10), 1400–1415. <https://mail.palarch.nl/index.php/jae/index>

National Commission for the Protection of Human Subjects of Biomedical and Behavioral Research (1979). *The Belmont Report: Ethical Principles and Guidelines for the Protection of Human Subjects of Research*. U.S. Department of Health and Human Services.

<https://www.hhs.gov/ohrp/regulations-and-policy/belmont-report/index.html>

Ngozwana, N. (2018). Ethical dilemmas in qualitative research methodology: Researcher's reflections. *International Journal of Educational Methodology*, 4(1), 19–28. <https://www.ijem.com>

Northouse, P. G. (2019). *Leadership: Theory and practice* (8th ed.). Sage.

Nowak, H. E., & Scanlan, J. M. (2021). Strategy to stay ahead of the curve: A concept

analysis of talent management. *Nursing Forum*, 56(3), 717-723.

<https://doi-org/10.1111/nuf.12571>

Nowrouzi, B., Rukholm, E., Lariviere, M., Carter, L., Koren, I., Mian, O., & Giddens, E.

(2016). An examination of retention factors among registered nurses in

Northeastern Ontario, Canada: Nurses intent to stay in their current position.

Work, 54(1), 51–58. <https://doi-org/10.3233/WOR-162267>

Nurtjahjani, F., Wenand Batilmurik, R., & Dwi Pribadi, J. (2021). The influence of

transformational leadership style on work engagement remuneration dimediation

and educator motivation. *Journal of Management Applications*, 19(1), 11–22.

<https://doi.org/10.21776/ub.jam.2021.019.01.02>

O'Connor, P., Jimmieson, N. L., Bergin, A. J., Wiewiora, A., & McColl, L. (2021).

Leader tolerance of ambiguity: Implications for follower performance outcomes

in high and low ambiguous work situations. *Journal of Applied Behavioral*

Science, 58(1), 1–32. <https://doi.org/10.1177/00218863211053676>

Office of Human Research Protections (4, April 2021). *The Belmont Report*. United

States Department of Health and Human Resources.

<https://www.hhs.gov/ohrp/regulations-and-policy/belmont-report/index.html>

O'Kane, P., Smith, A., & Lerman, M. P. (2021). Building transparency and

trustworthiness in inductive research through computer-aided qualitative data

analysis software. *Organizational Research Methods*, 24(1), 104–139.

<https://doi-org/10.1177/1094428119865016>

Okereke, E., Eluwa, G., Akinola, A., Suleiman, I., Unumeri, G., & Adebajo, S. (2021).

- Patterns of financial incentives in primary healthcare settings in Nigeria: implications for the productivity of frontline health workers. *BMC research notes*, 14(1), 1–6. <https://doi.org/10.1186/s13104-021-05671-z>
- Paraskevopoulou-Kollia, E. A. (2019). Methodology of qualitative research: interviews and online interviews. *Open Education: The Journal for Open & Distance Education & Educational Technology*, 15(2), 24–37. <http://www.opennet.gr/>
- Park, H., & Yu, S. (2019). Effective policies for eliminating nursing workforce shortages: A systematic review. *Health Policy and Technology*, 8(3), 296–303. <https://doi.org/10.1016/j.hlpt.2019.08.003>
- Peterson, J. S. (2019). Presenting a qualitative study: A reviewer’s perspective. *Gifted Child Quarterly*, 63(3), 147–158. <https://doi-org/10.1177/0016986219844789>
- Pszczółkowska, D. (2020). Facebook recruitment and online interviewing—suitable for qualitative research in migration? *CMR Working Papers*, 119(0), 1–17. <https://www.migracje.uw.edu.pl>
- Rahman, M. S. (2017). The advantages and disadvantages of using qualitative and quantitative approaches and methods in language “testing and assessment” research: A literature review. 6(1), 102–112. <https://www.doi-org/10.5539/jel.v6n1p102>
- Rai, R., Thekkekara, J.V., & Kanhare, R. (2021). Herzberg’s two factor theory: A study on nurses’s motivation. *RGUHS Journal of Allied Health Sciences*, 1(1), 13–17. <https://rjahs.journalgrid.com/view/article/rjahs/36>
- Rana, R., K’Aol, G., & Kirubi, M. (2019). Influence of supportive and participative path-

goal leadership styles and the moderating role of task structure on employee performance. *International Journal of Research in Business and Social Science*, 8(5), 76–87. <https://doi-org/10.20525/ijrbs.v8i5.317>

Rohatinsky, N. K., & Jahner, S. (2016). Supporting nurses' transition to rural healthcare environments through mentorship. *Rural & Remote Health*, 16(1), 1–16.

<http://www.rrh.org.au>

Rohatinsky, N., Cave, J., & Krauter, C. (2020). Establishing a mentorship program in rural workplaces: Connection, communication, and support required. *Rural and Remote Health*, 20(1), 5640–5650. <https://doi-org/10.22605/RRH5640>

Rose, J., & Johnson, C. W. (2020). Contextualizing reliability and validity in qualitative research: toward more rigorous and trustworthy qualitative social science in leisure research. *Journal of Leisure Research*, 51(4), 432–451.

<https://doi-org/10.1080/00222216.2020.1722042>

Saunders, M. N. K., Lewis, P., & Thornhill, A. (2015). *Research methods for business students* (7th ed.). Pearson Education Limited.

Schroyer, C. C., Zellers, R., & Abraham, S. (2020). Increasing registered nurse retention using mentors in critical care services. *The Health Care Manager*, 39(2), 85–99.

<https://doi.org/10.1097/HCM.0000000000000293>

Sellers, K., Riley, M., Denny, D., Rogers, D., Havener, J.-M., Rathbone, T., & Gomez-Di Cesare, C. (2019). Retention of nurses in a rural environment: The impact of job satisfaction, resilience, grit, engagement, and rural fit. *Online Journal of Rural Nursing & Health Care*, 19(1), 4–42. <https://doi-org/10.14574/ojrnhc.v19i1.547>

- Shufutinsky, A. (2020). Employing use of self for transparency, rigor, trustworthiness, and credibility in qualitative organizational research methods. *Organization Development Review*, 52(1), 50–58.
https://cdn.ymaws.com/www.odnetwork.org/resource/resmgr/odreview/vol52/vol52no1-all_pages.pdf
- Shiells, K., Diaz Baquero, A. A., Štěpánková, O., & Holmerová, I. (2020). Staff perspectives on the usability of electronic patient records for planning and delivering dementia care in nursing homes: a multiple case study. *BMC Medical Informatics & Decision Making*, 20(1), 1–14.
<https://doi-org/10.1186/s12911-020-01160-8>
- Sirili, N., & Simba, D. (2021). It is beyond remuneration: Bottom-up health workers' retention strategies at the primary health care system in Tanzania. *PloS one*, 16(4), 1–15. <https://doi.org/10.1371/journal.pone.0246262>
- Sirili, N., Simba, D., Zulu, J. M., Frumence, G., & Tetui, M. (2021). Accommodate or reject: The role of local communities in the retention of health workers in rural Tanzania. *International Journal of Health Policy and Management*, 11(1), 1–8.
<https://doi.org/10.34172/ijhpm.2021.77>
- Smith, S., Sim, J., & Halcomb, E. (2019). Nurses' experiences of working in rural hospitals: An integrative review. *Journal of Nursing Management*, 27(3), 482–490. <https://doi-org/10.1111/jonm.12716>
- Smith, S., Lapkin, S., Sim, J., & Halcomb, E. (2020). Nursing care left undone, practice environment and perceived quality of care in small rural hospitals. *Journal of*

Nursing Management, 28(8), 2166–2173. <https://doi-org/10.1111/jonm.12975>

Sobaih, A. E. E., & Hasanein, A. M. (2020). Herzberg's theory of motivation and job satisfaction: Does it work for hotel industry in developing countries? *Journal of Human Resources in Hospitality & Tourism*, 19(3), 319–343.

<https://doi-org/10.1080/15332845.2020.1737768>

Sodidi, K. M & Jardien-Baboo, S. (2020). Experiences and mentoring needs of novice nurse educators at a public nursing college in the Eastern Cape. *Health SA Gesondheid: Journal of Interdisciplinary Health Sciences*, 25(0), e1–e8.

<https://doi.org/10.4102/hsag.v25i0.1295>

Sofer, D. (2018). Nurses pass the baton: Exit baby boomers, enter millennials: Can this shifting workforce circumvent a nursing shortage? *AJN American Journal of Nursing*, 118(2), 17–18. <https://doi-org/10.1097/01.NAJ.0000530237.91521.ee>

Soherwardy, A., & Crouch, E. (2020). Assessing initiatives for rural health practices in South Carolina. *American Journal of Undergraduate Research*, 17(3), 61–72.

<https://doi.org/10.33697/ajur.2020.028>

Spurlock, D. (2020). The nursing shortage and the future of nursing education are in our hands. *Journal of Nursing Education*, 59(6), 303–304. <https://healio.com>

Stafford, M., & Kuh, D. (2018). Expectations for future care provision in a population-based cohort of baby-boomers. *Maturitas*, 116(2018), 116–122.

<https://doi.org/10.1016/j.maturitas.2018.08.004>

Steele-Moses, S. K. (2021). Predicting medical-surgical nurses' work satisfaction and intent to stay. *Nursing Management*, 52(8), 16–25.

<https://doi.org/10.1097/01.NUMA.0000758672.01825.25>

Stenfors, T., Kajamaa, A., & Bennett, D. (2020). How to assess the quality of qualitative research. *The Clinical Teacher*, 17(6), 596–599.

<https://www-wiley-com.ezp.waldenulibrary.org/en-us>

Stewart, N. J., MacLeod, M. L., Kosteniuk, J. G., Olynick, J., Penz, K. L., Karunanayake, C. P., Kulig, J. C., Labrecque, M. E., & Morgan, D. G. (2020). The importance of organizational commitment in rural nurses' intent to leave. *Journal of Advanced Nursing*, 76(12), 3398–3417. <https://doi.org/10.1111.jan.14536>

Tashakkori, A., Johnson, R. B., & Teddlie, C. (2020). *Foundations of mixed methods research: Integrating quantitative and qualitative approaches in the social and behavioral sciences*. Sage Publications.

Terry, D., Peck, B., Baker, E., & Schmitz, D. (2021). The rural nursing workforce hierarchy of needs: Decision-making concerning future rural healthcare employment. *Healthcare*, 9(9), 1232–1249.

<https://doi.org/10.3390/healthcare9091232>

Thelwall, M., & Nevill, T. (2021). Is research with qualitative data more prevalent and impactful now? Interviews, case studies, focus groups and ethnographies. *Library and Information Science Research*, 43(2), 1–22.

<https://doi-org/10.1016/j.lisr.2021.101094>

Theofanidis, D., & Fountouki, A. (2018). Limitations and delimitations in the research process. *Perioperative Nursing*, 7(3), 155–163.

<https://www.doi.org/10.5281/zenodo.2552022gorgich>

- Toytok, E. H., & Acar, A. (2021). Organizational policy in schools and the relation between Herzberg's double factor hygiene motivation theory. *International Journal of Curriculum and Instruction*, 13(1), 93–113.
<https://www.ijci.wcci-international.org>
- Trus, M., Galdikiene, N., Balciunas, S., Green, P., Helminen, M., & Suominen, T. (2019). Connection between organizational culture and climate and empowerment: The perspective of nurse managers. *Nursing & Health Sciences*, 21(1), 54–62. <https://www.doi.org/10.1111/nhs.12549>
- Tyndall, D. E., Scott, E. S., Jones, L. R., & Cook, K. J. (2019). Changing new graduate nurse profiles and retention recommendations for nurse leaders. *Journal of Nursing Administration*, 49(2), 93–98.
<https://doi-org/10.1097/NNA.0000000000000716>
- Umamaheswari, S., Jayaseely, M. M., & Chandrasekar, A. (2021). Nurses performance—effect of work environment, work life balance and compensation in health care units—An empirical evidence. *Annals of the Romanian Society for Cell Biology*, 25(3), 2245–2253. <https://www.annalsofrscb.ro>
- van de Klundert, J., van Dongen-van den Broek, J., Yesuf, E. M., Vreugdenhil, J., & Yimer, S. M. (2018). 'We are planning to leave, all of us'—a realist study of mechanisms explaining healthcare employee turnover in rural Ethiopia. *Human Resources for Health*, 16(1), 1–13. <https://doi.org/10.1186/s12960-018-0301-0>
- Verma, J. P., & Abdel-Salam, A. G. (2019). *Testing statistical assumptions in research*. ProQuest Ebook Central <https://ebookcentral.proquest.com>

- Vindrola-Padros, C., & Johnson, G. A. (2020). Rapid techniques in qualitative research: A critical review of the literature. *Qualitative Health Research, 30*(10), 1596–1604. <https://doi-org/10.1177/1049732320921835>
- Wadams, M., & Park, T. (2018). Qualitative research in correctional settings: Researcher bias, western ideological influences, and social justice. *Journal of Forensic Nursing, 14*(2), 72–79. <https://www.doi.org/10.1097/JFN0000000000000199>
- Wakerman, J., Humphreys, J., Russell, D., Guthridge, S., Bourke, L., Dunbar, T., Zhao, Y., Ramjan, M., Murakami-Gold, L., & Jones, M. P. (2019). Remote health workforce turnover and retention: What are the policy and practice priorities? *Human Resources for Health, 17*(1), 1–8. <https://doi.org/10.1186/s12960-019-0432-y>
- Weaver, M. S., Wichman, B., Bace, S., Schroeder, D., Vail, C., Wichman, C., & Macfadyen, A. (2018). Measuring the impact of the home health nursing shortage on family caregivers of children receiving palliative care. *Journal of Hospice & Palliative Nursing, 20*(3), 260–265. <https://doi.org/10.1097/NJH.0000000000000043>
- Wood, L. M., Sebar, B., & Vecchio, N. (2020). Application of Rigour and Credibility in qualitative document analysis: Lessons Learnt from a case study. *The Qualitative Report, 25*(2), 456–470. <https://nsuworks.nova.edu/tqr/vol25/iss2/11/>
- World Health Organization. (2020). Improving retention of health workers in rural and remote areas: Case studies from WHO South-East Asia Region. <https://apps.who.int/iris/handle/10665/334227>

- Wubetie, A., Taye, B., & Girma, B. (2020). Magnitude of turnover intention and associated factors among nurses working in emergency departments of governmental hospitals in Addis Ababa, Ethiopia: A cross-sectional institutional based study. *BMC nursing*, *19*(1), 1–9.
<https://doi.org/10.1186/s12912-020-00490-2>
- Xie, Y., Gu, D., Liang, C., Zhao, S., & Ma, Y. (2020). How transformational leadership and clan culture influence nursing staff's willingness to stay. *Journal of Nursing Management*, *28*(7), 1515–1524. <https://doi.org/10.1111/jonm.13092>
- Xu, W., Pan, Z., Li, Z., Lu, S., & Zhang, L. (2020). Job burnout among primary healthcare workers in rural China: A multilevel analysis. *International Journal of Environmental Research and Public Health*, *17*(3), 727–745.
<https://doi.org/10.3390/ijerph17030727>
- Yasin, Y. M., Kerr, M. S., Wong, C. A., & Bélanger, C. H. (2020). Factors affecting nurses' job satisfaction in rural and urban acute care settings: A PRISMA systematic review. *Journal of Advanced Nursing*, *76*(4), 963–979.
<https://doi-org/10.1111/jan.14293>
- Yeong, M. L., Ismail, R., Ismail, N. H., & Hamzah, M. I. (2018). Interview protocol refinement: Fine-Tuning qualitative research interview questions for multi-racial populations in Malaysia. *Qualitative Report*, *23*(11), 2700–2713.
<http://www.nova.edu/ssss/QR/index.html>
- Yin, R. K. (2018). *Case study research and applications: Design and methods* (6th ed.). Sage.

- Yousaf, S. (2020). Dissection of Herzberg's two-factor theory to predict job satisfaction: Empirical evidence from the telecommunication industry of Pakistan. *The Lahore Journal of Business*, 8(2), 85–128.
<http://lahoreschoolofeconomics.edu.pk/Businessjournal/Lahorejournalofbusiness.aspx>
- Zahle, J. (2019). Data, epistemic values, and multiple methods in case study research. *Studies in History and Philosophy of Science*, 78(2019), 32–39.
<https://doi.org/10.1016/j.shpsa.2018.11.005>
- Zairul, M. (2021). Can member check be verified in real time? Introducing ARC (Asking, Record, Confirm) for member checking validation strategy in qualitative research. *Engineering Journal*, 25(1), 245–251. <https://doi.org/10.4186/ej.2021.25.1.245>
- Zapata, T., Buchan, J., Viroj Tangcharoensathien, Meliala, A., Karunathilake, I., Tin, N., Nandi, S., Tobgay, T., & Thinakorn Noree. (2020). Rural retention strategies in the South-East Asia Region: evidence to guide effective implementation. *Bulletin of the World Health Organization*, 98(11), 815–817.
<https://doi-org/10.2471/BLT.19.245662>
- Ziebert, C., Klingbeil, C., Schmitt, C. A., Stonek, A. V., Totka, J. P., Stelter, A., & Schiffman, R. F. (2016). Lessons learned: Newly hired nurses' perspectives on transition into practice. *Journal for Nurses in Professional Development*, 32(5), E1–E8. <https://doi.org/10.1097/NND.0000000000000278> PMID:27648910
- Zhang, Y. U., Wu, X., Wan, X., Hayter, M., Wu, J., Li, S., Hu, Y., Yuan, Y., Yongbin, L., Chaoya, C., & Gong, W. (2019). Relationship between burnout and intention

to leave amongst clinical nurses: The role of spiritual climate. *Journal of Nursing Management*, 27(6), 1285–1293. <https://doi-org/10.1111/jonm.12810>

Appendix A: Interview Questions

1. Based on your experience, how does running a rural healthcare facility affect your ability to retain nurses at your organization?
2. What strategies do you utilize to retain an adequate level of nurses in your organization?
3. What strategies has your organization implemented to retain nurses that have not worked, and, based on your experiences, why were they not successful?
4. What were the key barriers to implementing successful strategies for nurse retention?
5. How did you address the key barriers to implementing successful strategies for nurse retention?
6. How did you assess the effectiveness of the strategies for nurse retention?
7. What research does your organization conduct on why a nurse has left the organization?
8. What additional information would you like to share regarding your organization's nurse retention strategies?

Appendix B: Interview Protocol

Interview Protocol	
What you will do	What you will say—script
<p>Introduce the interview and set the stage—often over a meal or coffee</p>	<p>Script Thank you for consenting to completing this interview to answer questions surrounding the strategies that rural healthcare leaders utilize to retain nurses. I am in the final stages of researching the topic, and your insight can help shed light on the strategies utilized and the issues surrounding nursing retention in rural health.</p>
<ul style="list-style-type: none"> • Watch for non-verbal queues • Paraphrase as needed • Ask follow-up probing questions to get more in depth 	<ol style="list-style-type: none"> 1. Based upon your experience, how does running a rural healthcare facility affect your ability to retain nurses at your organization? 2. What strategies do you utilize to retain an adequate level of nurses in your organization? 3. What strategies has your organization implemented to retain nurses that have not worked, and, based upon your experiences, why were they not successful? 4. What were the key barriers to implementing successful strategies for nurse retention?

-
5. How did you address the key barriers to implementing successful strategies for nurse retention?
 6. How did you assess the effectiveness of the strategies for nurse retention?
 7. What research does your organization conduct on why a nurse has left the organization?
 8. What additional information would you like to share regarding your organization's nurse retention strategies?

Wrap up interview thanking participant

Script
Thank you for taking the time to answer the interview questions today on the strategies utilized to combat the challenges surrounding nursing retention. Your input is invaluable to helping answer the research question.
