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New Faculty Mentoring in Respiratory Care Programs

A dissertation

presented to

the faculty of the Department of Educational Leadership and Policy Analysis

East Tennessee State University

Johnson City, Tennessee

In partial fulfillment

of the requirements for the degree

Doctor of Education in Educational Leadership

by

Kristen Lawson McHenry

August 2017

Dr. James Lampley, Chair

Dr. Randy Byington

Dr. Don Good

Dr. Stephanie Tweed

Keywords: mentoring, higher education, respiratory care

ABSTRACT

New Faculty Mentoring in Respiratory Care Programs

by

Kristen Lawson McHenry

Because of the potential age-related mass departure of seasoned educators in respiratory care programs, higher education institutions should develop strategies for attracting practitioners who hold or are pursuing graduate degrees to transition to academia. The purpose of this study was to identify current mentoring practices of new faculty members in Commission on Accreditation for Respiratory Care (CoARC) accredited respiratory care programs in the U.S. and to identify the perceptions of program directors regarding the observed impact of program mentoring practices.

The methodology for the study was quantitative nonexperimental survey research. The survey instrument was an electronic questionnaire. The survey consisted of 25 items that were divided into 3 dimensions: mentoring practices, mentor/mentee relationship, and perceptions of mentoring program impact. Of the 410 possible participants, 126 (30%) responded to the survey. Data from the survey were used to analyze 12 research questions and 12 null hypotheses. Six research questions were analyzed using an independent-samples *t* test and 6 research questions were analyzed using a one-way analysis of variance. Testing of the null hypotheses associated with the 12 research questions resulted in 3 significant findings and 9 findings that were not significant.

Significant findings included female program directors reported greater opportunities for mentoring within their programs and greater levels of expectations in regard to mentoring. Associate degree programs also reported a higher level of expectation in regard to mentoring.

There was overwhelming agreement concerning the potential impact and benefit of new faculty mentoring on job performance, turnover, job satisfaction, and organizational commitment.

The results of this study may benefit administrators and educators in the field of respiratory care in efforts to support new faculty in higher education who may feel underprepared or overwhelmed in the new role. Because other allied health fields of study are similar in nature to respiratory care, the findings of the study could have potential implications across a range of health related professions.

DEDICATION

This dissertation is dedicated to everyone who has helped me achieve this life-long goal. First, my amazingly supportive husband, who I know for I fact I would not have been able to complete this journey without. For your continued support, listening ear, wonderful advice, and tireless work at home and with our son while I worked for hours on end every night. You are the absolute love of my life and the main reason I strive to be better in everything that I do. Thank you for who you are and what you do for our family- I love you, Collin.

To my very understanding toddler-aged son who did not always know why mommy could not drop everything and play. As you have gotten older, I enjoy every minute we get to spend together and I hope to never take your presence in my life for granted. I hope to set a good example for you to work hard towards your dreams and know you can accomplish anything. Your dad and I are so blessed to be your parents. You are going to make a great big brother one day!

To my parents who helped out any time we had a need and for their continued belief in their daughter. I certainly hope I have made you proud.

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CHAPTER 1

INTRODUCTION

New faculty in health related programs of study are often described as transitioning from one role: practitioner or clinician, to another vastly different role: educator or professor.

Gresham-Anderson (2015) stated “higher education is not a traditional career path for most respiratory therapists” (p. 29). During this transition a new identity has to be developed. The individual is used to being an expert in the clinical role and may now be considered a novice in the academy without having any formal teaching experience or preparation. This experience can be unsettling and result in turnover of the novice educator. Excessive faculty turnover could leave a potential shortage of educators in allied health programs, specifically in respiratory care. In 2009, the American Association for Respiratory Care (AARC) reported 75% of faculty from Commission on Accreditation for Respiratory Care (CoARC) accredited programs will retire by the year 2020. This finding was a result of the AARC’s annual human resource survey.

Although allied health practitioners are great in number, many of the disciplines face the same challenges: an aging professoriate, educators who identify more so with their practitioner background and training, scarcity of doctoral faculty, and lower research productivity compared to various academic counterparts. The addition of mentoring has been suggested by CoARC and others as a strategy to ensure faculty development, retention, and success. Chatburn (2004) stated “mentoring is the very life-blood of our profession” and is what keeps respiratory care alive (p. 305). In CoARC’s Accreditation Standards for Entry into Respiratory Care Professional Practice (2015), the agency affirms the postsecondary academic institution where the respiratory care program is housed is responsible for the continued professional growth of program faculty.

As evidence of compliance, sponsoring institutions' policies should demonstrate opportunity and support for such professional development activities (CoARC, 2015). According to the 2015 Report on Accreditation in Respiratory Care Education, the majority of program directors (PD) held a master's degree (54.2%) and the greater part of directors of clinical education (DCE) held a bachelor's degree (49.8%). The number of program directors and clinical education directors who held doctoral degrees was 13% and 2.7% respectively (CoARC, 2016). This finding confirms the scarcity of doctoral prepared faculty in accredited respiratory care programs. There were 55 permanent changes in program directors in 2015, 32.7% of which were a result of retirement (CoARC, 2016). With programmatic key personnel changes, the opportunity to and need for mentoring of new faculty and administrators is apparent. Retaining faculty will be essential with the potential loss of many valued members of the professoriate and in meeting the supply demands of the current respiratory workforce.

The Bureau of Labor Statistics (2015) reported a 12% expected growth for respiratory therapists from 2014 to 2024 in the Occupational Outlook Handbook. With the anticipated growth in the profession, respiratory care educators will be charged with meeting the increase in student demand. The AARC Respiratory Therapist Human Resource Survey from 2014 noted a 19% increase in the number of respiratory therapists (RT) between 2009 and 2014. The growth in the field may be because of the aging population, growing access to health insurance as a result of the Affordable Care Act, or the focus on reducing readmissions for certain conditions as set forth by the Centers for Medicare and Medicaid Services (CMS). The conditions in which readmission efforts are focused are those that respiratory care practitioners would be intimately involved: myocardial infarction, heart failure, pneumonia, and chronic obstructive pulmonary

disease. The influence of the aforementioned external pressures will continue to affect the direction and education standards of respiratory care programs.

Several studies (e.g. Anderson, 2009; Gresham-Anderson, 2015) have confirmed new faculty members feel overwhelmed or “drowning” in their new roles. Program directors have reported difficulty in recruiting new faculty to respiratory care programs because of a lack of teaching experience and the lack of academic credentials (Barnes, Kacmarek, & Durbin, 2011). Limitations in available faculty subsequently limit the amount of respiratory care students that can be accepted into programs. Practitioners who enter the academy often have the potential to return to clinical practice if the transition has not been positive. Greater faculty retention and job satisfaction could be achieved through the structured support and guidance afforded by peer mentoring.

Mentoring has the ability to impact job satisfaction, self-efficacy, faculty turnover, job performance, and organizational commitment. The first year of teaching, even with expert level content knowledge and experience within a field of study, can be challenging. Prior clinical expertise may be the impetus for accepting a position in higher education; however, it may not prepare the new faculty member for teaching and research endeavors. Protected time (decreased workload) during the first year of teaching with the addition of mentoring has been suggested as a possible strategy to help retain new faculty members (Gresham-Anderson, 2015).

Mentors, whether formally assigned or naturally developed, help protégés achieve self-defined goals and an appropriate work-life balance (Jackevicius et al., 2014). Mentors should possess traits such as being accessible, approachable, and encouraging (Berk, Berg, Mortimer, Walton-Moss, & Yeo, 2005). With the feelings of loneliness, isolation, and stress associated with

transitioning into a new role, mentoring can help facilitate new faculty socialization by connecting with colleagues. From a leadership perspective, mentoring can create a culture of investing in people and their continued success at the institution (Lumpkin, 2011). This investment can foster collegiality and respect among and between the communities of scholars.

New faculty often do not know what is expected of them within their role in the academy. It is the responsibility of both the institution and the faculty member themselves to ensure the transition into new roles is a smooth one. The process of socialization, which Tierney (1997) described as “a little more than a series of planned learning activities”, (p. 5) pertains to both new members of an organization and when current members take on new roles for which they are unfamiliar. Socialization involves making sense of a new role through an examination of one’s own prior experiences and through the current context and culture of an organization. “Socialization into the academy takes knowledge, time, and commitment” (Lumpkin, 2014, p. 199). In order for faculty to experience professional growth and career development, they must know what is needed to survive and excel in the organization.

Individuals change when they enter a new workplace and faculty needs vary depending on the point in one’s professional career. If faculty and organizations are to function optimally, an understanding of institutional culture and socialization should be pursued. New faculty may find it challenging to navigate the intricacies of the culture of an institution or academic unit. Lumpkin (2014) suggested “context, culture, and socialization affect whether faculty successfully thrive within higher education” (p. 197). Mentoring can play an important role in the socialization process. To be successful mentoring efforts must have administrative support. When new faculty are provided with constructive feedback in a nurturing environment, they become more connected to the institution that employs them. New faculty seek career-related

guidance from organizational insiders who have successfully navigated the promotion and tenure process. The connectedness and increased loyalty to the institution results in a more stable work environment; which makes the institutional impact of mentoring just as beneficial as the success of the new faculty member.

Statement of the Problem

The experiences in the first year of teaching have been reported to be a determining factor in faculty retention or exodus. The projected shortage of respiratory care faculty could result in having to accept fewer students into those allied health programs. The use of mentoring can be a source of support and guidance for novice educators, help to sustain and potentially grow the profession, promote respect and collegiality among colleagues, and enjoyed throughout an educator's career. While leaders in the field of respiratory care recognize the importance of mentoring, a broad-scale study regarding program mentoring practices could not be located. With the potential mass departure of seasoned educators in respiratory care programs, higher education institutions must develop strategies for attracting practitioners who hold or are pursuing graduate degrees to transition to academia. Succession planning may involve initiatives focused on retaining new educators and further developing their professional academic skills.

Faculty stress can be the result of internal pressures or external responsibilities. Stress can originate from time constraints, lack of personal time, high expectations associated with faculty work, teaching load, and work-life balance associated with family. Stress can have a direct impact on both intent to leave an organization and leaving the academy altogether (Ryan, Healy, & Sullivan, 2012; Xu, 2008). Job satisfaction has been linked to compensation, the work itself, level of autonomy, relationships with administration, and institutional climate and culture. A decrease in job satisfaction may also increase the likelihood a faculty member will voluntarily

exit the field of higher education. Allied health professions and those in medicine are often categorized as hard applied disciplines. Faculty within these fields of study, especially women, experience different challenges and may require additional support from an institution to prevent premature exodus from the academy.

The purpose of this quantitative, nonexperimental survey research study was to identify current mentoring practices of new faculty members in CoARC accredited respiratory care programs in the U.S. Furthermore, the researcher sought to identify the perceptions of program directors regarding the observed impact of program mentoring practices. The dependent variables were the three dimensions on the survey: mentoring practices, the mentor/mentee relationship, and perceptions of mentoring impact among respiratory care programs. Independent variables will include demographic region of the respiratory care program, level of degree awarded by the respiratory care program, academic rank of program director, and gender of the respiratory care program director. Program directors from each of the accredited programs listed on the CoARC database were selected to be sent an electronic survey.

Research Questions

To determine the mentoring practices of CoARC accredited respiratory care programs and to identify the perceptions of program directors regarding the impact of mentoring, the following questions guided this study.

1. Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West)?

2. Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on level of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?
3. Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on academic rank of the program director (Instructor, Assistant Professor, Associate Professor, or Full Professor)?
4. Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on gender of the program director?
5. Is there a significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West)?
6. Is there a significant difference in the mean score for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?
7. Is there a significant difference in the mean score for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on academic rank of program director (Instructor, Assistant Professor, Associate Professor, or Full Professor)?

8. Is there a significant difference in the mean score for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on gender of the program director?
9. Is there a significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West)?
10. Is there a significant difference in the mean score for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?
11. Is there a significant difference in the mean score for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on academic rank of program director (Instructor, Assistant Professor, Associate Professor, or Full Professor)?
12. Is there a significant difference in the mean score for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on gender of the program director?

Significance of the Study

The results of this study may benefit administrators and educators in the field of respiratory care in efforts to support new faculty in higher education who may feel underprepared or overwhelmed in the new role. The transition from clinician to educator can be unsettling and mentoring may help retain new respiratory care faculty members. Because other

allied health fields of study are similar in nature to respiratory care, the findings of the study could have potential implications across a range of health related professions. Educators who are comfortable in their roles and are made to feel valued by the institution will likely be more productive and committed to the program. Mentoring new faculty may also lead to a cycle of mentoring between faculty and students and among colleagues. The study may also have additional benefit to specific members of the academy: women and clinical faculty; considering the likelihood of these subpopulations having less access to mentoring opportunities.

A study on the transitional experiences of 11 respiratory care faculty members with five or fewer years' experience teaching in a baccalaureate program has recently been published (Gresham-Anderson, 2015). Multiple studies in nursing and various other health-related disciplines have been documented; however, a study regarding mentoring practices in respiratory care programs has left a gap in the literature. Implications of the study may reveal a lack of effective mentoring in respiratory care programs and the need to further cultivate this practice. The study results may also indicate successful new faculty mentoring and serve as valuable evidence for developing best practices within the field of respiratory care.

Definitions of Terms

The following definitions of terms have special meaning within the study.

1. Allied health- Health professions that are distinct from medicine and nursing; including respiratory therapists (ASAHP, 2016, para 1).
2. Commission on Accreditation for Respiratory Care- Independent accrediting body for respiratory care programs; recognized by the Council for Higher Education Accreditation (CoARC, 2016).

3. Degree level- CoARC accredited programs were categorized into one of three possible degree awarding programs: Associate's, Bachelor's, or Master's (CoARC, 2015).
4. Demographic region- CoARC accredited programs were categorized into one of four possible regions: Northeast, Midwest, South, or West (CoARC, 2016).
5. Mentoring- Means of facilitating professional development of new faculty (Feldman, Areal, Marshall, Lovett, & O'Sullivan, 2010).
6. New faculty- Those with teaching responsibilities within a higher education setting with 3 years or less experience (Schriner, 2007).
7. Novice- One with no experience with the situation in which they are now expected to perform tasks (Benner, 1982).
8. Practitioner- A person actively engaged in a medical profession; as in a respiratory care practitioner (ASAHP, 2016).
9. Program director- Full-time faculty member responsible for all aspects of the program, both administrative and educational (CoARC, 2015, p. 11).
10. Respiratory care program- An organized system designed to provide students with the opportunity to acquire the competencies needed to participate in the respiratory care profession; includes the curriculum and the support systems required to implement the sequence of educational experiences (CoARC, 2015, p. 48).

Limitations and Delimitations

The study was delimited to respiratory care faculty members who served as program directors in CoARC accredited programs during March 2017 through May 2017. Survey links were sent to formal institution sponsored email addresses only. All states with the exception of Alaska had at least one CoARC accredited respiratory care program and appointed director. It

was assumed only respiratory care program directors who were sent the survey actually completed it and that program directors completed the survey only once. Participants had an equal chance of being chosen to take part in the survey because of their administrative role and available contact information. Data were limited to CoARC accredited respiratory care programs and may not be generalizable to other populations. The instrument was researcher developed and only those questions that were approved by an expert panel were included in the survey. Further, a reliability analysis was used to determine which questions on the instrument were used in the final questionnaire.

Overview of the Study

This study is organized into five chapters. Chapter 1 included a brief introduction to the topic under investigation, the statement of the problem, specific research questions, significance of the study, definitions of terms, limitations, and delimitations of the study. Chapter 2 included a review of the literature on the transition from clinician to educator, faculty turnover and retention, and mentoring. Chapter 3 described the research methodology used in the study and includes information pertaining to sample selection, instrumentation, data collection, and data analysis. Chapter 4 presented the findings of the study. Chapter 5 included a summary of the findings, conclusions, discussion of implications, and recommendations for future practice.

CHAPTER 2

REVIEW OF LITERATURE

A search for literature pertaining to faculty mentoring yielded a great number of results. However, when the exploration was limited to faculty mentoring in the profession of respiratory care, the literature was not as robust. This occurrence led to the examination and ultimate inclusion of additional professions within allied health and nursing because of the similarities in clinical education and experience. This chapter is organized into three overarching sections: the transition from clinician to educator, faculty turnover and retention, and mentoring. Within the independent sections further topics such as sensemaking, socialization, job stress, job satisfaction, person-organization-fit (POF), and specifics of mentoring programs are discussed. The review of the literature explored studies relevant to the current topic under investigation.

Transition from Clinician to Educator

Clinicians who decide to enter academia experience significant modifications in way of thinking but also in day-to-day responsibilities. Multiple studies were examined that reported on the transitional aspect of becoming a faculty member in higher education. Schriener (2007) sought to describe how cultural differences and similarities affected the transition of nurses into faculty roles. Schriener's study was qualitative in nature and used the phenomenological method of ethnographic inquiry. Seven participants were included in the study and criteria included having a full-time faculty appointment and 3 years or less in the faculty role. Interviews and on-site observations were used as methods to obtain data on the transitional experiences. The participants were faculty with or without a doctoral degree. Six main themes surfaced as a result of the data analysis and included the following: "stressors and facilitators of the transition,

deficient role preparation, changing student culture, realities of clinical teaching and practice, hierarchy and reward, and cultural expectation versus cultural reality” (p. 47).

One of the major findings of Schriener’s (2007) study was the apparent struggles of clinical faculty because of the lack of proximity to the institution, resources, and colleagues. Participants in the study questioned their effectiveness as a teacher due to a perceived lack of educational preparedness for the new role. This finding is consistent with the belief that being an expert clinician does not always prepare the novice educator for successful teaching strategies. Additionally, a disconnect was identified between the reward system in the health care setting (clinical competence and expertise) and the academic setting (promotion and tenure). The greatest amount of praise in higher education is often a result of scholarly research and funding, which novice educators with clinical responsibilities rarely have sufficient time to pursue. Participants also felt a sense of unworthiness if a doctoral degree had yet to be earned lowering the self-confidence of the new educator. Schriener concluded there was a dissension between clinical nursing and faculty work and the values of both roles needed to come together for the success of the individual. Suggestions for the improvement in this phenomena included increasing nursing graduate programs focused on education, involvement in formal mentoring programs, and provisions for clinical faculty.

Anderson (2009) attempted to describe and explain the work-role transition of clinical experts who become novice nurse educators. The work-role transition in this study was defined as “the human experience associated with entering a new community of practice” (p. 203). The study consisted of interviews with 18 participants from 14 different baccalaureate nursing programs from four Midwestern states. The common themes that surfaced led to the “sea of academia” analogy that consisted of six tiers of transitioning. The themes identified were sitting

on the shore, splashing in the shallows, drowning, treading water, beginning strokes, and throughout the waters.

The participants were depicted as needing to live in two worlds: the clinical environment and academia. The drowning theme found in Anderson's 2009 study is consistent with Shriner's 2007 theme of stressors during the transition. Similarly, both Anderson and Schriner reported participants feeling under-credentialed in the academic community that accompanied self-doubt concerning their abilities and performance as educators. Anderson (2009) concluded that mentoring could serve as the necessary support for novice faculty in the nursing discipline and a terminal point (sense of order and stability) in the transition would occur. Finding balance and regaining self-confidence is an important component of the continual development of the novice educator who was led to academia because of clinical expertise and years of experience in a field of study.

Clark, Houten, and Perea-Ryan (2010) offered a guide for success in regard to transitioning from clinical practice to academia. While this work is more of a reflection on an individual's career and the challenges that were faced, informal interviews with two novice nursing faculty members were conducted. Both of the novice faculty members held a master's degree. "A master's prepared professor is a rarity" (p. 105). It has been established novice faculty often feel unfit for the new role (Anderson, 2009; Schriner, 2007). However, novice educators are still held to the same teaching, research, and service standards for advancement in the academy regardless of academic preparation (Clark et al., 2010). Anticipatory socialization may not occur if the health care practitioner's graduate degree is not within education. Without the acquisition of institutional norms coupled with the challenges novice educators face, role stress is likely to occur.

Factors contributing to role stress included ambiguity, incongruity, conflict, and overload. If the novice educator believes institutional policies and norms are not well-defined, if the person-organization-fit (POF) is not ideal, or difficulty in fulfilling obligations is experienced the individual may have job dissatisfaction and a decreased commitment to the organization (Clark et al., 2010). Reflections from the novice educators and co-authors of the study encompassed feelings of role strain and the absolute need for support from the institution from the very beginning of the academic appointment. The novice educators' main priority was teaching; time constraints prevented much contribution to research and service. Reflections from the tenured professor, chair of the nursing department, and primary author were the acknowledgement of the difficulty in the transition and ways in which to ease the process. One of the recommendations from Clark was to use formal and informal mentoring programs to help facilitate the socialization of the new faculty member and to improve teaching skills.

To seek ways in which to further ease the transition of clinical nurses into the academy, Specht (2013) studied the impact of mentoring on levels of role conflict and role ambiguity in novice nursing faculty. There were 224 participants in the descriptive, comparative, and correlational study. Inclusion criteria consisted of nursing faculty who had held faculty positions for less than 5 years. 86% of participants reported being mentored, whereas 14% reported not being mentored. Results of the study were participants who had been mentored reported lower levels of both role conflict and role ambiguity (Specht, 2013). Additionally, higher quality mentoring had a positive effect on reported levels of role ambiguity. The author also noted the age of those who reported being mentored was significantly less than those who were not mentored. Mentoring has the potential to decrease role strain of novice faculty leading to an increased likelihood of continuation of the faculty position (Specht, 2013).

McDonald (2010) provided a narration of one nursing faculty member's accounts of the transition to clinical nurse educator as well as the review of the literature to validate the experience. McDonald stated new educators do not always understand the vastness of the role and that the transition can be a humbling and difficult experience. The author arranged the themes from the literature review and from personal experience into three categories: knowledge deficit, culture and support, and salary and workload. McDonald, like Anderson (2009), discussed the dual obligations of teacher and practitioner. The author concluded that "a mentor may mean the difference between retention and exodus from the academic setting" of the new nurse educator (McDonald, 2010, p. 131). This intimate exploration of the transitional experience also highlighted the importance and relevance of mentoring throughout one's career. Mentoring was noted as a necessity for personal and professional support of the novice educator (McDonald, 2010). Support and guidance through the culture shock and stress of the transition is a recurring responsibility of mentors throughout the literature (Anderson, 2009; McDonald, 2010; Schriener, 2007).

Murray, Stanley, and Wright (2014) conducted a qualitative meta-synthesis of the literature concerning the transition from clinician to the academy in nursing and allied health. The literature was limited to studies published between 2001 and 2011 and was further reduced to analysis of seven studies meeting inclusionary criteria. The above mentioned study conducted by Anderson (2009) was included in the meta-synthesis. The central theme reported in the study was that of an identity shift in participants and the four phases of adjustment or transition. The four phases included: feeling new and vulnerable, encountering the unexpected, doing things differently, and evolving into an academic. Feeling vulnerable was represented by becoming a beginner (novice) and feeling under-credentialed.

The unexpected was characterized by feeling ill-prepared for the role and not being fully aware of the responsibilities and demands of higher education. Participants noted academic work was ongoing and it took longer than expected to learn how to teach which led to frustration (Murray et al., 2014). The third phase dealt with the differing cultures of the clinical environment and academia. Participants felt roles lacked structure and definition and academic work felt more individualistic than team-centered. Evolving into an academic took between one and three years and through mostly trial and error. Though mentoring from more experienced colleagues was mentioned as an occurrence, the greatest mutual support stemmed from other relatively inexperienced academics in four of the studies included in the meta-synthesis. Because novice educators often spend more time preparing for teaching, the authors discussed how mentoring could help provide support for the allocation of the new faculty member's efforts in teaching, research, and service.

Pinto Zipp, Maher, and Falzarano (2014) sought to discover the mentoring practices of physical therapy (PT) entry-level programs for new full-time PT faculty. Additional objectives of the study were to gain an understanding of the perceived stress associated with being a new faculty member and obtaining faculty perceptions concerning the benefits, challenges, and functions of the faculty mentoring relationship. The researchers approached full-time PT faculty who had yet to earn tenure and solicited responses by using the Health Sciences Faculty Mentoring Survey. There were 66 respondents in the study. Only one participant reported having a formal mentoring program. Concerning level of stress associated with the academic's role, 60.6% of participants reported moderate to extreme stress associated with the transition from clinician to faculty.

Gresham-Anderson (2015) attempted to gain an understanding of the transitional experiences of new respiratory care faculty that had entered academia. This is the first published study of its kind for the profession. The study included 11 participants who had 5 years or fewer experience teaching in a baccalaureate respiratory therapy program. Five common themes emerged: underprepared, challenged, overwhelmed, personal responsibility, and reward. Based on those findings, three recommendations were brought forth: 1) personalized orientation and training to prevent the need to self-teach aspects of the new role and increase preparedness, 2) provide new faculty with assigned mentors to increase the level of support and guidance to help overcome some of the new challenges sure to be faced, and 3) protected time during the first year of teaching to help acclimate to the new environment and develop an appropriate work-life balance (Gresham-Anderson, 2015). Each of the transitional studies reviewed had parallel findings of feeling underprepared, becoming overwhelmed, and the benefits of mentoring in the transitional experience, faculty retention, and continued faculty development. Hessler and Ritchie (2006) stated when the transition is complete; novices will feel more confident and able to confront additional challenges.

Though outside the realm of health sciences, LaRocco and Bruns (2006) examined the perceptions of second career academics and their transition to higher education. Second career academics were defined as those who were practicing professionals in an education-related field for at least 3 years prior to their academic appointment. The description of a second career academic is similar to that of an allied health practitioner who has transitioned to education. There were 11 participants in this qualitative exploratory study. Major findings included new faculty experiencing difficulty achieving an appropriate work-life balance, a lack of preparation to meet all academic responsibilities, and supportive relationships that helped the educator adjust

to the new environment (LaRocco & Bruns, 2006). Unique to this study was the self-reported responsibility in putting work first. This finding may have implications across a range of disciplines in that new faculty often possess a strong personal desire to make progress toward promotion and tenure in the time frame allocated by the individual institution.

The Academic Novice

Clinicians who transition to academia are considered novices. Using Benner's 1982 definition, a novice is a beginner who has "no experience with the situations in which they are expected to perform tasks" (p. 403). Benner derived the skill acquisition model for nursing from the Dreyfus model. Just as a clinician would progress through the five stages of skill acquisition, the model could also be used for clinicians turned educators adjusting to new job demands. The remaining stages of the model consist of the advanced beginner, competent, proficient, and expert. Though the time spent in each stage varies based on the individual's pace, competence may become apparent within 2 to 3 years (Benner, 1982). This time frame somewhat coincides with the tenure-track midpoint review. Though many studies have been published since the application of the skill acquisition model to nursing, Benner did note mentors can play a significant role within the novice and advanced beginner stages by serving as a guide. Benner also reported expert nursing clinicians had difficulty expressing their deep understanding of a topic as a result of their high intuitive grasp. This may be of importance within the field of higher education that often relies on experienced tenured faculty members to serve as mentors.

Academic preparation

An allied health practitioner is characterized as being a separate but nonetheless instrumental part of the health care workforce from nursing, advanced practitioners, and those

holding clinical doctorates. However, all health care professionals are responsible for abiding by and contributing to evidence-based practice (Arena, Goldberg, Ingersoll, Larsen, & Shelledy, 2011). Most health care professionals who transition to education are hired to do so because of their prior clinical expertise (Romig, Maillet, & Denmark, 2011). Some institutions report difficulty in locating faculty with the appropriate academic preparation and degrees which can result in a shortage of qualified faculty. This shortage may ultimately limit the number of students that can enroll in those health-related programs of study (Barnes, Gale, Kacmarek, & Kageler, 2010; Kacmarek et al., 2009; Romig et al., 2011). A survey of respiratory therapy education program directors in the U.S. revealed an inadequate number and availability of faculty to be one of the largest barriers to accepting additional students into respiratory therapy programs (Barnes et al., 2011). Furthermore, Barnes et al. found program directors reported recruitment of faculty a problem because of a lack in teaching experience, insufficient salary, and the absence of academic credentials. The finding associated with salary corresponds with that of McDonald (2010) who stated a competitive compensation correlates with motivation to be successful. If higher education institutions cannot afford to pay even new educators commensurate salaries, the individuals may return to clinical practice where their expertise and contributions will be valued.

Junior faculty in allied health sciences typically acquire education meant to begin or develop the individual as a practitioner with training focused on clinical practice (Kahanov, Eberman, Yoder, & Kahanov, 2012). This type of academic preparation does not always introduce topics such as pedagogy, classroom management, curriculum design, student advising, and evaluations, or research that would be an expectation of even a novice faculty member. In some cases new allied health faculty may also retain clinical responsibilities part-time, either

voluntarily or through assigned faculty workload. With essentially no academic background to enter the role of educator, the clinicians become beginners in the new environment. Romig et al. (2011) stated these individuals have the option to leave higher education and return to professional practice in the specific discipline. This may be a factor in organizational commitment and retaining allied health faculty due to the fallback opportunities present.

Arena et al. (2011) noted this type of academic education is not sufficient to prepare new educators for “arduous scholarly endeavors” (p. 163). At a lecture at the 49th International Respiratory Congress, Chatburn (2004) remarked that getting involved in research is demanding, frustrating, and stressful and requires courage to persevere. Gresham-Anderson’s (2015) study of 11 junior faculty members (taught less than 5 years) from respiratory therapy baccalaureate programs revealed five common themes or experiences with the first being a feeling of under preparedness. Only one participant had formal training in education and preparation for teaching in academia that clearly had an effect on comfort level during the transition. Multiple studies reported participants feeling ill-prepared for the new role either because of no teaching experience or a lack of a doctoral degree (Clark et al., 2010 & Schriener, 2007). This lack of formal academic preparation to enter academia was also found in a study of new PT faculty. Pinto Zipp et al. (2014) reported teaching strategies as the most prevalent topic of discussion between mentors and mentees and acquiring knowledge specific to teaching responsibilities as the second highest cause of moderate to extreme levels of stress in new faculty.

Sensemaking

Sensemaking is the process of creating order and making retrospective rationale accounts of the situations that new institutional members find themselves in (Mendoza, 2008). This is

done to create a sense of stability and meaning in an unfamiliar environment. The process of sensemaking is continuous and should be expeditious because reality frequently changes. New faculty become sense makers, attempting to learn the shared knowledge of the organization from those who are more accustomed to the institution. Organizational culture can guide sensemaking and is never an individualistic process (Mendoza, 2008). New members can bring beliefs from previous experiences into the present, but seasoned members can offer the history and traditions of the organization making them a vital part to the socialization and sensemaking process. People react to situations and those actions and behaviors create meaning, essentially shaping the culture of an institution one member at a time. Therefore, sensemaking is essential to socialization.

Socialization

Tierney (1997) defined socialization as the “successful understanding and incorporation” of organizational activities by new members (p. 3). The author further explained this procedural process through daily events wherein new members discover the habits and modes of thought of those who are not unaccustomed. A newcomer must “learn the ropes” of how things are done with the ultimate goal of integration into the organizational culture. Weidman, Twale, and Stein (as cited by Lumpkin, 2011) described the three core components of socialization: knowledge acquisition, investment, and involvement. During the first phase organizational members attempt to develop competence in their new role by gaining professional knowledge and skills. The newcomer can then commit to the organization and the chosen career. The final phase includes active engagement that helps to cultivate one’s professional identity. These fundamental gains during socialization contribute to the eventual effectiveness of organizational members. Hessler and Ritchie (2006) acknowledged all existing faculty should participate in the socialization of newcomers.

Mendoza (2008) discussed two stages of the socialization process: anticipatory and organizational. The anticipatory stage occurs while prospective faculty members are still in graduate school. Austin as referenced by Lumpkin (2014) stated that “doctoral students begin to learn about the culture of higher education and the different types of cultures they may find as they begin their academic careers” (p. 198). Hessler and Ritchie (2006) suggested top faculty candidates could be selected during graduate programs and cultivated into an academic. New faculty who are entering academia from a clinical setting may not experience the anticipatory socialization process. However, a higher education job interview may also fall into the anticipatory category (Tierney, 1997). During this phase of expectancy and eagerness, new faculty learn from mentors and peers as they embark on their professional entry into higher education. It is sometimes believed that socialization begins as soon as a new person joins the faculty, but the anticipatory phase described proposes socialization actually occurs much sooner (Lumpkin, 2014). The second stage (organizational) occurs as faculty members enter their academic careers (Mendoza, 2008). The organizational phase is comprised of two parts: the initial entry and role continuance. Initial entry is the early stage, in which mentoring may take place. Role continuance begins when new faculty are established. It is during this second phase of socialization where members may discover cultural differences and faculty may choose to leave the institution.

Tierney (1988) posed three questions in regard to socialization. First, how do new members become socialized? Second, how is it articulated? Lastly, what do we need to know to survive/excel in this organization? Institutions should have formal processes in place to convey the importance and concern for the socialization of new organizational members. Each faculty member, a valuable resource to an institution, must be treated as unique individuals with specific

professional development needs (Lumpkin, 2014). Effective socialization can occur through “listening, asking questions, observing, and getting engaged with colleagues in activities congruent with the culture” (Lumpkin, 2014, p. 200). Conversely, failing to socialize may occur because of member self-interest and desire for autonomy. In order to combat strict reliance on one’s self, well-established faculty need to be encouraging and supportive of new faculty during the transmission of culture. Becoming socialized can be made easier through the use of mentors. Pinto Zipp et al. (2014) attempted to identify important functions of an ideal faculty mentorship relationship. Two of the most prevalent themes that surfaced from the inquiry of new PT faculty was the need to provide guidance in navigating the academic culture and transitioning to an academic culture from a clinical-health care culture. Mentors can play a significant role in the socialization of new faculty and should be acknowledged and rewarded for their efforts.

Tierney (1997) also debated whether or not new organizational members should merely discover the culture of the institution or academic unit or help to recreate it. During socialization, new members acquire culture specific representations in which to interpret events and respond with suitable behaviors (Mendoza, 2008). However, newcomers have a more difficult time during sensemaking due to their lack of sufficient contextual history and established social network within the organization. New faculty are often unsure of their particular roles, competence in teaching and research abilities, and social acceptance, but are eager and willing to learn how to best fit in (Mendoza, 2008). Though socialization is essential for new faculty, it can be viewed as an effort to diminish differences and creativity, which allow for an organization to thrive.

Higher Education Faculty Turnover and Retention

There are many facets to faculty retention. The first year of teaching can influence whether or not a novice educator remains in the postsecondary setting. It is important for allied health programs to be able to retain experienced clinicians and help them develop into expert educators. Newly hired faculty must assume this new role all while focusing on the institution's tripartite mission of teaching, research, and service. Review of the literature revealed several explanations as to why faculty within allied health and nursing choose to exit this role. Romig et al. (2011) reported feelings of loneliness, anxiety over promotion and tenure, heavy workloads, dissatisfaction with salary, and various personal reasons contributed to faculty turnover. Gresham-Anderson (2015) declared nine out of 11 participants in the transitional experience study being overwhelmed in their new faculty role. The stress of feeling like work is never completed and inadequate preparation can lead to a lack of job satisfaction. Anderson (2009) studied new nursing faculty and also revealed a common theme of "drowning" in which participants expressed a feeling of being thrown into the "deep end".

Gazza and Shellenbarger (2005) proposed strategies to retain new educators who have relocated to a different institution but thought the strategies may also be useful in the enculturation of newly hired faculty. The strategies suggested included routine orientation that encompassed policies and procedures, promotion and tenure guidelines, publication expectations, grant funding opportunities, service commitments, and overview of information technology used at the institution. A second strategy was connecting with people that involved relationship building, networking, and establishing a mentoring relationship. The third strategy was navigating the political structure because of its power in higher education. The fourth strategy suggested was functioning efficiently or streamlining activities to meet competing demands of

time and attention. Finally reflective practice was noted as being a strategy for retaining new faculty and could be accomplished in isolation or in a small group. The authors concluded that seasoned educators should serve as mentors for new faculty in an effort to help the sustainability and growth of the nursing profession (Gazza & Shellenbarger, 2005).

Hessler and Ritchie (2006) presented 10 suggestions for recruiting and retaining new faculty for schools of nursing. The suggestions were: providing guidance, fostering socialization, encouraging flexibility, conducting orientations, providing support, facilitating collaboration, allowing for mistakes, coordinating teaching assignments, growing your own, and offering rewards. Guidance was given from experienced faculty members and the authors believed this was essential to their transition into the faculty role. In regard to socialization, the authors noted faculty members who felt connected or a sense of belonging to the institution were more likely to stay. Hessler and Ritchie, like McDonald (2010) and Anderson (2009), discussed the dual roles new faculty who transition from clinical practice face and stated, “One role should not be traded for the other” (p. 151).

The need to be oriented to the institution suitably and potentially to education in general was a common theme in helping to retain new faculty (Gazza & Shellenbarger, 2005; Hessler & Ritchie, 2006). Additionally, the idea of protected time during the first year of teaching was suggested by various authors as a means to avoid new faculty discouragement (Gresham-Anderson, 2015; Hessler & Ritchie, 2006). The reflections of the authors paralleled those of Clark and colleagues (2010) in regard to the importance of administrative (deans and chairpersons) and institutional support of new faculty (Hessler & Ritchie, 2006). The authors also highlighted the concept of experienced (one to two years) but not seasoned faculty helping novices through the transition because they could more closely identify with the frustrations.

This finding was consistent with that of Murray et al. (2014) and Benner (1982) and may be useful for determining best practices in mentoring. Activities that seasoned faculty do without thought could be difficult to understand or maneuver for the new faculty members (Hessler & Ritchie, 2006).

Dunham-Taylor, Lynn, Moore, McDaniel, and Walker (2008) suggested improving nursing faculty retention could be achieved through more effective mentoring. The price of replacing a faculty member who decides to leave an institution is costly. The authors stated it may cost twice the salary of the position to replace just one faculty member and it was neglectful for institutions not to invest in strategies to retain new faculty. Salary, lack of doctoral degrees, role expectations, and alternative career opportunities were noted as a factors contributing to nursing faculty shortage. The concerns in nursing are comparable to those in allied health fields of study (Romig et al., 2011). The authors informally interviewed several new nursing faculty and discovered similar perceived needs among them. The six consistent needs of new faculty were related to teaching and information technology. The novice nursing faculty interviewed also admitted to feeling a sense of isolation because of the immersion into the new role. The participants asserted those feelings of seclusion could be lessened if mentoring relationships were present. Like several previously mentioned studies, Dunham-Taylor et al. suggested a “lighter load” for new faculty members was conducive for retention. The authors discussed a phenomenon known as “horizontal hostility”. This occurrence is when seasoned nurses and potentially faculty display little to no regard for newcomers and prefer criticism and conflict over mentoring and nurturing. The actions of the department in which a new faculty member will now be a part of can be detrimental or beneficial to the success and retention of the novice educator.

Ryan et al. (2012) sought to examine faculty members' intent to leave an institution. Though this study focused on a public research university, competition for faculty and the importance of new faculty success is a topic of discussion for most higher education institutions. Intent was characterized into two categories: leaving one institution but pursuing employment at another (staying in the higher education) or leaving the academy altogether. There were 1,087 participants in the study and it included faculty who were either tenured or tenure track and any professional rank (assistant, associate, full professor). The study also characterized faculty by discipline so that a comparative analysis could occur. Commitment to the institution (as reported in number of years) was found to be an important predictor of intent to stay. Faculty who were considered productive were more likely to consider leaving for another institution, though productive was not operationally defined.

Faculty members in the hard-applied (medical) sciences were more likely to report considering leaving the academy altogether. Ryan et al. also suggested this finding may be a result of a greater "pull" to employment opportunities outside the academy in which demand is high and compensation is attractive. This finding is prevalent in the current literature. Stress and dissatisfaction with certain areas of academic work made it more likely for a faculty member to consider leaving the academy. Perceived feelings of fit and support resulted in a decreased likelihood a faculty member had considered leaving the academy. Allied health disciplines tend to heavily identify with clinical backgrounds and their professional community. Ryan et al (2012) stated this happening could lead to a weaker attachment to an institution and therefore an increased probability the faculty member would leave or have intentions to leave. If institutions wish to experience a return on a new faculty investment, factors affecting the decision to leave must be considered.

Xu (2008) pursued an understanding of the importance of discipline variations in regard to university faculty turnover. The author asserted those discipline variations surface in both expectations and commitment level. The author used Biglan's framework to classify academic disciplines and the dimensions were hard or soft, pure or applied, and life or nonlife. Allied health and other health sciences were considered hard, applied, and life (HAL), whereas nursing was considered soft, applied, and life (SAL). Results included older faculty members, having gained tenure, and more years on the job being less likely to leave an institution. The findings of this study correlated with Ryan and colleagues (2012) in that faculty with more research productivity reported a stronger turnover intention including SAL (nursing).

Research support was important to HAL disciplines as was a sense of job security. Advancement opportunities were a key factor in decreasing faculty turnover intentions and the perceived effectiveness of faculty leadership. The importance of advancement opportunities may lie within generational differences between and among faculty. It has been reported generation Xers prefer a work environment that allows for personal growth (Dunham-Taylor et al., 2008; Hessler & Ritchie, 2006). Four variables were consistent concerning turnover intentions regardless of discipline: age, satisfaction with salary, job security, and advancement opportunities. An additional finding in HAL disciplines was the higher incidence of turnover intentions among women and minority faculty. Discipline and personal characteristics have the potential to impact turnover intentions and should be considered at the departmental level. Xu (2008) hypothesized "insiders" know the needs and concerns of the faculty within an academic unit and therefore college deans and department chairs should assume responsibility for retention efforts. This suggestion corresponds with various author's recommendations concerning administrative support (Clark et al., 2010; Hessler & Ritchie, 2006).

O'Meara, Louder, and Campbell (2014) examined sensemaking of faculty and administrators in a large research university in regard to faculty departure. The two common explanations for faculty departure discussed were individuals left for a better opportunity (heaven) or exited because the demands of the position were too high (hell). The authors suggested these explanations release the institution and administrators of responsibility for a faculty member's departure. O'Meara and colleagues (2014) used a case study, mixed methods approach by interviewing and surveying administrators, faculty who intended to leave or actually left, and colleagues of the 'leavers'. The top three reasons for leaving reported by faculty members were a higher salary, a prestigious offer from another institution, and a lack of collegiality. Colleagues of the leavers reported perceived reasons for leaving in the same order as the faculty members with one exception: a lack of collegiality and leaving to be closer to family tied. Administrators reported a better opportunity and location and family as the top two reasons for why they believed faculty members left. The actual leavers indicated work environment and fit were the main reasons for departing the institution and faculty positions. In contrast to previous studies reviewed within nursing and allied health, pursuing an opportunity outside the academy was the least dominate explanation for faculty departure in this study. Factors within the work environment and fit category of reason for departure included work-life balance, lack of collegiality in academic unit, and a better campus climate for women and other minorities.

To examine factors influencing faculty work life, Candela, Gutierrez, and Keating (2013) conducted a study of 808 nursing faculty in the U.S. Their stated purpose was to identify factors that would help recruit and retain qualified nursing faculty in response to the national shortage of educators. This particular study included generational membership for comparative analysis. 53.9% of participants were classified as Baby Boomers, 28.9% Generation Xers, 5.8% Veteran,

and 1.9% Millennial. The Baby Boomer generation was noted to have the highest intent to remain in the nursing faculty role. In contrast, the millennial generation reported the greatest overall intent to leave academic nursing. This finding may correlate with the significant stress endured by novice faculty. Additional findings included perceptions of administrative support and greater productivity (in regard to workload) resulted in a decreased desire to want to leave the faculty role. Furthermore, a higher perceived level of teaching expertise was associated with intent to stay in the academic nursing. The authors concluded that administrative support for development of teaching skills and mentoring networks could help new faculty thrive in academic roles.

Bickel and Brown (2005) examined Generation X and faculty within academic health science centers. Generation Xers will be replacing the Baby Boom generation upon retirement, thus an exploration of their expectations of professional work life is warranted. The authors noted several characteristics of the Gen Xers including a greater sense of family, less willingness to sacrifice responsibilities outside of work, resentment of top down management, and a desire for greater flexibility/balance between work and home life (Bickel & Brown, 2005). Gen Xers may also view mentoring as more of a right than a privilege and may be more outspoken about their professional needs than their Baby Boom counterpart. Various authors (Dunham-Taylor et al., 2008; Hessler & Ritchie, 2006; Xu, 2008) remarked on the personal growth and professional advancement desires of Generation X. This corresponds to Bickel and Brown's (2005) statement concerning Gen Xers requesting frequent and candid feedback from administrators/peers. It may also relate to Candela's et al. (2013) recommendation of more support for improvement in teaching. Greater loyalty to outside responsibilities including family does not necessarily result in a decreased commitment to the academic institution (Bickel & Brown, 2005).

Faculty Job Stress and Satisfaction

In an effort to understand how job stress and psychological empowerment could potentially affect job satisfaction, Chung and Kowalski (2012) performed a study on full-time nursing faculty. There were 959 participants and the faculty in the mentored group demonstrated a higher job satisfaction than those in the nonmentored group. The study also reported job stress and anxiety over tenure had a significant inverse relationship with job satisfaction. Psychological empowerment (meaning, competence, self-determination, and impact) also correlated with an increased job satisfaction among nursing faculty. The authors concluded quality mentoring was a beneficial strategy in increasing job satisfaction and thereby retaining new faculty within nursing. Chung and Kowalski also mentioned how even though mentoring is recommended across disciplines, best practices for doing so have not been established. These findings are consistent with Gazza and Shellenbarger (2005) and Romig et al. (2011) who identified promotion and tenure as a source of anxiety for new faculty and the need for unambiguous guidelines and expectations for those pursuing the advancements.

Romig et al. (2011) conducted a literature review on factors affecting allied health faculty job satisfaction. Health professions included in the review consisted of dental hygiene, physical therapy, occupational therapy, physician assistants, and radiation therapists. Findings of this review revealed some allied health faculty were dissatisfied with salary because it was not always proportionate to the degree requirements and demands of the position. Other faculty members were frustrated by the lack of formal guidance through the tenure process. Conversely, findings that increased job satisfaction were noted to be supportive relationships with senior faculty and program director leadership style (specifically transformational) and behaviors. Collegiality, respect, and mentoring opportunities within the community of scholars were stated

to be a key component of job satisfaction in the academic setting and to help a new faculty member in allied health grow professionally. Various studies have reported salary as a reason for difficulty in the recruitment and retention of qualified faculty (Barnes et al., 2011, Dunham-Taylor et al., 2008; McDonald, 2010; Xu, 2008).

Eddy and Gaston-Gayles (2008) conducted a qualitative study to gain a greater understanding of how new faculty in higher education administration departments experienced life on the tenure-track. The study included interviews with 12 participants who were on tenure-track positions for 3 years or less. The authors reported four themes in regard to stress: work-life balance, teaching expectations, unclear guidelines upon hiring, and issues specific to the new faculty member's gender, color, or sexual orientation. Female participants and those who were single reported a greater dissatisfaction with work-life balance. Knowing how much time to spend on teaching, research, and service and balancing a family life with academic work were significant causes of stress among new faculty. Though the participants in the study had undergone a graduate program in higher education administration, there were still significant feelings associated with a lack of practical experience in teaching that resulted in a lack of self-confidence. Faculty of color reported an increased expectation to fulfill service requirements and to serve as mentors to students of the same race. These aspects of the faculty role have the ability to take time away from endeavors associated with teaching and research and thereby "tipping the balance". One participant in the study noted the reason for potentially having unclear expectations or guidelines for new faculty may be because pressures on institutions change and therefore what is asked of faculty, particularly the nontenured ones, may also change. The implications of the study included additional skill preparation for prospective faculty, an increased availability of information at the beginning of the faculty appointment, and mentoring:

both during graduate school preparation and at the beginning of the faculty member's career. The authors suggested mentoring, whether by internal or external colleagues, and intentional socialization would aid in the faculty preparation process.

Yedidia, Chou, Brownlee, Flynn, and Tanner (2014) surveyed 3,120 full-time nursing faculty at 269 schools (both undergraduate and graduate) to study work-life balance. One of the measures in the study was emotional exhaustion, which was determined by using a subscale from the Maslach Burnout Inventory. The 3 items in the scale that helped to identify emotional exhaustion were statements pertaining to feelings of being drained, feelings of being used up, and having a lack of energy. The authors reported 38.8% of participants experienced high levels of emotional exhaustion. In contrast, 80% of participants reported being somewhat or very satisfied with their work. Items linked to emotional exhaustion were noted to be workload, administrative responsibilities, and flexibility to balance work and family life. The dissatisfaction of nursing faculty was associated with lack of travel funds, salary, and workload. Emotional exhaustion as well as age influenced the faculty member's decision to report likelihood to leave academic nursing in the next 5 years. Interesting findings surfaced for two subpopulations of nursing faculty in the study. Emotional exhaustion was higher for those faculty serving in clinical roles and advanced practice nurses (APRN) were more likely to leave the academy. These findings could be due to the lack of mentoring for clinical faculty and the salary differences for clinical APRNs.

Person-Organization Fit

Person-organization fit (POF) can be described as when personal interests and abilities match the preferences of the institutions where individuals are employed (Lumpkin, 2014).

Mendoza (2008) reported during the anticipatory socialization phase, faculty members may self-select an institution based on what best fits their capabilities. Moreover, institutions select applicants centered not only on merit and experience in a given field but on how well he or she will meet institutional expectations. During the anticipatory socialization process determining a positive person-organization fit is important to lessen the frequency and consequences of cultural conflict within an institution. An organizational newcomer must learn the cultural processes of the institution and conclude whether or not value alignment is present between them. Most individuals seek to build relationships with those who share similar attitudes, beliefs, and values (Lumpkin, 2014). Like organizational culture, faculty attitudes and beliefs can evolve leading to a disconnect between the member and the institution. This may occur due to personal circumstances or the influence of colleagues. Beliefs can further be realized through reflection on past work or a desire to pursue more rewarding and fulfilling goals. If POF is not perceived by the member, exodus from one institution to find a better fit elsewhere may ensue. Person-organization mismatch occurs when the values of one (member versus organization) does not correspond with the other.

Chatman, as reported by Castiglia (2006), reported an association between POF and employee turnover, satisfaction, and job performance. When a cultural shift arises and POF is no longer apparent, a decrease in faculty motivation and commitment to the institution may follow. Due to a reduction in positional flexibility (i.e. unable to find new employment), dissatisfied faculty may remain at an institution they do not value and further squander working relationships. If these conditions continue without resolve, student success and academic scholarship may suffer. In a study conducted by Castiglia (2006) on the impact of changing culture on POF, the author identified three main sources of institutional fit as reported by faculty:

enthusiasm, concern for the individual, and the presence of a clear and guiding philosophy.

Faculty interviews were included as part of the study and there was a common theme of us (peers) versus them (administration/college itself). The faculty at this particular institution believed the college had become more focused on commercial interests (business model) over time (cultural shift). This led to a campus environment that was perceived to be less supportive, nurturing, and collegial. In marked contrast to prior studies, Castiglia found members with a low POF index actually had the highest reported job satisfaction. However, this satisfaction was within the faculty members own work (research and teaching) rather than in the organization itself. Though there was a self-reported concern for a lack of clarity on the study instruments used, the author concluded faculty could easily separate feelings of individual work and institutional discontent. In this study, POF affected commitment to the institution more so than faculty job satisfaction.

Lawrence, Ott, and Bell (2011) sought to better understand faculty perceptions of organizational commitment and institutional service. Findings of the study included faculty allocated the least amount of time to institutional service when compared to teaching and research and minority faculty members were less likely to be committed to the organization. An additional finding was as faculty satisfaction increased so too did organizational commitment. Satisfaction was directly tied to the potential for advancement within the organization: promotion, job security (tenure), and administrative duties. The findings are consistent with various studies that reported organizational commitment associated with job satisfaction and contemplating leaving the academy because of job dissatisfaction (Clark et al., 2010; Ryan et al., 2012). This study does differ from others because faculty in health-related disciplines and nontenure track positions were excluded. The authors noted expectations of service differ for

faculty in medical disciplines. This may be because health-related faculty positions begin as clinical appointments and there are stronger discipline specific service responsibilities. Lawrence and colleagues acknowledged mentoring as the means to achieve faculty socialization that coincides with multiple studies that reported mentoring can increase job satisfaction (Chung & Kowalski, 2012; Romig et al., 2011).

Organizational Culture

Tierney (1988) suggested an organization's culture is "reflected in what is done, how it is done, and who is involved in doing it" (p. 3). An understanding of organizational culture has the potential to help higher education leaders increase institutional performance and effectiveness, solve administrative problems, and acquire critical insights into situations, therefore influencing the decision making process. Manning (2013) proposed two approaches to organizational culture theory: the corporate culture approach and the anthropologic/egalitarian approach. Within the egalitarian perspective, "all organizational members play a role in shaping culture" (Manning, 2013, p. 91). Organizations are essentially a reflection of the actions of the people within them. Conversely, the corporate perspective assumes that culture can be managed by organizational leaders and holds the organization together. The anthropologic perspective more closely aligns with the goals and purposes of higher education institutions.

Assessing an organization's culture may help explain how institutional members create meaning in their work and become connected to an organization. Cameron and Quinn (1999) stated how organizational culture can impact institutional members: employee morale, commitment, productivity, physical health, and emotional well-being. Interestingly, culture often goes unnoticed until conflict arises or the culture is challenged. Cultural influence can occur at

varying levels within and outside an organization. For instance, the institution itself, specific colleges, departments, and programs may all have independent cultures. Public higher education institutions may also be influenced by state and/or system initiatives. Culture is a vital factor to be considered in the long-term effectiveness of organizations. Mendoza (2008) proposed culture could be reshaped by new members of the organization. Organizational culture can influence whether new faculty become supportive or competitive, and therefore proper socialization into the academy is important for the success and satisfaction of each new member.

Faculty Mentoring

Mentoring programs in higher education can be either formal or informal or nonexistent. The act of mentoring can be viewed as specific steps organizations take to socialize new members to its belief system. Mentors assume many roles: counselor, guide, developer, encourager, supporter, protector, and even friend. Mentors are often high-ranking, influential, and senior faculty (Thomas, Bystydzienski, & Desai, 2015). Protégés may seek mentors or be assigned one. Regardless of how the relationship originates, the goal is to provide the newcomer with valuable career and psychosocial support which is critical to the professional development of new faculty (Gibson, 2006). The formal act of mentoring is dependent on the academic unit's culture (Lumpkin, 2011). Mentoring may be accepted and expected of seasoned faculty, or it may be viewed as insignificant because efforts are not rewarded. A negative department culture can prevent mentoring implementation. Formal programs set the cultural tone for the academic unit; displaying a collegial work environment and commitment to faculty peers. The continued investment in people requires administrative support for ongoing success (Lumpkin, 2011).

Because one assigned mentor may not be enough or be a good match, informal mentoring can and should take place. Informal mentoring relationships emerge naturally and may be more

beneficial to protégés (Schrodt, Cawyer, & Sanders, 2003). Benefits of mentoring include enhanced socialization, increased collegiality, increased job satisfaction and commitment to the institution, increased ownership in the new role, and increased retention/advancement. The professional and social interactions that take place can help alleviate feelings of isolation and loneliness (Lumpkin, 2011). Newcomers reap social opportunities, an experienced perspective, valuable advice, and the chance to network with higher education professionals (Thomas et al., 2015).

Mentoring can serve as the channel through which socialization occurs. When new faculty are provided with constructive feedback in a nurturing environment they become more connected to the institution they employ them. New faculty members seek career related guidance from organizational insiders who have weathered the promotion and tenure storm. The connectedness and increased loyalty to the institution may result in a more stable work environment (less turnover), which makes the institutional impact of mentoring just as beneficial as the success of new faculty. The knowledge and guidance gained as a result from mentoring has the potential to equate to individual professional growth and can promote cultural change.

Mentoring in Practice

Researchers at the Western University of Health Sciences sought to describe the development, implementation, and evaluation of a formal mentorship program at a College of Pharmacy. Though pharmacy is technically not an allied health profession; these colleges are often included in academic health science centers. The need for mentorship was identified in 2005 and the program was implemented in 2009. The program was voluntary and all mentors received training. After the mentors and protégés were matched, each pair received an

orientation to the process. There were 51 mentoring pairs or relationships within the study. The authors stated the mentor's role in the relationship was to "help them achieve their self-defined goals while balancing the multiple facets of an academic faculty position" (Jackevicius et al., 2014, p. 2). Each participant was required to meet once every 3 months and complete an annual assessment of the program. The authors reported the majority of mentors perceived the program to be successful but felt protégés needed to show more initiative and self-motivation (Jackevicius et al., 2014). An outcome of the program was a significant increase in the number of peer-reviewed publications for junior faculty in one specific department when compared to the 3 years prior to implementation. However, an increase in grant submissions, faculty retention, or promotion success rate was not found.

Researchers at a large health sciences university conducted a baseline survey of junior faculty prior to the implementation of a formal mentoring program. There were 464 respondents in the study and over half reported having a mentor. The authors found clinical faculty with greater teaching and patient care responsibilities to be less likely to have a mentor (Feldman et al., 2010, p. 2). Having a mentor also resulted in increased job satisfaction and higher self-efficacy scores. Self-efficacy was defined as "belief in one's ability to accomplish specific goals and tasks" (Feldman et al., 2010, p. 5). Promotion and tenure were the topics mentees wished to discuss the most with mentors. This faculty mentoring program targeted health science professional programs including medicine, nursing, pharmacy, and dentistry. Mentoring at this institution focused on the professional development of new educators in health sciences. These results were replicated by both Chung and Kowalski (2012) and Romig et al. (2011).

Faculty at Johns Hopkins University School of Nursing sought to develop an instrument to measure the effectiveness of a faculty mentoring relationship in an institution that did not have

a formal mentoring program (Berk et al., 2005). The authors noted the need for a tool because the empirical evidence was limited surrounding the topic. The faculty mentoring committee developed a mentorship profile questionnaire and a mentorship effectiveness scale. The purpose of mentoring as defined by these authors was also to facilitate professional development of new faculty. Outcomes on the profile questionnaire included a record of publications, presentations or posters, teaching methods, clinical expertise, service activities, grant writing and promotion. The effectiveness scale included 12 questions that were scored zero to six for a total possible score of 60. Interestingly, mentors were to nominate mentees to complete the scale that could lead to bias in choosing the more outperforming relationships as compared to all mentoring pairs. Also, the not applicable option was allocated a score of six which could lead to an erroneously high effectiveness rating. The score in which to be deemed effective was not noted within the study. The instruments could however be modified by institutions to meet the specific criteria for its own mentorship program. Further studies on the effectiveness of these instruments would be needed because this report was strictly descriptive of the development process. The measurable characteristics of mentors included in the effectiveness scale are useful in defining the traits that would benefit a mentee: accessible, approachable, supportive, encouraging, and so forth.

Falzarano and Zipp (2012) intended to determine if and how frequently mentoring was occurring among new occupational therapy (OT) faculty and identify perceptions of those faculty members who had been mentored. The study used an exploratory cross-sectional survey design and consisted of 107 full-time tenure track OT faculty member participants. As reported by Falzarano and Zipp, statistics for new OT faculty member education preparation in 2010 were similar to statistics reported for the profession of respiratory care (46.6% Master's, 4.1% Doctorate). However, the study sample found 32.7% of new OT faculty held a Ph.D. Major

findings of the study were the positive effects of mentoring on new faculty research productivity, new OT faculty feeling valued and a sense of loyalty to the institution, and the majority of mentors possessing the associate professor rank and occupying a position within the OT department. Because faculty research is expected and is rewarded through promotion and tenure, mentoring may provide the means to overcome the stress of such a demanding endeavor. An increase in research productivity can lead to greater personal satisfaction for the new faculty member. Increased loyalty to an institution may decrease the likelihood of considering departure and increase organizational commitment. This study also provided an example of how experienced (associate professor) rather than seasoned (full professor) faculty may better serve as mentors because of the familiarity of the stresses. A challenge of mentoring new faculty as reported by Falzarano and Zipp was having enough time to devote to the process and the relationship. In a similar study with new PT faculty, time also surfaced as the biggest challenge associated with faculty mentoring relationships (Pinto Zipp et al., 2014).

White, Brannan, and Wilson (2010) reported the stories of protégés from a formal mentoring program in a college of nursing. This program consisted of two retreats, four all day workshops, and biweekly contact with an assigned mentor. A needs assessment was conducted and protégés were asked to keep a written journal to submit to mentors once a month. Focus groups were used in this qualitative study. The protégés acknowledged the importance of the retreats; however, the authors noted the scale of the mentoring program was possible because of a grant that may not be feasible for other programs. The workshops provided the means to learn strategies to become better teachers, which was valued by the new nurse faculty members. Like others, the protégés in this study felt a sense of lack of preparation and tacit knowledge for the role. An additional finding was the need for more support and guidance for part-time and clinical

faculty which corresponds to prior studies (Feldman et al., 2010; Schriener, 2007). The authors observed not all senior faculty had the desire or skill to serve as effective mentors, which aligns with the conclusions of Hessler and Ritchie (2006) and Murray and colleagues (2014).

As a continuation of the aforementioned study, the authors illustrated the perceptions of the mentors within the formal mentoring program. Though there were 15 individuals who served as mentors, only 11 participated as informants in the study. The mentors disclosed struggles in establishing close relations with part-time faculty and those who worked in a different location (i.e. off campus). Mentors also expressed a concern for a lack of time to engage with protégés in meaningful activities. This finding suggests mentors who are committed to helping new faculty desire the time to serve the protégés well. Wilson, Brannon, and White (2010) concluded mentoring should be considered within a faculty member's workload. The mentors indicated face-to-face interaction was preferred over reading the protégés monthly journal entry. One finding that was unique to the mentor group was the perception of a potential power imbalance. While the authors did not go into great detail, the power imbalance may have been because the protégés would be gaining valuable insight into the institution and the educator role through mentoring. The authors suggested participation in a formal mentoring program could be just as beneficial to mentors as to protégés (Wilson et al., 2010).

Mentoring, whether formal or informal, may assist new faculty who do not have a practical understanding of what will be expected of them in this new role. Murray (2008) conducted a qualitative study involving semistructured interviews with 14 participants who had 3 years or less experience at their current institution. The findings included participants expressing not having enough time in the day to complete work especially in regard to scholarship. Research, presentations, and publications are often scholarly requirements needed to pursue and

obtain tenure, but Murray found new faculty rarely have time to focus on that aspect of the academic's role. Teaching was reported to consume the majority of the participants' time, but teaching is not the only expectation of most new faculty. The participants also acknowledged the reliance on colleagues for success in the academy. However, it was reported participants felt a lack of commonality with tenured faculty, expressing the difference in career stages could result in a lack of support from more senior or seasoned colleagues.

The college of nursing at the University of Louisiana, Lafayette campus participated in The Teacher-Scholar Project and a case-study description was reported by Heinrich and Oberleitner (2012). The 3-year professional development program focused on enhancing the scholarly skills of nursing faculty, cultivating scholarly partnerships, and creating a climate that would allow for support and sustainability of scholarly efforts. Like allied health professions, teaching and service are heavier aspects of nursing faculty workloads when compared to scholarship. The project actually used this to the faculty's advantage by turning teaching activities into scholarly products. With the majority of faculty in the project being master's degree prepared and having less than 5 years of experience in academia, they were categorized as "pre-scholars" and were mentored by faculty characterized as scholars or "scholar-mentors". The authors reported an increase in faculty satisfaction in regard to scholarly productivity as a result of the project. Additionally, faculty expressed greater professional fulfillment that led to increased retention.

Troisi, Leder-Elder, Stiegler-Balfour, Fleck, and Good (2015) conducted a study that focused on the impact of mentors on early career psychologists. There were 122 participants in the study that compared mentor helpfulness, effectiveness, and role model behavior. Intradepartmental mentors were perceived to be more helpful, more effective, and more of a

professional role model when compared to intra-university mentors (those mentors outside the new faculty member's department). Self-selected mentors (those chosen by the mentee) were perceived to be more helpful, more effective, and more of a professional role model when compared to intra-university mentors. Interestingly, intradepartmental and self-selected mentors were perceived to be similarly helpful and a professional role models. Self-selected mentors were perceived to be only slightly more effective; however, the finding was not statistically significant. The authors suggested intradepartmental mentors may have been perceived better because of familiarity of the mentee's field of study, common interests, and mere proximity (making them seen more often). The authors acknowledged intra-university mentors could serve in the socialization process of new faculty to the institution but may not be best suited as a resource for the intricate details of departmental expectations. Troisi et al. also recognized that one mentor may not be able to provide all the expertise and guidance a new faculty member requires and thus a combination of intra-university, intradepartmental, and self-selected mentors may be beneficial.

To explore the characteristics of good mentors, mentees, and successful mentoring relationships, Straus, Johnson, Marquez, and Feldman (2013) conducted a qualitative study of 54 faculty from two academic health centers. The authors reported five qualities of successful mentoring relationships: reciprocity, mutual respect, clear expectations, personal connection, and shared values. Characteristics of failed mentoring relationships were poor communication, lack of commitment, personality differences, competition, conflicts of interest, and lack of experience in mentoring. The consequences of a failed mentoring relationship were noted to be a decrease in retention of the new faculty member and decreased collegiality in the department. If a mentoring relationship failed, the mentee had to search for a new mentor. This occurrence can be described

as self-selecting a mentor, which Troisi et al. indicated may result in a more successful mentoring relationship. The authors also included characteristics of effective mentors and mentees, which coincide with those reported by Berk et al. (2005).

Active listening was a key trait for both effective mentors and mentees. This may be because of the importance of effective communication in preventing a failed mentoring relationship. Mentors should essentially offer career guidance and provide emotional support for new faculty. Goal setting appears frequently in the literature of mentoring best practices and may serve as the foundation for institutions or academic units in which to model a mentoring program. Additional recommendations from the authors were the department chair should serve as the broker or mediator for the relationship, especially if failure seemed inevitable, regular meetings should be kept between mentor and mentee, and mentoring training and workshops should take place.

Mentoring Models and Best Practices

The Shumacher Model stems from the profession of nursing and can be used as a guide for successful faculty mentorship. The model is one of a “circular feedback environment using each faculty member’s individual gifts” (Shumacher, Risco, & Conway, 2008). The goal of instituting such a model is to foster faculty recruitment, development, and scholarship. The Shumacher Model highlights that both novice and seasoned faculty have strengths within an academic unit and can be used for the betterment of the group. The authors suggested 12 essential roles within an academic unit: the networker, researcher, gold miner, light bulb, techy, PR person, CEO, taskmaster, ombudsman, editor, campaigner, and philosopher. Furthermore, faculty may serve in more than one of these roles. The authors stated formal mentoring could

help novice faculty meet professional goals and department needs. In the Shumacher Model, mentoring can be a one-on-one relationship or provided by the entire faculty unit.

Because female faculty members have historically been less successful remaining in academia when compared to males, the University of Wisconsin-Madison founded the Women Faculty Mentoring Program. This program matches new female faculty with a female tenured faculty member outside of the novice's academic department. The program also consists of peer mentoring groups that help women faculty navigate the university. Each mentee is required to complete a form that includes contact information, professional experience (divisional affiliation, academic interests), and personal experience (responsibilities outside of the institution). The questionnaire, or faculty information and interests form, helps match a mentee with a mentor but also serves as the foundation for a successful mentoring relationship (wisc.edu, 2017).

Columbia University Mailman School of Public Health's mentoring program consists of defining the role of the mentor and offering qualities of a good mentor that parallel those provided by Straus et al. (2013). The program also offers ways mentors can help mentees in the realms of research, teaching, and networking. Mentees are assigned a formal mentor by the department chair; however, the coordinators acknowledge the need for flexibility. Unlike other institutions, the Columbia University program expects one meeting per month. The program provides resources on questions to ask a mentor, a script and timeline for how the first meeting should proceed, a document for documenting short and long-term goals, and a mentoring agreement that must be signed by both the mentor and mentee (mailman.columbia.edu, n.d.). The mentoring agreement includes the responsibilities of each party and formalizes the process. Goal setting helps new faculty envision a lengthy career and track professional development progress and thus should be considered best practices.

The University of California, San Francisco’s (UCSF) Faculty Mentoring Program also focuses on academic health science programs such as medicine, pharmacy, dentistry, and nursing. The mission of this program is that “All UCSF faculty members feel supported in their pursuit of a satisfying and successful career” (Toolkit, 2012). Matching of mentors and mentees takes place, but the mentee does have input in the final pairing. The mentoring relationship members are required to meet two to three times per year and like Columbia University, the pair must sign a partnership agreement. Characteristics of an effective mentor described by UCSF include the three C’s: competence, confidence, and commitment (Toolkit, 2012, p. 18). Mentees develop an individual development plan that includes short and long-term goals and keep a mentoring meeting journal. The program also highlights the need for mentees to be proactive in seeking guidance. An illustration of supportive work relationships can be found in Figure 1.

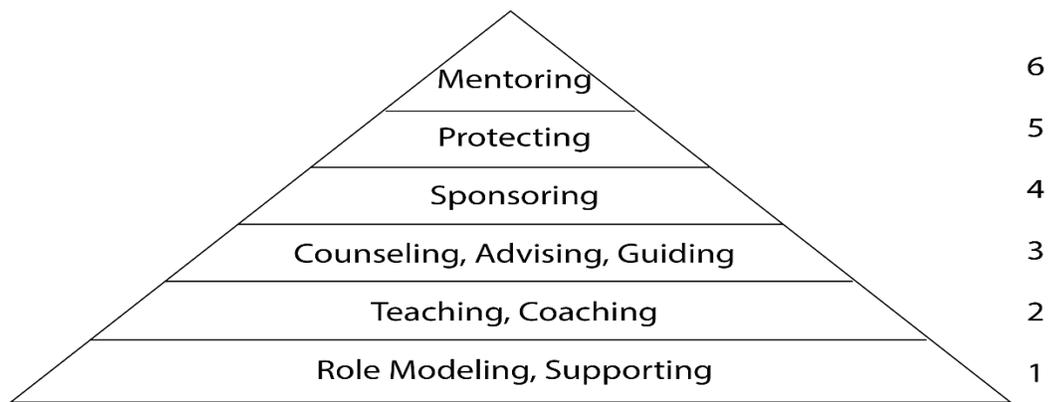


Figure 1. Hierarchy of Supportive Work Relationships

Chatburn (2004) professed mentoring is the reason the profession of respiratory care has sustained constant growth in academic output. The author stated excellence was a process of ever-increasing levels of mastery in seven key areas: attitude, balance, technique, accuracy, timing, speed, and power. Mentoring can play a pivotal role in the professional development of new faculty. Chatburn concluded it is the responsibility of seasoned faculty to mentor, thereby retaining those individuals to eventually serve as mentors themselves. Kahanov et al. (2012) incorporated the WISE principles of mentorship to effectively promote junior faculty growth in academia. These principles included winning trust, inviting acceptance, support without rescue, and embracing growth. Ultimately the protégé should feel empowered, a sense of autonomy, and responsibility for his or her success in higher education.

Specific Challenges for Females

Females entering a new role or a new organization may experience additional stress when compared to their male counterparts. Tierney (1997) suggested women felt they had to work harder to demonstrate the same amount of organizational commitment. Women in general have historically been excluded or marginalized in various institutions including higher education (Thomas et al., 2015). Thomas et al. further say females have been less likely to feel welcome in certain departments, including those of science, technology, engineering, math and medicine (STEMM) because of the traditional male representation in these fields. Feeling as if one is an outsider substantiates the sense of isolation and loneliness in a less than hospitable environment. Because females are relatively new to higher education, there are frequently low numbers of women in senior faculty positions and administration to serve as mentors. This may explain the lower rate of success of women in academia.

Thomas et al. (2015) stated women receive more psychosocial benefit from mentoring than men and seek greater guidance on achieving an appropriate work-life balance. These findings reflect the conclusions made by Xu (2008) and Eddy and Gaston-Gayles (2008) who reported an increased turnover intention in female participants and a greater dissatisfaction with achieving an appropriate work-life balance respectively. In respiratory care females account for approximately 60% of the total number of credentialed providers (Ziegler, 2016). While women are well represented in the field, the equalization of advancement into the educator role may take years to occur. The females currently teaching in higher education will also need to serve as mentors to future female faculty members so that retention and work-life balance may transpire.

Strong et al. (2013) investigated work-life balance in academic medicine. The participants in this study were physician researchers and their mentors. This qualitative study of 128 respondents revealed six themes; however, the theme related to time and balance was more closely analyzed (Strong et al., 2013). Though the study included both males and females, 63% of female respondents reported a significant personal concern for work-life balance compared to 33% of male respondents. The participants were recipients of National Institutes of Health (NIH) K08 or K23 awards and their mentors between 1997 and 2009. Respondents closer to the end of the study cohort were also more likely to discuss concerns over work-life balance (Strong et al., 2013). This may be due to generational differences and the growing prevalence of dual-career couples. The authors suggested the need for more female mentors to serve as role models that can aid in achieving the appropriate balance. Female faculty can be profoundly committed to both career and family.

CHAPTER 3

RESEARCH METHOD

The purpose of this study was to identify current mentoring practices of new faculty members in Commission on Accreditation for Respiratory Care (CoARC) accredited respiratory care programs in the United States. The researcher also sought to identify the views of respiratory care program directors regarding those mentoring practices and perceived impact. The results of the study may benefit higher education leaders in efforts to support new faculty as well as serve as valuable information to clinicians who have considered transitioning to the academy.

The methodology for the study was quantitative nonexperimental survey research. This chapter describes the research questions, instrumentation, population, data collection, and data analysis used in the study.

Research Questions and Null Hypotheses

To determine the mentoring practices of CoARC accredited respiratory care programs and to identify perceptions of program directors regarding the potential impact of mentoring, the following questions guided this study.

1. Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West)?

Ho1: There is no significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region.

2. Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?

Ho2: There is no significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded.

3. Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the program director's academic rank (Instructor, Assistant Professor, Associate Professor, Professor, Other)?

Ho3: There is no significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the program director's academic rank.

4. Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on gender of the program director?

Ho4: There is no significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the gender of the program director.

5. Is there a significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West)?

Ho5: There is no significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region.

6. Is there a significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?

Ho6: There is no significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded.

7. Is there a significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the academic rank of the program director (Instructor, Assistant Professor, Associate Professor, or Professor)?

Ho7: There is no significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the academic rank of the program director.

8. Is there a significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the gender of the program director?

Ho8: There is no significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF mentoring Survey among CoARC accredited respiratory care programs based on gender of the program director.

9. Is there a significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West)?

Ho9: There is no significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region.

10. Is there a significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?

Ho10: There is no significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded.

11. Is there a significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the academic rank of the program director (Instructor, Assistant Professor, Associate Professor, or Professor)?

Ho11: There is no significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the academic rank of the program director.

12. Is there a significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the gender of the program director?

Ho12: There is no significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF mentoring Survey among CoARC accredited respiratory care programs based on gender of the program director.

Instrumentation

The purpose of this study was to compare survey results of program directors from Commission on Accreditation for Respiratory Care (CoARC) accredited programs in the United States. The survey instrument was an electronic questionnaire. The survey consisted of 25 items that were divided into three dimensions: mentoring practices, mentor/mentee relationship, and

perceptions of mentoring program impact (Appendix A). The instrument was created by the researcher based on information obtained from the review of the literature. The demographics portion of the survey was used to gather data on region of the accredited program, type of degree awarded by the program, academic rank of the program director, gender, degree level of program director, number of faculty members in program, and availability of tenure-track positions at the institution.

The perceptions section used a six-point Likert-type scale to measure the participants' agreement to a set of statements regarding the effects of mentoring on new faculty job performance, faculty turnover, job satisfaction, and organizational commitment. Each rating in the Likert scale was assigned a number for statistical analysis, wherein 1= disagree strongly, 2= disagree, 3= somewhat disagree, 4= somewhat agree, 5= agree, and 6= agree strongly. The mentoring practices dimension also included a Likert-type scale to measure the participants' agreement to a set of statements, a ranking of responses for topics of mentorship discussion, and an open-ended question concerning barriers to mentoring implementation. Each rating in the Likert scale for dimension I (mentoring practices) was assigned a number for statistical analysis, wherein 4 = never, 3 = occasionally, 2 = usually, and 1 = always.

Administrative personnel from CoARC and the American Association for Respiratory Care (AARC) were consulted for contributions to the survey instrument. Additionally, the questions included in the survey were developed from two resources. The primary researcher requested and received permission to use portions of a previous instrument (The Health Sciences Faculty Mentoring Survey). The remaining survey items were derived from a significant review of the literature and knowledge of CoARC accredited respiratory care programs. The primary

researcher currently serves as a respiratory care program director. The survey was piloted prior to the final distribution of the instrument to potential participants.

Face and content validity were established by using a group of five educators who did not serve as program directors to review the survey for appropriateness. The survey items were evaluated for readability, relevance, accuracy, and clarity. After consideration of the group's suggestions, several questions were reworded or omitted for reader clarification. After data collection from the pilot group, a factor analysis was run on SPSS to determine the number of dimensions for the survey and helped establish construct validity of the instrument. Factor analysis helps to "identify factors that statistically explain the variation and covariation among measures" (Green & Salkind, 2011, p. 313).

Internal consistency reliability is a measure of reliability used to evaluate the degree to which different items that examine the same idea produce similar results. Split-half reliability methodology was used to measure internal consistency reliability. In testing with the split-half reliability, the items of the survey are broken down by splitting the questions investigating the same area of knowledge in half to form two sets of items. The entire survey was administered to all participants then the total score for each set was computed. Subsequently, the split-half reliability was obtained by determining the correlation between the two total set scores. A Spearman-Brown correction was applied to estimate the reliability of the entire instrument.

Sample

The target population for this quantitative study was respiratory care faculty members who served as program directors during the spring semester (March-May) of 2017. The participants were selected because of their familiarity with current mentoring practices within their accredited

programs and knowledge of the characteristics of additional program faculty. Nonprobability sampling was used. All program director information was located on the public access website for the Commission on Accreditation for Respiratory Care (CoARC). Emailing a survey to these participants was both convenient and purposeful because of the known contact information, anticipated willingness to divulge current mentoring practices, and intimate knowledge of the programs they oversee. According to the 2015 Report on Accreditation in Respiratory Care Education (2016) there were 420 accredited base programs in the United States (85% Associate's degree level, 14% Bachelor's degree level, and 1% Master's degree level). Sleep disorders specialist programs were not included in the study.

Data Collection

After receiving approval from the Institutional Review Board at East Tennessee State University, an email was sent to all program directors listed on the CoARC database. A cover letter describing the purpose of the study, directions for completing the electronic survey, and a link to the survey site was sent to potential participants. Completion of the survey was considered consent for participation. A return by date was included in the correspondence. There were no tangible incentives used to attract participants to complete the survey; only the potential to positively influence the succession planning of programs wherein faculty will be retiring. The instrument did not obtain any identifiable measures; therefore participants could remain anonymous. Follow-up correspondence occurred as necessary to increase the likelihood of participation with the last email reminder sent 1 month before survey participation closed.

Data Analysis

Data collected from the electronic survey were imported into IBM-SPSS for analysis. Several of the survey items resulted in simple percentages. The first component of the survey yielded demographic findings for the study participants concerning degree type, gender, and lengths of service as program director. For Research Questions 1, 3, 5, 7, 9, and 11, a series one way analyses of variance (ANOVA) was conducted. For Research Questions 2, 4, 6, 8, 10, and 12, a series of t-tests for independent samples was used. All analyses were performed using an alpha level of .05.

CHAPTER 4

FINDINGS

The purpose of this study was to identify current mentoring practices of new faculty members in Commission on Accreditation for Respiratory Care (CoARC) accredited respiratory care programs in the U.S. Furthermore, the researcher sought to identify the perceptions of program directors regarding the observed impact of program mentoring practices. With the potential of significant faculty retirement in respiratory care programs in the next 5 years, mentoring may be one strategy for helping to recruit and retain high-quality junior faculty members.

A quantitative nonexperimental survey research design was employed by examining the results of the researcher-developed Respiratory Care Faculty Mentoring Survey (Appendix A). Using the CoARC database of primary contacts for each accredited respiratory care program, all program directors for which contact information could be obtained were sent the electronic survey. Data from the survey were analyzed to address each of the 12 research questions.

The population in this study was respiratory care faculty members who served as program directors during distribution of the survey (March-May of 2017). The initial solicitation to participate correspondence occurred on March 24, 2017, with a reminder email sent on April 7, 2017. The data collection phase ended and the survey closed on May 7, 2017. Participants had to agree to the first question to gain access to the survey, which ensured the participant had read the informed consent (Appendix B), agreed to volunteer in the study, served as program director, and were at least 18 years of age. The solicitation to participate email (Appendix C) and link to

the survey was sent to 410 program directors. Of the 410 possible participants, 126 (30%) responded to the survey.

Demographic Information

Descriptive data from demographic region revealed 16.1% (n=18) of programs were located in the Northeast, 24.1% (n=27) were located in the Midwest, 45.5% (n=51) in the South, and 14.3% (n=16) in the West. The majority of respondents served as program directors in programs that awarded an Associate's degree (69%), followed by Bachelor's degree (17.7%) and Master's degree (0.9%). Nine programs (8%) reported awarding both Associate's and Bachelor's degrees and 5 programs (4.4%) reported awarding both Bachelor's and Master's degrees. Gender characteristics of the program director were as follows: 63.4% (n=71) female, 36.6% (n=41) male. The majority of program directors held a Master's degree (59.8%), followed by a doctorate degree (22.3%), and lastly a Bachelor's degree (17.9%). The reported academic rank of respondents varied: 23% were ranked as Associate Professor, 22.1% ranked as Instructor, 16.8% ranked as Assistant Professor, and 15.9% were ranked as full Professor. The remaining 22.1% of the sample reported not conforming to the ranking system provided and listed titles such as program director, department chair, and college dean.

The top three reported number of full-time faculty members in the respondents' programs were two (54.6%), three (22.2%), and four (7.4%). The number of reported part-time faculty members in the accredited programs were one (27.8%), four (13.9%), and two (12.7%). The remaining number of part-time faculty widely varied between 0 and 36. In regard to availability of tenure track positions at the respondents' institution, 39.3% (n=44) reported there were tenure track positions and 58.9% (n=66) reported there were not. Two respondents were not sure.

Participants were asked to report what types of orientation new faculty were required to undergo. Just over 80% reported an institution orientation, 37.2 % reported a college specific orientation, 35.4% reported a department orientation, and 51.3% reported a program orientation. One respondent reported not having a required orientation for new faculty. The location of the mentor, if assigned to new faculty, was reported to be in the mentee's department (n=38), in the mentee's college or school (n=20), at the mentee's institution (n=15), and outside the mentee's institution (n=1). Thirty two percent (n=35) of respondents reported not having a mentor assigned to new faculty. Topics new faculty members most wish to discuss with his or her mentor was predominantly teaching pedagogy followed by work-life balance, service expectations, promotion and tenure, and research. Other topics that were provided by respondents included program outcomes, curriculum, policies and procedures, resources, and student issues.

Research Question 1

Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West)?

Ho1: There is no significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West).

A one-way analysis of variance (ANOVA) was conducted to evaluate the relationship between mentoring practices and demographic location of the accredited program. The factor variable, demographic location, included four categories: Northeast, Midwest, South, and West.

The dependent variable was Dimension 1 (Mentoring Practices) on the Respiratory Care Faculty Mentoring Survey (questions 9-13). The ANOVA was not significant, $F(3, 82) = .60, p = .616$. Therefore, H_0 was retained. The strength of the relationship between the demographic region and program mentoring practices as assessed by η^2 was small (.02). The results indicated mentoring practices was not significantly affected by the demographic location of the accredited respiratory program. The means and standard deviations for the four demographic regions are reported in Table 1.

Table 1

Means and Standard Deviations of 4 Demographic Regions (Dimension 1)

Demographic Region	N	M	SD
Northeast	17	11.82	3.80
Midwest	19	11.00	4.90
South	37	10.27	4.05
West	13	11.31	3.88

Research Question 2

Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?

H_0 2: There is no significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree).

An independent-samples t test was conducted to evaluate whether the mean scores for mentoring practices differed based on the type of degree awarded by the accredited program. The scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey was the test variable and the grouping variable was Associate's degree or Bachelor's degree. The Master's degree programs did not yield a large enough number so they were omitted from analysis. The test was not significant, $t(73) = 1.62, p = .110$. Therefore, H_0 was retained. The η^2 index was .03, which indicated a small effect size. Respondents from Associate's degree programs ($M = 11.31, SD = 4.32$) tended to report similar mentoring practices as those in Bachelor's degree programs ($M = 9.29, SD = 3.73$). The 95% confidence interval for the difference in means was -.469 to 4.52. Figure 3 shows the distribution for the two groups.

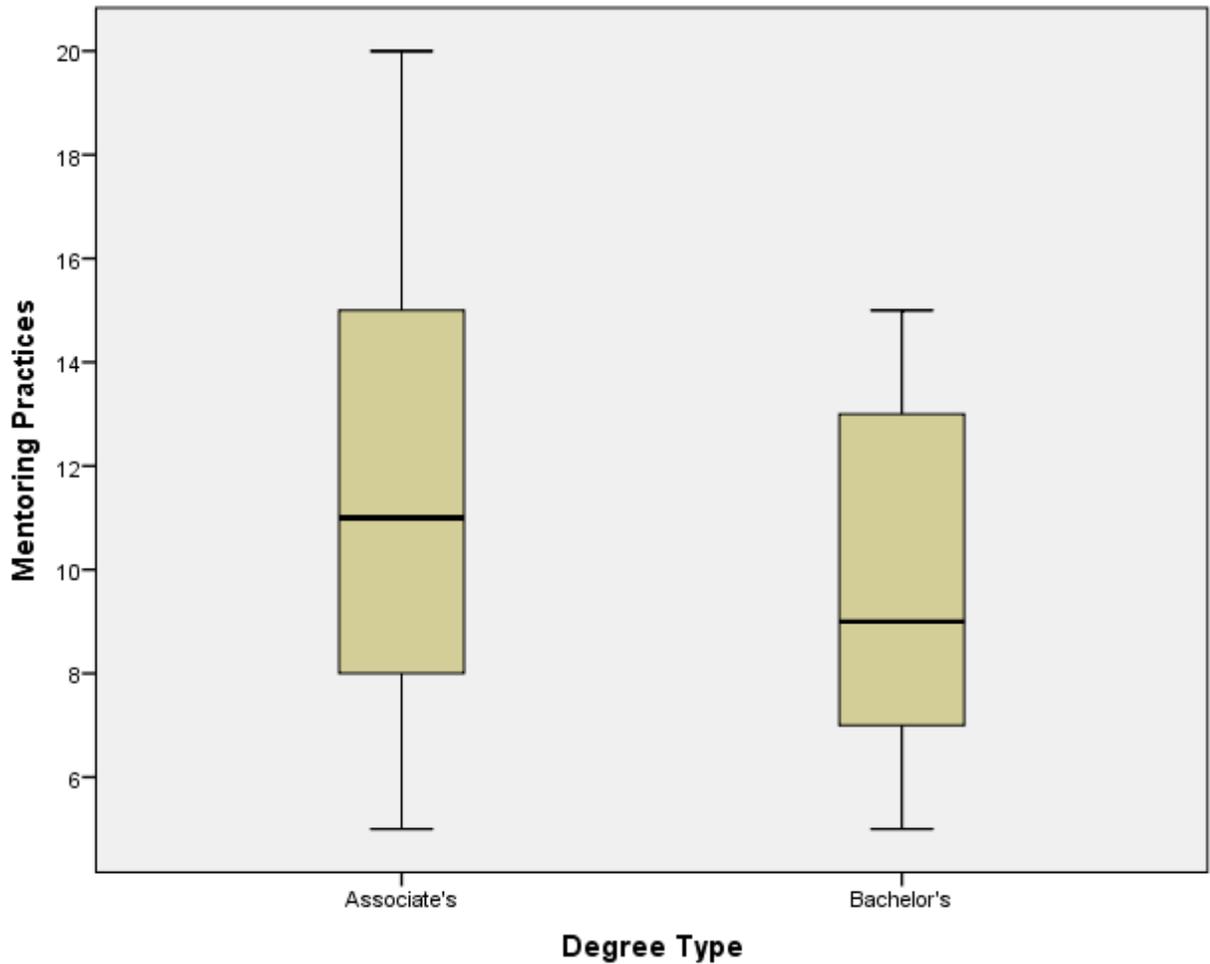


Figure 2. Dimension 1 Scores for Type of Degree Awarded by Program

Research Question 3

Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the program's director's academic rank (Instructor, Assistant Professor, Associate Professor, Professor, Other)?

Ho3: There is no significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the program director's academic rank (Instructor, Assistant Professor, Associate Professor, Professor, Other)?

A one-way analysis of variance (ANOVA) was conducted to evaluate the relationship between mentoring practices and the academic rank of the program director. The factor variable, academic rank, included five levels: Instructor, Assistant Professor, Associate Professor, Professor, and Other (if the program did not use a traditional faculty ranking system). The dependent variable was Dimension 1 (Mentoring Practices) on the Respiratory Care Faculty Mentoring Survey (questions 9-13). The ANOVA was not significant, $F(4, 82) = 1.31, p = .274$. Therefore, Ho3 was retained. The strength of the relationship between mentoring practices and the academic rank of the program director as assessed by η^2 was .06. The results indicated reported mentoring practices were not significantly affected by the academic rank of the program director. The means and standard deviations for the five groups are reported in Table 2.

Table 2

Means and Standard Deviations of 5 Academic Ranks (Dimension 1)

Academic Rank	N	M	SD
Instructor	18	10.78	4.45
Assistant Professor	16	10.56	3.72
Associate Professor	21	11.29	4.06
Professor	15	9.13	3.99
Other	17	12.35	4.17

Research Question 4

Is there a significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the gender of the program director?

Ho4: There is no significant difference in the mean scores for Dimension 1 (Mentoring Practices) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the gender of the program director.

An independent-samples *t* test was conducted to evaluate whether the mean scores for mentoring practices differed based on the gender of the program director. Dimension I (Mentoring Practices) was the test variable and the grouping variable was male or female. The test was significant, $t(85) = 2.52, p = .014$. Therefore, Ho4 was rejected. Female program directors ($M = 11.71, SD = 4.10$) reported significantly greater opportunities for new faculty mentoring when compared to male program directors ($M = 9.47, SD = 3.83$). The 95% confidence interval for the difference in means was -4.01 to -.47. The η^2 index was .07, which indicated a large effect size. Figure 4 shows the distribution for the two groups.

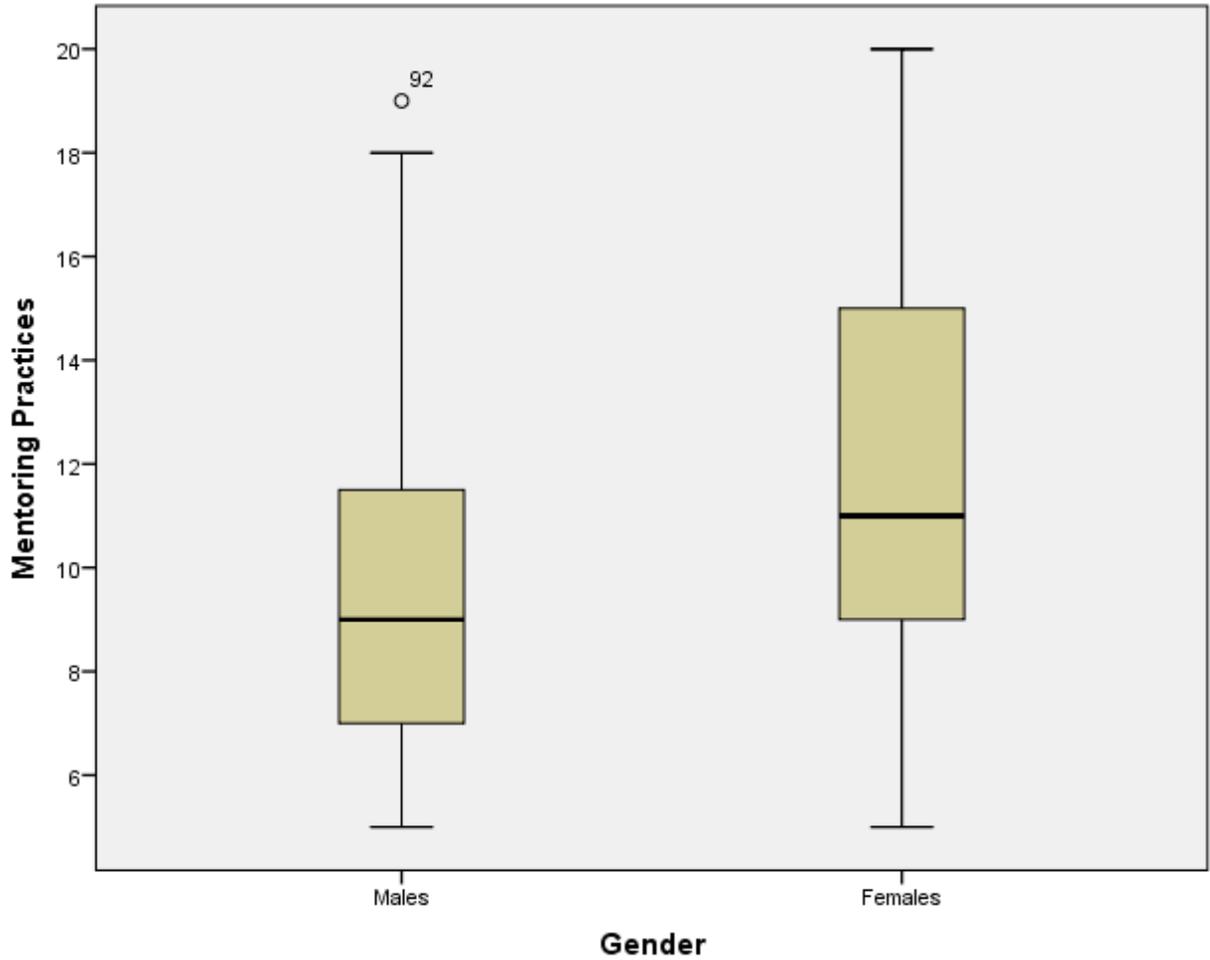


Figure 3. Dimension 1 Scores for Program Directors by Gender

Note: 0 = 1.5 to 3 times the interquartile range.

Research Question 5

Is there a significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West)?

Ho5: There is no significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West).

A one-way analysis of variance (ANOVA) was conducted to evaluate the association between characteristics of the mentor/mentee relationship and the demographic location of the program. The factor variable, demographic region, included four categories: Northeast, Midwest, South, and West. The dependent variable was Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey (questions 15-18). The ANOVA was not significant, $F(3, 95) = .17, p = .918$. Therefore, Ho5 was retained. The strength of the relationship between Dimension 2 and the demographic region as assessed by η^2 was small ($< .01$). The results indicated the reported mentor/mentee relationship characteristics were not significantly affected by demographic region of the program. The means and standard deviations for the four demographic groups are reported in Table 3.

Table 3

Means and Standard Deviations of Four Demographic Regions (Dimension 2)

Demographic Region	N	M	SD
Northeast	15	12.53	3.94
Midwest	24	12.71	3.28
South	46	12.83	3.78
West	14	12.07	3.52

Research Question 6

Is there a significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?

Ho6: There is no significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?

An independent-samples *t* test was conducted to evaluate whether the mean scores for characteristics of the mentor/mentee relationship differed based on type of degree awarded by the program. The test variable was Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey (questions 15-18) and the grouping variable was type of degree awarded by the program (Associate's degree or Bachelor's degree). The Master's degree programs did not yield a large enough number so they were omitted from analysis. The test was significant, $t(85) = 2.40, p = .018$. Therefore, Ho6 was rejected. Respondents from Associate degree programs reported significantly greater levels of expectations in regard to new faculty mentoring ($M = 13.32, SD = 3.42$) when compared to Bachelor degree programs ($M = 11.21, SD = 3.28$). The 95% confidence interval for the difference in means was .37 to 3.86. The η^2 index was .06, which indicated a medium effect size. Figure 5 shows the distributions for the two groups.

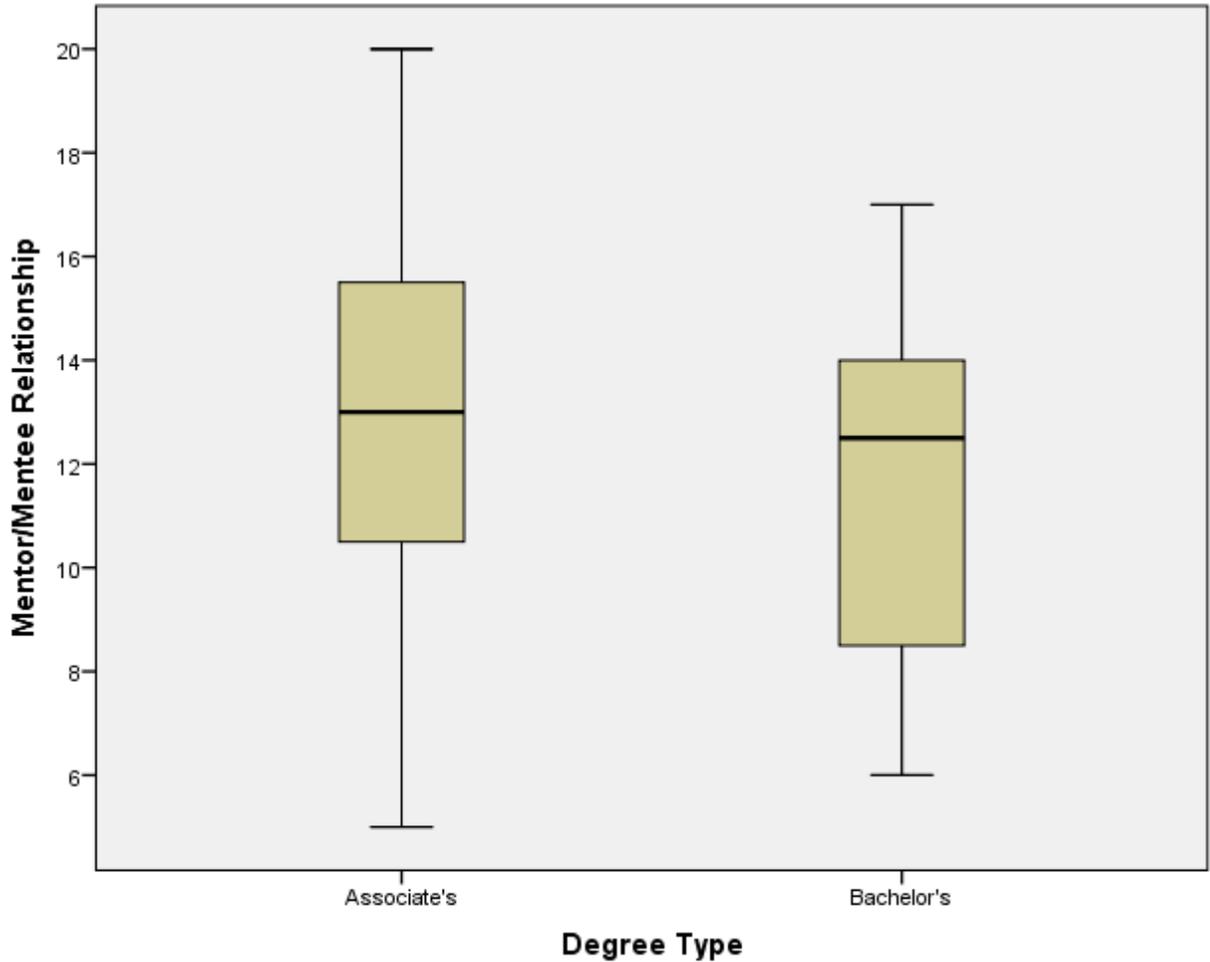


Figure 4. Dimension 2 Scores for Type of Degree Awarded by Program

Research Question 7

Is there a significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the academic rank of the program director (Instructor, Assistant Professor, Associate Professor, Professor, Other)?

Ho7: There is no significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited

respiratory care programs based on the academic rank of the program director (Instructor, Assistant Professor, Associate Professor, Professor, Other)?

A one-way analysis of variance (ANOVA) was conducted to evaluate the association between characteristics of the mentor/mentee relationship and the program director’s academic rank. The factor variable, academic rank, included five levels: Instructor, Assistant Professor, Associate Professor, Professor, and Other (if the program did not use a traditional faculty ranking system). The dependent variable was Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey (questions 15-18). The ANOVA was not significant, $F(4, 95) = 1.77, p = .069$. Therefore, the H_0 was retained. The strength of the association between the program director’s academic rank and Dimension 2 on the RCF Mentoring Survey as assessed by η^2 was .07. The results indicated the reported mentor/mentee relationship characteristics were not significantly affected by the program director’s academic rank. Although, program directors who identified as administrative (other) had a higher mean than those of other academic ranks. The means and standard deviations for the five academic ranks are reported in Table 4.

Table 4

Means and Standard Deviations for 5 Academic Ranks (Dimension 2)

Academic Rank	N	M	SD
Instructor	21	12.62	2.96
Assistant Professor	17	11.41	3.86
Associate Professor	25	12.28	3.62
Professor	14	12.36	3.18
Other	23	14.17	3.50

Research Question 8

Is there a significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the gender of the program director?

Ho8: There is no significant difference in the mean scores for Dimension 2 (Mentor/Mentee Relationship) on the RCF mentoring Survey among CoARC accredited respiratory care programs based on gender of the program director.

An independent-samples *t* test was conducted to evaluate whether the mean scores for the mentor/mentee relationship differed based on the gender of the program director. Dimension 2 (Mentor/Mentee Relationship) was the test variable and the grouping variable was male or female. The test was significant, $t(98) = 2.12, p = .037$. Therefore, Ho8 was rejected. Females ($M = 13.18, SD = 3.30$) reported significantly greater levels of expectations in regard to new faculty mentoring, than did males ($M = 11.66, SD = 3.69$). The 95% confidence interval for the difference in means was -2.96 to -.097. The η^2 index was .04, which indicated a small effect size. Figure 6 shows the distribution for the two groups.

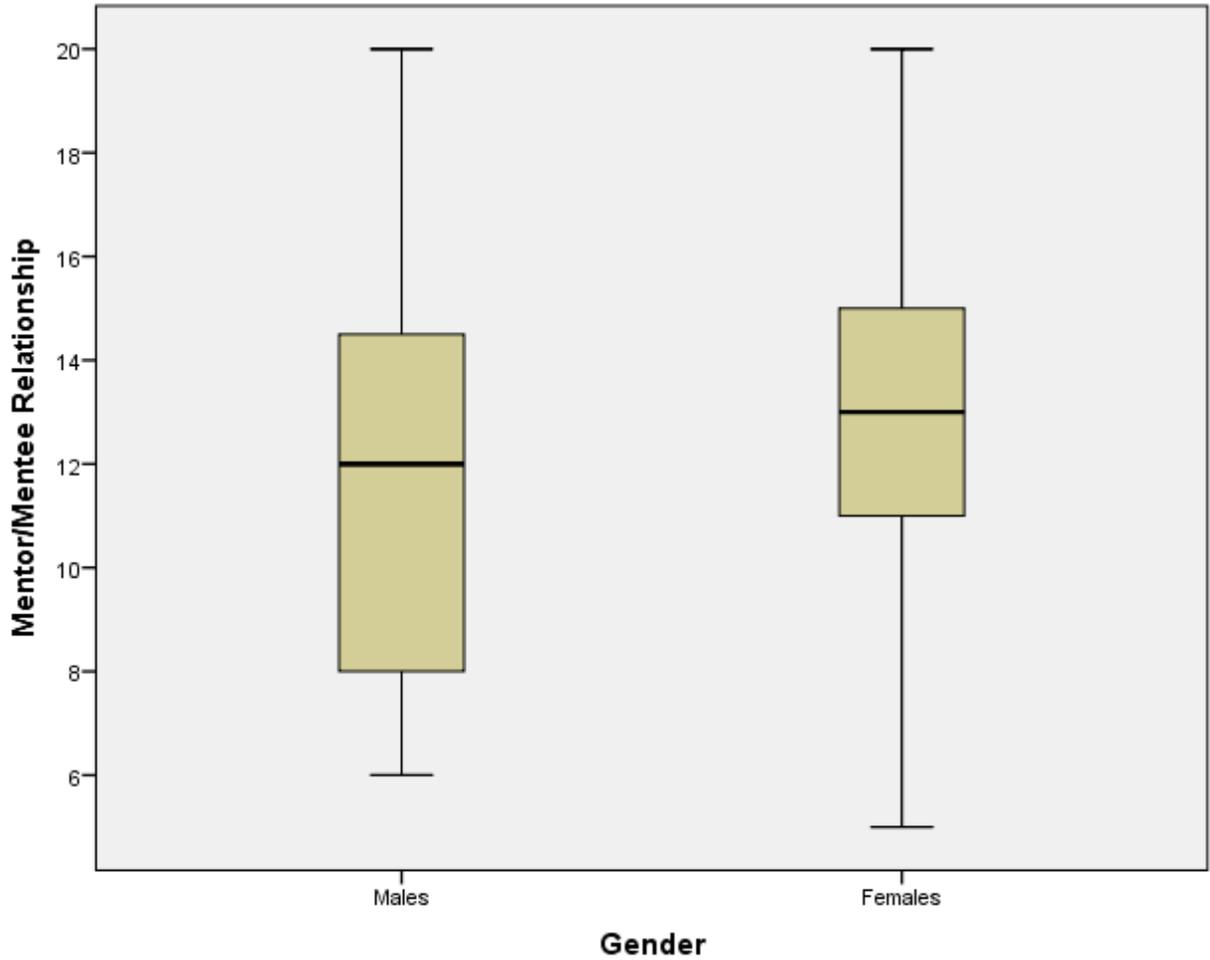


Figure 5. Dimension 2 Scores for Program Directors by Gender

Research Question 9

Is there a significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West)?

Ho9: There is no significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs by demographic region (Northeast, Midwest, South, or West).

A one-way analysis of variance (ANOVA) was conducted to evaluate the relationship between program director perceptions of mentoring impact and the demographic region of the program. The factor variable, demographic region, included four categories: Northeast, Midwest, South, and West. The dependent variable was Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey (questions 20-23). The ANOVA was not significant, $F(3, 98) = .09, p = .966$. Therefore, H_0 was retained. The strength of the relationship between demographic region and perceptions of mentoring impact as assessed by η^2 was small ($< .01$). The results indicated the reported perceptions of mentoring impact were not significantly affected by demographic region of the program. The means and standard deviations for the four demographic regions are reported in Table 5.

Table 5

Means and Standard Deviations of 4 Demographic Regions (Dimension 3)

Demographic Region	N	M	SD
Northeast	16	20.25	2.65
Midwest	25	19.88	3.13
South	47	20.04	2.69
West	14	20.29	2.70

Research Question 10

Is there a significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree)?

Ho10: There is no significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on type of degree awarded (Associate's degree, Bachelor's degree, or Master's degree).

An independent-samples *t* test was conducted to evaluate whether the mean scores for perceptions of mentoring impact differed based on type of degree awarded by the program. The test variable was Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey (questions 20-23) and the grouping variable was type of degree awarded by the program (Associate's degree or Bachelor's degree). The Master's degree programs did not yield a large enough number so they were omitted from analysis. The test was not significant, $t(87) = .25, p = .802$. Therefore, Ho10 was retained. The η^2 index was $< .01$, which indicated a small effect size. Respondents from Associate degree programs ($M = 19.81, SD = 2.83$) tended to report the same perceptions of mentoring impact as respondents from Bachelor degree programs ($M = 20.00, SD = 2.94$). The 95% confidence interval for the difference in means was -1.65 to 1.28. Figure 7 shows the distribution for the two groups.

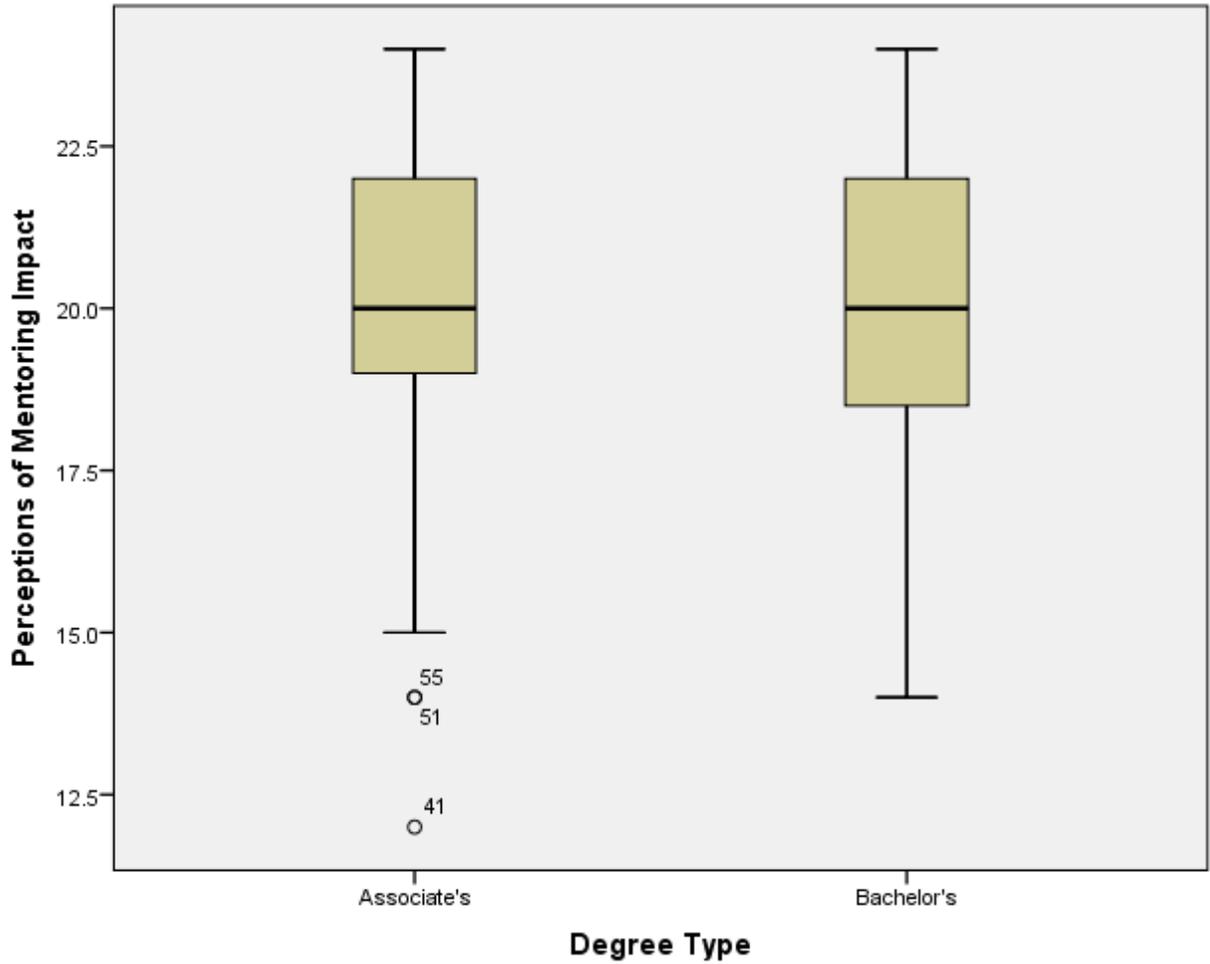


Figure 6. Dimension 3 Scores for Type of Degree Awarded by Program

Note: 0 = 1.5 to 3 times the interquartile range.

Research Question 11

Is there a significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the academic rank of the program director (Instructor, Assistant Professor, Associate Professor, Professor, Other)?

Ho11: There is no significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the academic rank of the program director (Instructor, Assistant Professor, Associate Professor, Professor, Other).

A one-way analysis of variance (ANOVA) was conducted to evaluate the relationship between academic rank of the program director and reported perceptions of mentoring impact. The factor variable, academic rank, included five levels: Instructor, Assistant Professor, Associate Professor, Professor, and Other (if the program did not use a traditional faculty ranking system). The dependent variable was Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey (questions 20-23). The ANOVA was not significant, $F(4, 98) = 1.59, p = .182$. Therefore, Ho11 was retained. The strength of the relationship between program director academic rank and reported perceptions of mentoring impact as assessed by η^2 was .06. The results indicate the reported perceptions of mentoring impact were not significantly affected by the academic rank of the program director. The means and standard deviations for the five academic ranks are reported in Table 6.

Table 6

Means and Standard Deviations of 5 Academic Ranks (Dimension 3)

Academic Rank	N	M	SD
Instructor	21	20.33	2.96
Assistant Professor	17	21.41	2.62
Associate Professor	25	19.68	2.88
Professor	17	19.53	3.71
Other	23	19.52	1.12

Research Question 12

Is there a significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF Mentoring Survey among CoARC accredited respiratory care programs based on the gender of the program director?

Ho12: There is no significant difference in the mean scores for Dimension 3 (Perceptions of Mentoring Impact) on the RCF mentoring Survey among CoARC accredited respiratory care programs based on gender of the program director.

An independent-samples *t* test was conducted to evaluate whether mean scores for perceptions of mentoring impact differed based on the gender of the program director.

Dimension 3 (Perceptions of Mentoring Impact) was the test variable and the grouping variable was male or female. The test was not significant, $t(101) = .84, p = .401$. Therefore, Ho12 was retained. The η^2 index was $< .01$, which indicated a small effect size. Male respondents ($M = 20.33, SD = 2.76$) tended to have similar reported perceptions of mentoring impact when compared to female respondents ($M = 19.86, SD = 2.78$). The 95% confidence interval for the difference in means was $-.642$ to 1.59 . Figure 8 shows the distribution for the two groups.

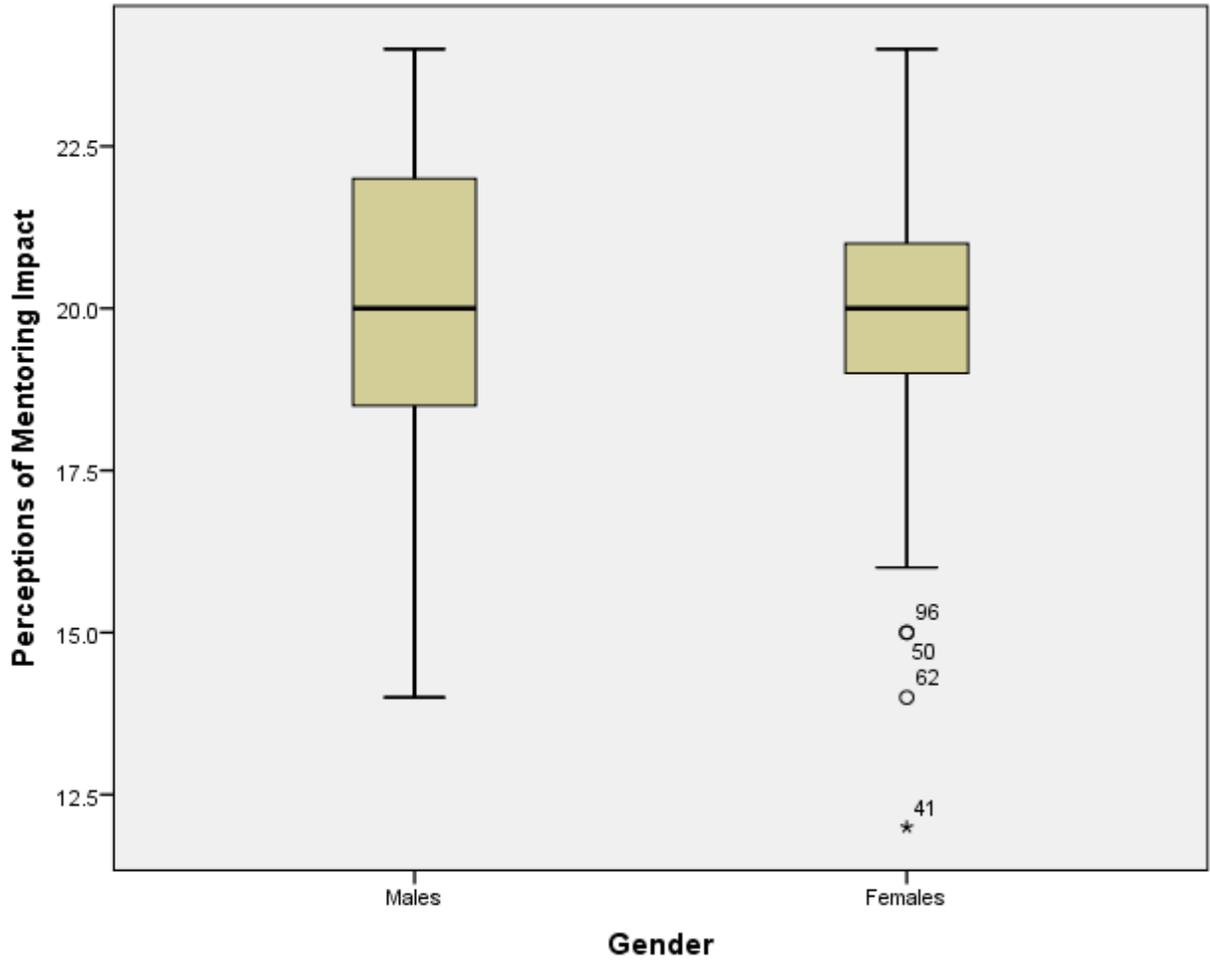


Figure 7. Dimension 3 Scores for Program Directors by Gender

Note: 0 = 1.5 to 3 times the interquartile range and * = more than 3 times the interquartile range.

CHAPTER 5

SUMMARY, DISCUSSION, CONCLUSION, AND RECOMMENDATIONS

The purpose of this quantitative study was to identify current mentoring practices of new faculty members in CoARC accredited respiratory care programs in the U.S. The researcher also sought to identify perceptions of program directors concerning the observed impact of program mentoring practices. Data were collected and analyzed from the Respiratory Care Faculty Mentoring Survey designed by the researcher. The electronic survey was sent to all program directors for whom contact information could be obtained through the CoARC database. Demographic data consisted of demographic region of the program, degree type awarded by the program, gender of the program director, highest degree earned by the program director, and academic rank of the program director. This chapter summarizes the findings, conclusions, and recommendations for practice and future research on the topic.

Summary of Findings

Data were gathered from 126 program directors of the 410 who were sent the invitation to participate in the study, resulting in a 30% response rate. Testing of the null hypotheses associated with the 12 research questions resulted in three significant findings and nine findings that were not significant. The dependent variables were the three dimensions on the survey: mentoring practices, the mentor/mentee relationship, and perceptions of mentoring impact among respiratory care programs. Independent variables were demographic region of the respiratory care program, level of degree awarded by the respiratory care program, academic rank of program director, and gender of the respiratory care program director.

Mentoring practices (Dimension 1) were not significantly affected by the demographic location of the accredited respiratory care program, the type of degree awarded by the program, or the academic rank of the program director. However, female program directors reported significantly greater opportunities for new faculty mentoring when compared to male program directors. Opportunities for new faculty mentoring included the following survey items: 1) the program offers new faculty mentoring, 2) clinical-only faculty members participate in mentoring, 3) part-time faculty members participate in mentoring, 4) full-time faculty members participate in mentoring, and 5) a formal mentor is assigned to a new faculty member.

The mentor/mentee relationship (Dimension 2) was not significantly affected by demographic location of the program or the academic rank of program director. Conversely, both female program directors and respondents from Associate degree programs reported greater levels of expectations in regard to new faculty mentoring. Expectations of new faculty mentoring included the following survey items: 1) the development of informal relationships, 2) set number of meetings per academic year, 3) documenting and/or discussing academic interests with a mentor, and 4) documenting and/or discussing short and long-term goals with mentor.

Perceptions of mentoring impact (Dimension 3) was not significantly affected by the demographic location of the program, type of degree awarded by the program, academic rank of the program director, or gender of the program director. Perceptions of mentoring impact included the following survey items: 1) enhances new faculty job performance, 2) can prevent new faculty turnover, 3), improves new faculty job satisfaction, and 4) increases new faculty organizational commitment.

Discussion

Demographic findings somewhat corresponded to the 2015 Report on Accreditation in Respiratory Care Education (CoARC, 2016) and the recently published 2016 Report (CoARC, 2017). For instance, findings of program by geographic region paralleled those from both the South (45.5% v. 42%) and Midwest (24.1% v. 25%). However, the Northeast region (16.1% v. 14%) and the West (14.3% v. 19%), did not align with reported programmatic statistics (CoARC, 2017). Though the specific percentages were not exact, the proportion of programs by degree offered (Associate's, Bachelor's, or Master's) did resemble that of the CoARC annual report (2017). The majority of respondents in the study were female (63.4%), which corresponds to Ziegler's (2016) findings of 60% of females in the profession of respiratory care. The majority of respondents (program directors) also reported having a Master's degree (59.8%), which aligns with the 54-56% reported by CoARC for highest degree earned by key personnel. The majority of respondents (23%) were ranked as being an Associate Professor, 15.9% ranked as being a full Professor, and 22.1% considered themselves administrative (program director, department chair, college dean). This could indicate a sufficient amount of high-ranking faculty in accredited respiratory care programs who can serve as mentors. Falzarano and Zipp (2012) found the majority of mentors in their study to be ranked at the Associate Professor level.

The majority (58.9%) of respondents indicated a lack of available tenure-track positions at their respective institution. This may explain why promotion and tenure was only the fourth highest rated topic of discussion between mentor and mentee. Over 80% of respondents reported some form of mandatory orientation (institution, college, department, or program) for new faculty. Orientations have been suggested as an effective means to recruit, retain, and increase preparedness of new faculty (Gazza & Shellenbarger, 2005; Hessler & Ritchie, 2006; Gresham-

Anderson, 2015). One respondent stated, “The biggest barrier is the lack of orientation within academia. Coming from a hospital environment to academia was a shock when it comes to orientation to your position”.

Though the majority of respondents indicated an assigned mentor was from within the mentee’s department, 32% of respondents reported not having a mentor assigned to new faculty. However, respondents also reported informal mentoring relationships developed always (24.3%), usually (28.2%), or occasionally (8.7%), when no formal mentor was assigned. This finding is encouraging considering Schrodt et al. (2003) stated informal mentoring relationships could be more beneficial than assigned, more formal interactions. The following statements are from the open-ended question regarding barriers to mentoring implementation.

- “Mentoring should be on a voluntary basis. If a faculty member is forced to mentor, then the experience is less beneficial to the mentee”.
- “Mentoring in our program is totally informal. Therefore, the responsibility for the intensity of mentoring that occurs is pretty much placed on the mentor and mentee. There are no formal ‘playbooks’ for mentoring anywhere in our college. This makes the process somewhat hit or miss”.

Similar to the findings of Pinto Zipp et al. (2014), teaching pedagogy was the predominant topic of discussion between mentees and mentors. This finding corresponds with others who have reported feelings of lack of preparation in the educator role when transitioning from training and experience in clinical practice (Clark et al., 2010; LaRocco & Bruns, 2006; Schriener, 2007; White et al., 2010).

The same number of respondents reported that clinical-only faculty members always versus occasionally (34%) participated in mentoring. Prior studies have reported a disconnect from the clinical faculty member's institution due to a lack of proximity (Feldman et al., 2010; Schriener, 2007; White et al., 2010). Part-time clinical faculty members may be potential applicants when full-time faculty positions come available and full-time clinical faculty may experience emotional exhaustion (Yedidia et al., 2014), so the need to better invest in the enculturation of these faculty members into academia is apparent. The majority of respondents (27%) reported mentors and mentees not being expected to meet a set number of times per academic year. This finding may correspond with the prevalence of informal mentoring relationships in the study. However, those who reported having to meet regularly indicated once a year to weekly. Regular meetings between the mentor and mentee may aid in tracking the progress of the new faculty member and maintaining a personal relationship with the individual (Columbia U, n.d.; Jackevicius et al., 2014; Straus et al., 2013; UCSF, 2012).

The majority of respondents indicated an agreement or strong agreement to the potential impact of mentoring on new faculty job performance, new faculty turnover, new faculty job satisfaction, and new faculty organizational commitment. Mentoring may help reduce feelings of isolation and anxiety in new faculty members resulting in less turnover (Romig et al., 2011). The presence of mentoring may also bring feelings of job security if goals are met and advancement opportunities are made available to new faculty (Xu, 2008). The lack of tenure-track positions found in this study may prove to be detrimental to programs considering the new generation of faculty members who seek advancement opportunities in their careers.

When participants were asked what barriers to mentoring implementation they have witnessed in respiratory care programs, 42% (n = 35) responded with a lack of time. The

majority of accredited programs only employ two full-time faculty members (a program director and director of clinical education) and rely heavily on part-time clinical faculty who often have additional employment. One respondent stated, “Mentoring takes time and needs support from administration”. These findings correspond to others who reported a lack of time as the biggest challenge to new faculty mentoring (Falzarano & Zipp, 2012; Pinto Zipp et al., 2014). Finding senior faculty who were committed to serving as a mentor also surfaced as a barrier to mentoring implementation. A few respondents stated senior faculty were not always available, were not always good role models, or committed to the professional and personal growth of the new faculty member.

The feedback from these respondents supports the thought that not all senior faculty have the desire or skill to serve as effective mentors (Hessler & Ritchie, 2006; Murray et al., 2014; White et al., 2010). Supportive senior faculty can increase new faculty job satisfaction (Romig et al., 2011). Horizontal hostility has no place in academia and recruiting experienced faculty rather than more seasoned faculty to serve as mentors may be an effective means of implementation. Novice educators desire to feel a sense of commonality with colleagues, which may be difficult to achieve with senior faculty. Though there are certainly barriers to mentoring implementation, respondents also reported positive experiences with mentoring. Respondents reported mentoring could be a rewarding experience, could strengthen the relationship among faculty, increase confidence in the new faculty member, and serve as motivation for new faculty to become a mentor to others in the future. Constructive and fulfilling mentoring relationships have the ability to cultivate a cycle of continued mentoring in future generations of higher education respiratory care faculty and students. For novice educators professional success as opposed to survival should be the goal.

Conclusions

This study was an examination of mentoring practices in accredited respiratory care programs. Significant findings included female program directors reported greater opportunities for mentoring within their programs and greater levels of expectations in regard to mentoring. This may be because women often accrue more psychosocial benefit from mentoring and actively seek greater guidance when trying to achieve an appropriate work-life balance (Thomas et al., 2015). Associate degree programs also reported a higher level of expectation in regard to mentoring. This may be due to the minimal degree required of faculty in Associate degree programs is a Bachelor's degree; resulting in less new faculty socialization and preparation from a graduate program. There was overwhelming agreement concerning the potential impact and benefit of new faculty mentoring on job performance, turnover, job satisfaction, and organizational commitment.

Recommendations for Practice

This study has highlighted a few recommendations for new faculty mentoring. The higher education institution and its leaders should be supportive of mentoring practices and reward those who serve effectively in this capacity. Informal mentoring relationships should be encouraged regardless of whether a formal program has been implemented. New faculty who have the minimum education required to serve as an educator should be encouraged to pursue advanced education which could help cultivate greater teaching and research skills in academia. Mentoring should occur at all stages in one's career; however, the initial entrance into higher education may require the most significant amount of time and resources for new faculty. Allowing sufficient time for mentoring to occur should also be warranted by programs and

departments. Both mentors and mentees should be fully committed to the relationship and work towards achieving predetermined goals.

Recommendations for Further Research

A study on respiratory care clinical faculty members and perceptions of mentoring may help to fill a gap in the literature because this population could benefit from mentoring yet have historically been underrepresented in these types of relationships. Furthermore, a study on the effectiveness of mentoring in respiratory care programs may aid in the development of mentoring best practices for future programs and faculty to emulate. A study regarding female faculty retention in allied health programs of study may yield additional information as to the motivation for leaving the academy and potentially returning to clinical practice. Lastly, a survey of health science administrators (academic deans) concerning perceptions of new faculty support may highlight areas of improvement in new faculty investment and success.

REFERENCES

- American Association for Respiratory Care. (2009). *Respiratory therapist human resource study*. Irving, TX: AARC; June 2009.
- American Association for Respiratory Care. (2014). *Respiratory therapist human resource study*. Irving, TX: AARC; January 2015.
- Anderson, J.K. (2009). The work-role transition of expert clinician to novice academic educator. *Journal of Nursing Education, 48*(4), 203-208.
- Arena, R.A., Goldberg, L.R., Ingersoll, C.D., Larsen, D.S., & Shelledy, D. (2011). Research in allied health professions: Why fund it? *Journal of Allied Health, 40*(3), 161-166.
- Association of Schools of Allied Health Professions. (2016). *Definition of allied health*. Retrieved September 5, 2016 from <http://www.asahp.org/>
- Barnes, T.A., Gale, D.G., Kacmarek, R.M., & Kegeler. (2010). Competencies needed by graduate respiratory therapists in 2015 and beyond. *Respiratory Care, 55*(5), 601-616.
- Barnes, T.A., Kacmarek, R.M., & Durbin, C.G. (2011). Survey of respiratory therapy education program directors in the United States. *Respiratory Care, 56*(12), 1906-1915.
- Benner, P. (1982). From novice to expert. *American Journal of Nursing, 82*(3), 402-407.
- Berk, R.A., Berg, J., Mortimer, R., Walton-Moss, B., & Yeo, T.P. (2005). Measuring the effectiveness of faculty mentoring relationships. *Academic Medicine, 80*(1), 66-71.
- Bickel, J., & Brown, A.J. (2005). Generation X: implications for faculty recruitment and development in academic health centers. *Academic Medicine, 80*(3), 205-210.
- Bureau of Labor Statistics. (2015). *Occupational outlook handbook: respiratory therapists*. Retrieved August 28, 2016 from <http://www.bls.gov/ooh/healthcare/respiratory>
- Cameron, K.S., & Quinn, R.E. (1999). *An introduction to changing organizational culture: Diagnosing and changing organizational culture* (pp. 4-12). Upper Saddle River, NJ: Prentice Hall.
- Candela, L., Gutierrez, A., & Keating, S. (2013). A national survey examining the professional work life of today's nursing faculty. *Nurse Education Today, 33*, 853-859.
- Castiglia, B. (2006). The impact of changing culture in higher education on the person-organization fit, job satisfaction, and organizational commitment of college faculty. *Academy of Educational Leadership Journal, 10*(2), 23-38.
- Chatburn, R.L. (2004). Advancing beyond the average: The importance of mentoring in professional achievement. *Respiratory Care, 49*(3), 304-308.
- Chung, C.E., & Kowalski, S. (2012). Job stress, mentoring, psychological empowerment, and job satisfaction among nursing faculty. *Journal of Nursing Education, 51*(7), 381-388.

- Clark, N.J., Houten, L.A., & Perea-Ryan, M. (2010). Transitioning from clinical practice to academia: university expectations on the tenure track. *Nurse Educator*, 35(3), 105-109.
- Columbia University: Mailman School of Public Health. (n.d.). Faculty mentoring. Retrieved from <https://www.mailman.columbia.edu/information-for/teaching-learning/faculty>
- Commission on Accreditation for Respiratory Care. (2015). *Accreditation standards for entry into respiratory care professional practice*. Retrieved August 28, 2016 from <http://www.coarc.com/>
- Commission on Accreditation for Respiratory Care. (2016). *2015 Report on accreditation in respiratory care education*. Retrieved on August 28, 2016 from <http://www.coarc.com/>
- Commission on Accreditation for Respiratory Care. (2017) *2016 Report on accreditation in respiratory care education*. Retrieved on May 30, 2017 from <http://www.coarc.com/>
- Dunham-Taylor, J, Lynn, C.W., Moore, P., McDaniel, S., & Walker, J.K. (2008). What goes around comes around: improving faculty retention through more effective mentoring. *Journal of Professional Nursing*, 24(6), 337-346. doi: 10.1016/j.profnurs.2007.10.013
- Eddy, P.L. & Gaston-Gayles, J.L. (2008). New faculty on the block: issues of stress and support. *Journal of Human Behavior in the Social Environment*, 17, 89-106.
- Falzarano, M. & Zipp, G.P. (2012). Perceptions of mentoring of full-time occupational therapy faculty in the United States. *Occupational Therapy International*, 19, 117-126. doi: 10.1002/oti.1326
- Feldman, M.D., Arean, P.A., Marshall, S.J., Lovett, M., & O'Sullivan, P. (2010). Does mentoring matter: results from a survey of faculty mentees at a large health sciences university. *Medical Education Online*, 15: 5063- doi: 10.3402/meo.v15i0.5063
- Gazza, E.A., & Shellenbarger, T. (2005). Successful enculturation: Strategies for retaining newly hired nursing faculty. *Nurse Educator*, 30(6), 251-254.
- Gibson, S.K. (2006). Mentoring of women faculty: The role of organization politics and culture. *Innovative Higher Education*, 31(1), 63-78. doi: 10.1007/s10755-006-9007-7
- Green, S.B., & Salkind, N.J. (2011). *Using SPSS for Windows and Macintosh: Analyzing and understanding data*. Upper Saddle River, NJ: Pearson.
- Gresham-Anderson, J.L. (2015). The transitional experience of therapist to educator. *Respiratory Care Education Annual*, 24, 28-36.
- Heinrich, K.T., & Oberleitner, M.G. (2012). How a faculty group's peer mentoring of each other's scholarship can enhance retention and recruitment. *Journal of Professional Nursing*, 28(1), 5-12.
- Hessler, K., & Ritchie, H. (2006). Recruitment and retention of novice faculty. *Journal of Nursing Education*, 45(5), 150-154.

- Jackevicius, C.A., Le, J., Nazer, L., Hess, K., Wang, J., and Law, A.V. (2014). A formal mentorship program for faculty development. *American Journal of Pharmaceutical Education*, 78(5).
- Kacmarek, R.M., Durbin, C.G., Barnes, T.A., Kageler, W.V., Walton, J.R., & O'Neil, E.H. (2009). Creating a vision for respiratory care in 2015 and beyond. *Respiratory Care*, 54(3), 375-389.
- Kahanov, L., Eberman, L., Yoder, A., & Kahonov, M. (2012). Culture shock: Transitioning from clinical practice to educator. *The Internet Journal of Allied Health Sciences and Practice*, 10(1), ISSN 1540-580X.
- LaRocco, D.J., & Bruns, D.A. (2006). Practitioner to professor: an examination of second career academics' entry into academia. *Education*, 126(4), 626-639.
- Lawrence, J., Ott, M., & Bell, A. (2011). Faculty organizational commitment and citizenship. *Research in Higher Education*, 53: 325-352. doi: 10.1007/s11162-011-9230-7
- Lumpkin, A. (2011). A model for mentoring university faculty. *The Educational Forum*, 75, 357-368.
- Lumpkin, A. (2014). The role of organizational culture on career stages of faculty. *The Educational Forum*, 78, 196-205. doi:10.1080/00131725.2013.878420
- Manning, K. (2013). *Organizational theory in higher education*. New York, NY: Routledge.
- McDonald, P.J. (2010). Transitioning from clinical practice to nursing faculty: lessons learned. *Journal of Nursing Education*, 49(3), 126-131. doi: 10.3928/01484834-20091022-02
- Mendoza, P. (2008). Socialization to the academic culture: A framework of inquiry. *Revista de Estudios Sociales*, 31, 104-117.
- Murray, C., Stanley, M., & Wright, S. (2014). The transition from clinician to academic in nursing and allied health: a qualitative meta-synthesis. *Nurse Education Today*, 34, 389-395.
- Murray, J.P. (2008). New faculty members' perceptions of the academic work life. *Journal of Human Behavior in the Social Environment*, 17, 107-128.
- O'Meara, K., Louder, A., & Campbell, C.M. (2014). The heaven or hell: sensemaking about why faculty leave. *The Journal of Higher Education*, 85(5), 603-630.
- Pinto Zipp, G., Maher, C., & Falzarano, M. (2014). An observational study exploring academic mentorship in physical therapy. *Journal of Allied Health*, 44(2), 96-101.
- Romig, B., Maillet, J., & Denmark, R.M. (2011). Factors affecting allied health faculty job satisfaction. *Journal of Allied Health*, 40(1), 3-14.

- Ryan, J.F., Healy, R., & Sullivan, J. (2012). Oh, won't you stay? Predictors of faculty intent to leave a public research university. *Higher Education*, 63, 421-437. doi:1007/s10734-011-9448-5
- Schriner, C.L. (2007). The influence of culture on clinical nurses transitioning into the faculty role. *Nursing Education Perspectives*, 28(3), 145-149.
- Schrodt, P., Cawyer, C.S., & Sanders, R. (2003). An examination of academic mentoring behaviors and new faculty members' satisfaction with socialization and tenure and promotion processes. *Communication Education*, 52(1), 17-29.
- Shumacher, G. Risco, K., & Conway, A. (2008). The Schumacher Model: Fostering scholarship and excellence in nursing and for recruiting and grooming new faculty. *Journal of Nursing Education*, 47(12), 571-576.
- Specht, J.A. (2013). Mentoring relationships and the levels of role conflict and role ambiguity experienced by novice nursing faculty. *Journal of Professional Nursing*, 29(5), 25-31.
- Straus, S.E., Johnson, M.O., Marquez, C., & Feldman, M.D. (2013). Characteristics of successful and failed mentoring relationships: a qualitative study across two academic health centers. *Academic Medicine*, 88(1), 82-89.
- Strong, E.A., De Castro, R., Sambuco, D., Stewart, A., Ubel, P.A., Griffith, K.A., & Jagsi, R. (2013). Work-life balance in academic medicine: Narratives of physician-researchers and their mentors. *Journal of General Internal Medicine*, 28(12), 1596-1603.
- Thomas, N., Bystydzienski, J., & Desai, A. (2015). Changing institutional culture through peer mentoring of women STEM faculty. *Innovative Higher Education*, 40, 143-157.
- Tierney, W.G. (1988). Organizational culture in higher education. *Journal of Higher Education*, 59(1), 1-20.
- Tierney, W.G. (1997). Organizational socialization in higher education. *Journal of Higher Education*, 68(1), 1-17.
- Troisi, J.D., Leder-Elder, S., Stiegler-Balfour, J.J., Fleck, B.K.B., & Good, J.J. (2015). Not all types of mentors are created equal: comparing the effectiveness of intra-departmental, intra-university, and self-selected mentors. *Journal of Faculty Development*, 29(3), 17-22.
- University of California, San Francisco. (2012). *Faculty mentoring toolkit*. Retrieved from http://academicaffairs.ucsf.edu/ccfl/faculty_mentoring_program_resources.php
- University of Wisconsin-Madison. (2017). *Women faculty mentoring program*. Retrieved from <https://provost.wisc.edu/mentor.htm>
- White, A., Brannan, J. & Wilson, C.B. (2010). A mentor-protégé program for new faculty, part I: stories of protégés. *Journal of Nursing Education*, 49(11), 601-607.

- Wilson, C.B., Brannan, J., & White, A. (2010). A mentor-protégé program for new faculty, part II: stories of mentors. *Journal of Nursing Education*, 49(12), 665-671.
- Xu, Y.J. (2008). Faculty turnover: discipline-specific attention is warranted. *Research in Higher Education*, 49, 40-61. doi:10.1007/s11162-007-9062-7
- Yedidia, M.J., Chou, J., Brownlee, S., Flynn, L., & Tanner, C.A. (2014). Association of faculty perceptions of work-life with emotional exhaustion and intent to leave academic nursing: report on a national survey of nurse faculty. *Journal of Nursing Education*, 53(10), 569-579.
- Ziegler, K. (2016). Gender gap still exists. *Advance healthcare network for respiratory care and sleep medicine*. Retrieved from <http://respiratory-care-sleep-medicine>

APPENDICES

APPENDIX A

Respiratory Care Faculty Mentoring Survey

Demographic Information

1. Select the region that best describes the location in which your accredited respiratory care program is housed.
 - Northeast (MA, RI, NH, ME, VT, CT, NJ, NY, PA)
 - Midwest (OH, IN, MI, WI, IL, IA, MN, SD, ND, MO, KS, NE)
 - South (DC, DE, MD, VA, WV, NC, SC, GA, FL, AL, TN, MS, KY, LA, AR, OK, TX)
 - West (MT, CO, WY, ID, UT, AZ, NM, NV, CA, HI, OR, WA, AK)

2. Select the degree that is awarded by your accredited respiratory care program (check all that apply).
 - Associate's degree
 - Bachelor's degree
 - Master's degree

3. Please select the option that best indicates your academic rank.
 - Instructor
 - Assistant Professor
 - Associate Professor
 - Full Professor
 - Other, _____

4. What is the highest degree level you have earned?
 - Bachelor's degree
 - Master's degree
 - Doctoral degree

5. To which gender do you most identify? _____

6. How many faculty members does your respiratory care program employ?
- _____ Full time faculty
 - _____ Part time faculty
7. Does your respiratory care program offer tenure-track faculty positions?
- Yes
 - No
 - Not sure
8. In what type of orientation are new faculty members required to participate? (Pick all that apply)
- Institution orientation
 - College-specific orientation
 - Department orientation
 - Program orientation
 - None

Dimension I: Mentoring Practices

9. Your respiratory care program offers new faculty mentoring.

Always Usually Occasionally Never

10. Clinical-only faculty members in your respiratory care program participate in mentoring.

Always Usually Occasionally Never N/A

11. Part-time faculty members in your respiratory care program participate in mentoring.

Always Usually Occasionally Never N/A

12. Full-time faculty members in your respiratory care program participate in mentoring.

Always Usually Occasionally Never N/A

13. A formal mentor is assigned to a new faculty member in your respiratory care program.

Always Usually Occasionally Never N/A

14. If a formal mentor is assigned, where does the mentor work?

- _____ Mentee's department
- _____ Mentee's college or school
- _____ Mentee's institution
- _____ Outside the mentee's institution
- _____ Not applicable

Dimension II: Mentor/Mentee Relationship

15. If no formal mentor is assigned, do informal mentoring relationships develop?

- Always Usually Occasionally Never N/A

16. Mentors and mentees are expected to meet a set number of times per academic year.

- Always Usually Occasionally Never N/A

If yes, please indicate number of times _____

17. New faculty members are expected to discuss or document academic interests with a mentor.

- Always Usually Occasionally Never N/A

18. New faculty members are expected to discuss or document both short and long-term career goals with a mentor.

- Always Usually Occasionally Never N/A

19. What topics do new faculty members most wish to discuss with his or her mentor?
(Please rank, with 1 being the most frequent topic of new faculty member discussion)

- _____ Work/life balance
- _____ Promotion/Tenure
- _____ Pedagogy/Teaching
- _____ Research
- _____ Service
- _____ Other

For dimension III of the survey, please choose the option that best describes your agreement to the preceding statement regarding perceptions of mentoring impact.

Dimension III: Perceptions of Mentoring Impact

20. Mentoring enhances new faculty job performance.

Disagree strongly, Disagree, Somewhat disagree, Somewhat agree, Agree, Agree strongly

21. Mentoring prevents new faculty turnover.

Disagree strongly, Disagree, Somewhat disagree, Somewhat agree, Agree, Agree strongly

22. Mentoring improves new faculty job satisfaction.

Disagree strongly, Disagree, Somewhat disagree, Somewhat agree, Agree, Agree strongly

23. Mentoring increases new faculty organizational commitment.

Disagree strongly, Disagree, Somewhat disagree, Somewhat agree, Agree, Agree strongly

The final two questions are open-ended so that respondents can provide examples of personal experiences with mentoring.

24. What barriers to mentoring implementation have you witnessed in your RC program?

25. What experiences have you had with mentoring in higher education?

APPENDIX B

Informed Consent Letter

New Faculty Mentoring in Respiratory Care Programs

Dear Participant:

My name is Kristen McHenry, and I am an Assistant Professor and Cardiopulmonary Science Program Director at East Tennessee State University. I am working on my doctoral degree in higher education leadership and policy analysis. In order to meet degree requirements, I must complete a dissertation. The name of my research study is **New Faculty Mentoring in Respiratory Care**.

The purpose of this study is to identify current mentoring practices of new faculty members in CoARC accredited respiratory care programs in the U.S. I would like to give a brief online survey to Respiratory Care Program Directors using Qualtrics. It should only take about 10 minutes to finish. You will be asked questions about mentoring practices and your perceptions of mentoring. Because this study deals with mentoring practices and perceptions, the risks are minimal. However, you may also feel better after you have had the chance to express yourself about mentoring in your institution. This study may benefit you or others by supporting new respiratory care faculty in higher education.

Your confidentiality will be protected as best we can. Because we are using technology no guarantees can be made about the interception of data sent over the Internet by any third parties, just like with emails. We will make every effort to make sure that your name is not linked with your answers. Qualtrics has security features that will be used: IP addresses will not be collected and SSL encryption software will be used. Although your rights and privacy will be protected, the East Tennessee State University (ETSU) Institutional Review Board (IRB) (for non-medical research) and people working on this research y

Taking part in this study is voluntary. You may decide not to take part in this study. You can quit at any time. You may skip any questions you do not want to answer or you can exit the online survey form if you want to stop completely. If you quit or decide not to take part, the benefits or treatment that you would otherwise get will not be changed.

If you have any research-related questions or problems, you may contact me, Kristen McHenry, at 423.547.4917. I am working on this project with my faculty advisor, Dr. Jim Lampley. You may reach him at 423 439.7619. Also, you may call the chairperson of the IRB at ETSU at (423) 439-6054 if you have questions about your rights as a research subject. If you have any questions or concerns about the research and want to talk to someone who is not with the research team or if you cannot reach the research team, you may call an IRB Coordinator at 423/439-6055 or 423/439-6002.

Sincerely,

Kristen McHenry MS, RRT-ACCS

APPENDIX C

Email Invitation to Participate

Dear Respiratory Care Program Director:

The transition from expert clinician to novice educator can be unsettling. Mentoring new faculty can ensure their professional development and their future success in respiratory care education. As part of my doctoral dissertation, I would like to study “New Faculty Mentoring in Respiratory Care Programs”.

The purposes of the study are to identify current mentoring practices in CoARC accredited respiratory care programs, components of the mentor-mentee relationship, and perceptions of respiratory care program directors in regard to mentoring impact.

I would greatly appreciate your participation. The results of the study may prove beneficial to educators and administrators in efforts to recruit and retain new faculty in respiratory care. In order to do so, please follow the link provided below. The survey will tentatively close on May 7, 2017. The informed consent is attached as a word document to this email.

https://etsucrhs.co1.qualtrics.com/jfe/form/SV_6gRAsYXDIT1kVv

Best regards, Kristen McHenry MS, RRT-ACCS

Reminder Email Request to Participate

Dear Respiratory Care Program Director:

If you have already completed the survey you can disregard this email. Thank you very much for your participation!

The transition from expert clinician to novice educator can be unsettling. Mentoring new faculty can ensure their professional development and their future success in respiratory care education. As part of my doctoral dissertation, I would like to study “New Faculty Mentoring in Respiratory Care Programs”.

The purposes of the study are to identify current mentoring practices in CoARC accredited respiratory care programs, components of the mentor-mentee relationship, and perceptions of respiratory care program directors in regard to mentoring impact.

I would greatly appreciate your participation. The results of the study may prove beneficial to educators and administrators in efforts to recruit and retain new faculty in respiratory care. In order to do so, please follow the link provided below. The survey will tentatively close on May 7, 2017. The informed consent is attached as a word document to this email.

https://etsucrhs.co1.qualtrics.com/jfe/form/SV_6gRAsYXDIT1kVv

Best regards, Kristen McHenry MS, RRT-ACCS

VITA

KRISTEN L. MCHENRY

- Education: Doctor of Education in Educational Leadership
East Tennessee State University- 2017
Master of Science in Allied Health (concentration-Education)
East Tennessee State University- 2013
Bachelor of Science in Allied Health (Cardiopulmonary Science)
East Tennessee State University- 2005
- Professional Experience: Cardiopulmonary Science Program Director
East Tennessee State University- 2014 to present
Assistant Professor- Dept. of Allied Health Sciences
East Tennessee State University- 2013 to present
Adjunct Instructor- Respiratory Care Program
University of Cincinnati- 2013 to 2014
Clinical Instructor- Cardiopulmonary Science Program
East Tennessee State University- 2008 to 2013
Registered Respiratory Therapist-
Bristol Regional Medical Center- 2005 to 2013
- Publications: McHenry, K. (2016). Interprofessional opportunities in sleep practice. *Journal of Lung, Pulmonary, and Respiratory Research*, 3(6). doi10.15406/jlpr.2016.03.001006
McHenry, K.L., Byington, R.L., Verhovsek E.L., and Keene, K.S. (2014). A study of the relationship between APACHE II scores and the need for a tracheostomy. *The Internet Journal of World Health and Societal Politics*, (9)1.
- Awards: Best Paper Award: 2016 International Conference on Learning and Administration in Higher Education- Key Elements of a State Master Plan