A STUDY TO EXAMINE THE RELATIONSHIPS BETWEEN THE LEADERSHIP STYLE OF NURSE MANAGERS (NMs) AND THE LEADERSHIP STYLE OF CLINICAL NURSE LEADERS (CNLs) AND THE LEADERSHIP BEHAVIORS OF THEIR STAFF NURSES (SNs)

By:

Selena Guillory Sibley

DISSERTATION
Presented to the Faculty of the
School of Business and Leadership
Our Lady of the Lake University,
In Partial Fulfillment of the Requirements

For the Degree of
Doctor of Philosophy
In Leadership Studies

Our Lady of the Lake University
San Antonio, Texas
May 25, 2011

Dr. Meghan Carmody-Bubb

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DEDICATION

I dedicate all the hard work and effort that it took to complete this journey to my adorable and loving parents, Vincent and Dorothy Guillory, my (4) children-Terrance, Vinnecia, Tyler and Taylor, my loving fiancé, Anthony, my brothers, Kenneth, Lehmann, Shawn, and Tony, my best friend, Sue, and my grand ma-ma. I give to you all a "Thank You" from the deepest depth of my heart. Thank you for all of your prayers, support, encouragement, patience and most of all, your love. I could not have accomplished this magnificent feat without each and every one of you.

Thank you, my daddy, for always believing in me, especially at times when I was struggling to believe in myself. You remained the steadfast wind behind me that continued to push me forward, not letting me stall. You never let me forget how important it was to get my degree....or two...or three!

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Thank you, my children, for your patience, encouragement, and support throughout this journey. You all had to sacrifice so much of "our time" in order for this dream to become a reality.

Thank you, my sweetheart, Anthony, for coming into our lives. You stepped in and immediately started taking part in helping me reach my goal.

Thank you, my brothers, for constantly "bragging" about your "only" sister's accomplishments over the years. It meant the world to me to know that you all were proud supporters!

Thank you, my best friend, Sue, for being my "road buddy" when I started on this journey. Your encouragement, support, and listening skills meant the world to me.

Last but not least, I dedicate the completion of this journey to my 94 year-old grand ma-ma, who lived to see this monumental accomplishment.

I love you all,

Congratulations....."We" are PhD'd!

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the brightest future.

Once again, Dad and Mom, thank you for you continued love and support. I hope I have represented you well.

Terrance, Vinnecia, Tyler, and Taylor, I hope that I have inspired you to aim high and keep your eye on the prize.

Anthony, hopefully we can relax now and find time to truly enjoy "us".

Kenneth, Lehmann, Shawn, and Tony, we will have our "visit time" again!

Sue, let "our" b.f.f. hangouts begin and Grand ma-ma, I'm coming to Louisiana!

ABSTRACT

This study examined the relationships between the leadership styles of nurse managers and the leadership style and/or behaviors adopted by the Clinical Nurse Leaders (CNLs) and their staff nurses. A total of 198 nursing staff members, comprised of (18) CNLs and (180) staff nurses, who were full-time employees at clinics in Southeast Texas, participated in this study. The Multifactor *Leadership* Questionnaire Leader Form (MLQ-5X Short), the Leadership Behavior Description Questionnaire-XII (LBDQ-XII, Abridged) (Ohio State University, 1962) and a Demographic Profile were the instruments used in this study. Regression analyses, hierarchical cluster analysis, and t-tests were conducted on the data. The results indicated that the perceived full range leadership style of the NMs predicted the perceived full range leadership style of CNLs, and the perceived full range leadership style of the CNLs predicted the perceived leadership behaviors of the SNs. A discussion of the limitations and recommendations for future theoretical research are provided.

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CHAPTER 1

INTRODUCTION

In the healthcare industry, patients make up the largest part of the organization's success. Therefore, it is imperative for the clinical staff to ensure patients receive the best possible care for their ailments and are satisfied with the care they received during their visit at the clinic. Patient satisfaction can be the determining factor as to whether the patient will return to a particular facility for future medical treatments. The importance of leadership in the healthcare sector was examined to reveal how one's leadership can enhance or diminish the nurses' ability to provide the best possible care to the patients, thereby potentially affecting patient satisfaction. The relationships between the nurse managers and the clinical nurse leaders (CNLs) they lead, in conjunction with the relationship between the CNLs and the staff nurses (SNs) they lead, were observed in an effort to determine whether the behaviors of the staff nurses are affected by the leadership styles of the people who lead them. The primary focus of this study is to hopefully shed light on practices and behaviors that potentially enhance patient care and nurse effectiveness.

A patient's perception of the nurse's behaviors can be positive or negative. If the patient believes that the nurse is truly concerned about his/her well-being, he/she will more than likely be satisfied with the level of care received during the visit. In contrast, if the patient believes that the nurse is unconcerned with his/her well being, that patient's experience would more than likely be unsatisfactory. Therefore, it is crucial for nurses to understand that the dynamics of the nurse-patient relationship is a critical factor in effective nursing care. The ability to interact positively with patients is essential for

providing quality nursing care. Communication between a nurse and a patient is a shared process that creates the foundation for the professional relationship that plays a major role in enhancing patient care, thereby affecting patient outcomes.

In summary, in the healthcare arena, the behaviors of the nurses during interactions with the patients should constantly demonstrate that the providers of care are aware of the patients' needs, which would validate the positive effect their caring behaviors have on their patients.

Background

Moiden (2002) conducted research analyzing the evolution of leadership in nursing. Leadership style and theory were investigated and compared to new and current developments in the profession today. The literature currently available for review on the nursing profession is connected to the late 19th and 20th centuries. During the 19th century, the nursing profession was in its embryonic stage, whereas in the 20th century, the academic evolution of nursing began by transferring nursing education to universities. The review of the literature from the 19th century revealed specific characteristics of feminine leadership, which stressed the importance of both the sensible and domestic angles of management, religious ideas and the moral stance within the communities where it was expected that the matron (head nurse) would come from a higher social class than the sisters (regular nurses).

Modern nursing, hospital administration and formal nursing education all emerged from the power exerted by Florence Nightingale. To those she worked with, her efforts exemplified the epitome of leadership. Thus, the changes resulting from these efforts have had a positive effect on the progression and development of the nursing

profession (Moiden, 2002).

Moiden (2002) reveals that team nursing was introduced in the U.S. in the 1940's. In team nursing, small groups of patients were assigned to a particular team of nurses who were responsible for their care. The most highly qualified and skilled nurse was appointed as the head nurse of the team and his/her primary responsibility was to monitor and ensure that the best care was provided to the patients. The head nurse could also treat and give medication to the patients, if necessary.

Moiden (2002) writes that primary nursing was introduced in the U.S. as a system of managing care workload in 1966. Prior to the introduction of this system, nuns or "sisters of the church" were the primary decision-makers. They organized and planned the care for the patients, as well as, taught the nurses how to provide better care. However, once the concept of primary nursing evolved, the sisters' job duties were taken over by the primary nurses, which paved the way for the managers to incorporate structure and support for the professional nursing practice.

In conclusion, Moiden (2002) states that the nursing profession has emerged as a professional occupation that has a strong stake in the forthcoming health policy and has thus set the expectation that a more achieved style of nursing leadership will be realized in the future.

Modern health care improvement is the cornerstone to clinical leadership. Graham (2003) reports that, due to changing times and the restructuring of healthcare, health care organizations must re-examine their strategy, structure, and functional activities to ensure they are evolving as the clinical professional roles are changing. Nursing is at the forefront of moving individuals, groups, and society towards a new reality of health by

helping everyone to see things differently. The three factors required to meet this challenge are: 1) identifying various resources available in the area, 2) defining which services are available throughout the entire healthcare system, and 3) assessing how these two factors relate to each other. After integrating these factors, a new system, which allows nurses to improve life-giving care tactics, will be developed. The partnership created between the nurse and the patient also influences an effective relationship between other health care professionals involved in the care of the patient. As professional roles are developing over the next millennium, nursing leadership needs to become disciplined in caring for people and creating environments that support both personal and professional engagement and growth of the clinical staff members.

Graham (2003), an academic and clinical leader of the Nursing Development Unit (NDU), wrote a narrative exploring the characteristics of what she described as "scholarly" leadership. For the purposes of this paper, scholarly leadership is defined as the nature of leadership within the nursing development unit. The narration focuses on patient-centered care and the characteristics of practice to highlight the leadership style that is adopted by the clinical leader. Maud Alexander, which is an acute medical/admission ward within a District General Hospital in England, was chosen to receive support from the King's Fund because they were impressed with the eager and positive attitudes of the nursing staff and their leader, especially in observing the commitment they had already shown in improving their practice.

The Maud Alexander Ward had already developed: 1) a nursing model of care, 2) a computerized method of patient care planning, 3) a quality assurance program, 4) a staff appraisal and development plan, and 5) primary nursing. In doing so, the staff learned to

appreciate the high standard of individualized care, which assured that the patient was a collaborator in the planning of the care they would receive (Graham, 2003).

Graham (2003) asserts that although the nursing staff worked in an environment that was relaxed, they still worked hard and were highly motivated. An abundance of educational materials and academic support was available to them in their quest to improve and excel. Since each member of the nursing staff specialized in a specific area of patient care, the opportunity to learn, develop new thought processes and gain inspiration from others around them is widespread within their culture. The author noted that the staff always analyzed their work, shared both good and bad experiences with others, welcomed innovation and research and constantly strove to improve, while providing the best patient care possible. The crucial factor in creating a culture such as this one was that the nursing staff adopted and mimicked the clinical leadership provided to them by a strong, motivated, committed professional nurse leader.

O'Halloran, Martin, and Connolly (2005) suggest there is a great need to develop, implement, and evaluate some models of the strategic plans being used to support the nurses and midwives working in the acute sector of a hospital in the United Kingdom. The aim of this project was to improve the quality of care a patient receives while in the hospital.

The authors described a process that initially began with the moral obligations of healthcare and the values shared by the nurses and midwives; that process has been updated to include the development of a strategy and framework that would evaluate the current company-wide strategy being used. To accomplish this deed, they collected views and opinions of the participants by administering a pre-test and post-test to evaluate the

strategy used to measure the following: 1) quality of nursing care, 2) the extent to which the organization supports professional nursing care, 3) the leadership styles of the ward leaders and 4) the satisfaction of the patients with the care they received.

O'Halloran, Martin, and Connolly (2005) assert that it is imperative that healthcare organizations around the world develop and implement strategic organizational plans to ensure they overcome many of the challenges faced by healthcare organizations today. They state that a model structured to support an integrated approach to strategic change must be developed. The core values of the nurses and midwives should be blended into the development, implementation and evaluation of the organization's approach to strategic change, thereby empowering the staff members to engage the practitioners, which could make a measurable difference to the patients they treat.

According to Begun, Tornabeni and White (2006), as a result of studies by the American Association of Colleges of Nursing (AACN) beginning in 2000, the nursing profession has begun the development of a new nursing role—the Clinical Nurse Leader (CNL), because the need to act before problems occur with rendering patient service was recognized. Two AACN task forces worked together to identify ways to improve the quality of care provided to the patients and ways to best equip the nurses with the skills needed to progressively move forward in the industry of healthcare.

It is discussed in this article how the lateral integration of care creates opportunities for improving patient care. It is due to the lack of lateral integration of care that patients with complex needs sometimes received fragmented care. Consequently, the role of the CNL emerged after research and discussion with the stakeholders revealed the

need for communication with the organization's highly skilled clinicians about the outcome-based healthcare practice, as well as, the best quality and safety improvement strategies for the organization. The CNL position will be the lateral integrator for the patient care unit. The CNL will be the communicator to the stakeholders as well as the communicator to the nurses.

Once the need for the development of the CNL is brought to the attention of healthcare administrators, they need to show their support by contributing to the evolution of the idea throughout the organization. This will demonstrate to the staff and the patients that the organization has their best interest at heart. (Begun, Tornabeni, & White, 2006).

In the nursing organization the Nurse Manager (NM) leads the Clinical Nurse Leader (CNL); the CNL leads the Staff Nurses (SNs). The NM's primary function is to ensure that the nursing unit is providing excellent patient care ensuring the best possible patient outcomes. The CNLs primary function is to provide and manage care at the point of care to patients, individuals, and families and is responsible for managing and coordinating the comprehensive patient care for individuals and nursing teams. The SNs are responsible for directly treating the patients.

Rosentein and O'Daniel's (2005) assert that it is possible to conclude that the leadership role of the nurse manager is not only pivotal in the development and maintenance of the nursing unit, but it also directly impacts the environment, working conditions and the overall success of patient care outcomes, which echoes Mathena's (2002) statement.

A well-tested modern model of leadership style that could be used to address the role of nurse leaders in the overall nurse leader – staff nurse - patient dynamic is the full range model. As asserted by McGuire and Kennerly (2006), the leadership role of the nurse manager is attracting attention in relation to their contributions to the attitudes and relationships of their nursing staff. The CNLs work in close proximity to the SNs who are responsible for the care of patients. Consequently, the leadership style(s) practiced by the CNL can significantly affect the work environment and organizational commitment. The leader who exhibits a blend of transformational and transactional leadership characteristics and promotes the staff's commitment to the organization, encourages greater achievement at the nursing unit's level, thereby positively influencing the work environment while enhancing the organization's competitive advantage. Their research clarifies the link between the nurse manager's leadership style and the organizational commitment developed by the registered nursing staff.

The information contained in the full-range leadership model is based on over 100 years of research findings in the field of leadership. The nine-factor model is comprised of various behavioral components of transformational and transactional leadership styles. Inspirational motivation, individualized consideration, idealized influence and intellectual stimulation are recognized as transformational behaviors, whereas management-by-exception (active/passive), contingent reward are recognized as transactional behaviors. Finally, laissez-faire is often described as non-leadership (Northouse, 2004).

Transformational leadership style is described as having the capability to significantly change others, as in the leader/follower relationship. It is based largely on

the leader's personal qualities, which have a substantial impact on followers and can potentially renew an entire organization. This type of leader is capable of leading the changes in an organization's vision, strategy, and culture, as well as promoting innovation in products and technologies being utilized. The transformational leader's focus is on the intangible qualities such as shared values, vision, and ideas in order to build relationships and engage followers in the change process of the organization. On the other hand, transactional leadership is described as an exchange process between leaders and followers. This type of leader recognizes the needs and desires of the followers, thereby making it clear what needs to be done in order for those needs and desires to be met. The followers receive the rewards for completing the task while the leader receives the recognition and benefits for it. The transactional leader's focus is on the organization's present status and to ensure that it continues to run smoothly and efficiently (Daft, 2005).

Although transformational and transactional leaders are both effective, prior research confirms that leaders exhibiting transformational leadership qualities generate greater follower satisfaction and effectiveness than leaders exhibiting transactional leadership qualities. The full range leadership model, as measured by the MLQ, implies that all leaders demonstrate a combination of characteristics of both transformational and transactional leadership, but every leader's profile structure is made up of more of one style of leadership and less of the other. The leaders who are more satisfying to their followers and who are more effective as leaders are more transformational and less transactional (Bass, 1991). Researchers have identified transformational behaviors, consideration of staff, and an organizational culture that supports the sharing of

responsibilities with the staff nurses, as important contributors to retaining the staff (Kleinman, 2004).

Another model of leadership that is examined in the present document is measured using the Leadership Behavior Description Questionnaire (LBDQ) (Ohio State University, 1962). The original version was developed by Hemphill and Coons in 1957. They conducted what is known as the "Ohio State Studies" providing research on the behavioral approaches that reiterates consideration and structure, thereby developing the LBDQ. It included 12 leadership behavior subscales, two of which were used in this study: (a) consideration, defined as the degree to which a leader acts in a friendly, supportive manner to his/her followers, and (b) initiating structure is defined as the degree to which a leader defines and structures his/her role and the roles of the followers towards achieving the group goals.

Judge, Piccolo and Ilies (2004) conducted a meta-analysis of the relationship of the leadership behaviors, consideration, and initiating structure with leadership. There were 163 independent correlations for consideration and 159 for initiating structure analyzed in this study. The results showed that consideration (.48) and initiating structure (.29) both had moderately strong non-zero relations with leadership outcomes. Consideration was correlated with follower satisfaction, motivation and effectiveness as a leader, whereas initiating structure was more correlated with leader job performance and group performance. The LBDQ is recognized for introducing two dimensions of leadership, which are consideration and the initiation of structure. It has constantly been used to measure behaviors in leadership studies research. The researcher used the LBDQ in this study because it is a good model for the types of behaviors being measured to

reflect effective nurse-patient care.

In conclusion, the interaction between nurse managers and the nursing staff could potentially affect the nurses' behaviors, productivity and effectiveness, which could subsequently have a negative or positive effect on patient outcomes. Therefore, it is imperative that a positive relationship is fostered between the nurse manager and the staff nurses to create an environment that functions effectively while supporting and motivating the nurses to do their best. This approach may encourage the implementation of leadership behaviors that contribute to productivity, efficiency, and job satisfaction, thereby enhancing the quality of patient care.

Statement of the Problem

Although there are many references in healthcare literature on the impact of leadership on organizational performance, a definitive relationship between the nurse managers' leadership style, the CNLs leadership style, and the effects it has on the nursing staff's behaviors has not been clearly demonstrated in nursing literature. Furthermore, there is a lack of research that characterizes the nurse managers' leadership style, the CNL's leadership style and the leadership behaviors of the staff nurses in a clinical environment setting. Hopefully, understanding this relationship will provide a better perspective on how to potentially influence organizational effectiveness, particularly patient satisfaction, which is a key measure of organizational performance in clinical healthcare environments today.

The primary purpose of this study was to examine: (1) the relationship between the leadership style of nurse managers and the leadership style of their clinical nurse leaders (CNLs), (2) the relationship between the leadership style of the (CNLs) and the

leadership behaviors of the staff nurses (SNs), and (3) if differences exist in the SNs leadership behaviors as a function of the NMs levels of engagement.

Research Questions

The study examined the following research questions in three areas:

Area 1: Is there a relationship between the leadership styles of the CNLs and the leadership behaviors of the staff nurses?

1. Is there a relationship between the staff nurses' rating of their CNLs transformational and transactional style and the staff nurses' rating of their own leadership behaviors (consideration - concern for people), when controlling for gender, ethnicity, tenure, nursing years, educational level, age, marital status, parental status and primary caregiver status?
2. Is there a relationship between the staff nurses' rating of their CNLs transformational and transactional style and the staff nurses' rating of their own leadership behaviors (structure – concern for production), when controlling for gender, ethnicity, tenure, nursing years, educational level, age, marital status, parental status and primary caregiver status?

Area 2: Is there a relationship between the leadership styles of the NMs and the leadership styles of the CNLs?

3. Is there a relationship between the CNLs rating of their nurse managers' transformational and transactional style and the CNLs self-ratings of their transformational style when controlling for gender, ethnicity, tenure, nursing years, educational level, age, marital status, parental status, and primary caregiver status?
4. Is there a relationship between the CNLs rating of their nurse managers'

transformational and transactional style and the CNLs self-rating of their transactional style when controlling for gender, ethnicity, tenure, nursing years, educational level, age, marital status, parental status, and primary caregiver status?

Area 3: Is there a difference in the SNs leadership behaviors as a function of the NMs levels of engagement?

5. Is there a difference between nurse managers who are "engaged leaders" and nurse managers who are "non-engaged leaders" in terms of the leadership behaviors (consideration) of the staff nurses?
6. Is there a difference between nurse managers who are "engaged leaders" and nurse managers who are "non-engaged leaders" in terms of the leadership behaviors (structure) of the staff nurses?

The leadership style of nurse managers and their clinical nurse leaders were measured using the Multifactor Leadership Questionnaire (MLQ-5X short) (Avolio & Bass, 2004). It is a questionnaire comprised of 45 items which rates the frequency of actions and behaviors of the leader on a 5-point scale, ranging from zero (not at all) to four (frequently, if not always). The CNLs' used the MLQ-5X short form (Avolio & Bass, 2004), to rate the nurse managers' leadership style, whereas the staff nurses used it to rate the CNLs' leadership. The staff nurses also completed the LBDQ - XII (Self) to measure their own leadership behaviors (The Ohio State University, 1962).

Conceptual Definitions

1. Transformational Leadership (Northouse, 2004, p. 174-177).
    a. *Idealized Influence* (Charisma) describes leaders who act as strong role

models for their followers. Followers can relate to these leaders and want to try to be like them.

b. *Inspirational Motivation* describes leaders who communicate high expectations to their followers, which inspires them by motivating them to be committed and become a part of the organizational vision.

c. *Intellectual Stimulation* describes leaders who stimulate their followers to be creative and innovative with their ideas and not to be afraid to challenge their own beliefs and values.

d. *Individualized Consideration* describes leaders who support their followers and understand that they are individuals whose needs may vary from each other. This type of leader listens and acts accordingly to support the follower's needs.

2. Transactional Leadership (Northouse, 2004, p. 178-179).

   a. *Contingent Reward* (Constructive Transactions) describes leaders who provide a specified reward to a follower in exchange for the follower's efforts. *Management-by-Exception* (Corrective Transactions) (Northouse, 2004)

      i. Active – a leader watches followers closely and immediately takes corrective actions for their mistakes or rule violations

      ii. Passive – a leader only gets involved after a problem has surfaced.

3. Laissez-faire (Non-transactional) describes leaders who represent the absence of any type of leadership. They tend to take the "hands off—let things ride" approach (Northouse, 2004, p. 179).

4. Age refers to the age the participant entered on the demographic profile.
5. Ethnicity refers to a group of people related by common descent or heredity. The ethnicity selected on the demographic survey (Caucasian, African American, Hispanic/Latina, American Indian or Other) will be used.
6. Tenure is defined as total years working for the company used in this study.
7. Educational level refers to amount of education completed.
8. Gender is the sex of the participant as marked on the demographic profile.

CHAPTER 2

REVIEW OF LITERATURE

This chapter provides research literature that supports the purpose of this study followed by a description of the theoretical framework used. The literature pertaining to the independent variable of leadership style (transformational vs. transactional) and the dependent variables of leadership behaviors (consideration versus structure), as well as the control variables of gender, ethnicity, tenure, nursing years, educational level, age, marital status, parental status, and primary caregiver status, are examined and summarized. The relationship between the leadership style of nurse managers (NMs) and clinical nurse leaders (CNLs), and the leadership behaviors adopted by their staff nurses (SNs) were examined.

Leadership and Healthcare/Nursing

Few studies are available in the literature concerning the relationship between the leadership styles of NMs and CNLs and the leadership behaviors of the SNs. However, there are many studies concerning the relationship between leadership styles of nurse leaders and related behavior indicators among the staff nurses. These studies are summarized in this section.

Sheridan, Vredenburgh and Abelson's (1984) two-fold purpose for conducting their study was to develop an integrative model of leadership that explains why leadership effects are dependent on various situational variables and to show how different contextual variables can replace or counteract the leader's influence on the followers' job performance. Questionnaires constructed to examine the predictive validity of the contextual model used in this study were administered to 701 nursing employees

from four different hospitals. However, only 670 of the employees (16 nursing supervisors, 91 head nurses, 389 staff RNs, 174 staff LPNs) completed and returned it. The instrument measured the percentage of time that a nurse observed certain behaviors of their leader or had specific feelings about their work assignments.

The moderated regression analysis used in this study explained a significant portion of variance in the performance measures ($R^2 = .133$, $p \leq .01$), which revealed that the hospital's performance-reward climate (PRC) was a significant predictor of the nurses' job performance. It was also shown that the PRC variable used in this study had a significant interaction effect with leadership behavior ($R^2 = .026$, $p \leq .01$). The interaction terms between PRC and leadership assertiveness ($p \leq .01$) and sensitivity ($p \leq .07$) had the highest significance, which indicated that assertive behavior had different effects on job performance between the strong and the weak PRC hospitals (Sheridan, Vredenburgh & Abelson, 1984).

Boumans and Landeweerd (1993) examined the relationship between the leadership style (social leadership vs. instrumental leadership) of the head nurse and the nurses' reaction to the head nurses' work. The reaction variables studied included job satisfaction, health complaints, experienced meaningfulness, and frequency of absence. The sample of participants consisted of 561 nurses (426 women, 134 men, 1 missing value) from 36 different nursing departments of 16 general hospitals in the Netherlands. The average age of the participants was 28.8 years old and they worked in the nursing profession an average of 9.5 years. The 20-item questionnaire used to measure the leadership style was a modified version of Stodgill's (1963) Leadership Behavior Questionnaire (11 items measuring social leadership, nine items measuring instrumental

leadership). The results showed correlations between the two leadership styles and some of the reaction variables. The sample size of participants used for rating leadership styles was N = 561 and for the recording of absences, N = 427. Results revealed that the more a leader exhibited social leadership, the more the employees experienced job satisfaction ($r = .57, p \leq .001$) and meaningfulness of their jobs ($r = .21, p \leq .001$), and the less they made health complaints ($r = -.34, p \leq .001$). There was no correlation between leadership styles and the frequency of absences. Consequently, the extent of social leadership practiced by the head nurse was related to the reaction variables.

As reported by McNeese-Smith (1995), studies surrounding leadership behaviors of nurse executives, chief nursing officers and nurse managers are numerous. In much of the nursing literature reviewed, the nurses' leadership behavior is frequently reported as a significant variable that influences organizational outcomes. From a research methodology perspective, a review of the literature shows that the use of a survey instrument is a common approach to measuring nurses' leadership behaviors and leadership styles. Among the instruments available, the MLQ (Avolio & Bass, 2004) is one of the most popular ones in nursing because of its psychometric properties and ease of use. The MLQ (Avolio & Bass, 2004) is the only instrument that covers the three broad categories of leadership styles in the Full Range Leadership Theory (FRLT), which include transformational, transactional, and laissez-faire leadership. For the past two decades, it has provided guidance to investigators in the examination of nurse managers' leadership behaviors and the impact these behaviors could have on an organization.

Medley and Larochelle (1995) investigated the part transformational leadership plays in the nurses' level of job satisfaction, while working in the acute care community

hospitals in Florida. Their aim was twofold: 1) to determine the degree to which nurses were able to distinguish between transformational and transactional leadership behaviors of CNL's and, 2) to determine if there was a relationship between the leadership styles of the CNL's and the job satisfaction of the nurses on their staff. The MLQ (Bass, 1985b) was administered to 122 nurses to rate their leaders. The *Index of Work Satisfaction* (Slavitt, Stamps, Piedmont & Hasse, 1986) was used to measure job satisfaction of the nursing staff. The job satisfaction scores for the staff nurses were compared with transformational and transactional factor scores of the CNLs to determine if a relationship existed. The results revealed a significant, positive correlation between the job satisfaction of the staff nurses and the transformational leadership style of the CNLs (r = .40, $p < .001$). Moreover, a weak but significant negative correlation was found between the staff nurses' job satisfaction and the transactional leadership style of the CNLs (r =.05, $p < .001$).

Vecchio and Norris (1996) conducted a three-fold study to examine 1) whether employee turnover is a joint function of satisfaction with supervision and performance, 2) whether or not employee turnover is related to performance, whereas superior and poorer performers will have higher levels of turnover relative to middle-range performers, and 3) whether or not deviation scores on leader-member exchange provide a more superior predictor of employee turnover than an average leadership approach.

A questionnaire, which contained the *Job Descriptive Index— Satisfaction with Supervision Scale* (Smith, Kendall, & Hulin, 1969) and the *Leader-Member Exchange* (Liden, Maslyn, 1998), was administered to 105 full-time nursing staff members, but only 86 of the questionnaires were usable in the study. Ninety-eight percent of the respondents

were female and had an average of 9.6 years of nursing experience. A hierarchical regression analysis revealed that poor performers were more likely to stay if they were satisfied (r = -.29, p < .10), whereas superior performers were not influenced by satisfaction, (r = .10, n.s.); neither correlation was significant. There was also no correlation found between leader-member exchange and the prediction of employee turnover (Vecchio & Norris, 1996).

Fuller, Morrison, Jones, Bridger and Brown (1999) conducted a study to investigate if the degree to which transformational leadership affects job satisfaction depends on the level of the employees' psychological empowerment. In this study, psychological empowerment is defined as the increased intrinsic task motivation exhibited in the employees' adaptation to their work environment, as they perceive it, which reflects their active orientation to his or her work role.

In their study (Fuller et. al, 1999), Bass's (1995) *MLQ-5X* was used to measure leadership and Spreitzer's (1995) four-item version of a questionnaire, which consisted of items from Quinn's (1988) competing values model, was used to measure empowerment. These instruments were administered to a sample of 230 participants, consisting of nursing assistants, licensed practical nurses and registered nurses, who worked at a regional medical facility in the Southeastern United States.

The interaction between four dimensions of transformational leadership (idealized influence, inspirational motivation, intellectual stimulation and individualized consideration) and empowerment in predicting job satisfaction was measured using Cohen and Cohen's (1983) moderated multiple regression analysis. For the participants of this study, the results revealed that empowerment interaction contributed significantly,

$F(1, 225) = 3.95, p < .05$, to the variance in job satisfaction for idealized influence (R^2 increased from .52 to .53), inspiration $F(1, 225) = 5.60$ (R^2 increased from .48 to .49) and individualized consideration $F(1, 225) = 8.16$ (R^2 increased from .41 to .43). On the contrary, the increase in explained variance in job satisfaction was not significant when intellectual stimulation was entered into the equation, $F(1,225) = 3.45, p = .06$. The results of the study suggest that, for the employees of this sample, psychological empowerment regulated the relationship between three of the four dimensions of transformational leadership and job satisfaction (Fuller et al., 1999).

Gellis (2001) examined the leader-follower interactions based on social workers' views of their leader. The purpose of the study was to determine the degree to which social work managers were observed exhibiting transformational and transactional leadership styles and to identify the leadership styles that: 1) enable a leader to be perceived as more effective, 2) promote employee satisfaction with their leader, and 3) motivate social workers to put forth extra effort. *The Multifactor Leadership Questionnaire (MLQ Form 5X)* and a demographic form was completed by 187 clinical social workers from 26 hospitals located in a large urban setting.

The clinical social workers, who were divided up into two groups (MSW, BSW) according to their educational training levels, rated the leadership style of their managers. Most of the participants were female with an average age of 43. The MSW group was older and had slightly more years of work experience and tenure than the BSW group. Pearson correlations revealed that the transformational factors, idealized attributes ($r = .73, p < .01$) and idealized behaviors ($r = .69, p < .01$), individual consideration ($r = .80, p < .01$), intellectual stimulation ($r = .70, p < .01$), inspirational motivation ($r = .64, p <$

.01), as well as the transactional factor, contingent reward ($r = .66$, $p < .01$), were all significantly related to perceived leader effectiveness, employees' satisfaction with their leader and extra effort contributed by the social workers. Moreover, the more the leader exhibited transformational behaviors, the more effective he was perceived to be, the more satisfied the employees were with the leader, and consequently, the employees put forth extra effort in their work responsibilities. There was no correlation found in the management-by-exception and laissez-faire transactional factors (Gellis, 2001).

Vandenberghe, Stordeur and D'hoore (2002) conducted a study to investigate the links between leadership behaviors and the leader's level of compassion for others. They administered the *MLQ-5X* survey questionnaires to 2,617 nurses from 17 Belgium hospitals, of which 1,059 were deemed usable in the study. Three areas of compassion were examined: work-related, non-work related and patient-related. For 824 of the participants, their leader was identifiable, for a total of 131 leaders who each had an average ratio of 6.29 followers. In regards to the data for the dependent variables, the number of participants fluctuated because some of the nursing directors at the various hospital locations limited the amount of time nurses were allowed to complete the MLQ surveys and some required certain dependent variables be used for selected outcomes. Therefore, the sample size varied from 689 to 1059 for the correlation data. Of the participants, 16% were head nurses, 84% were staff nurses, 88% were females and 64% were full-time nurses. The average age of the participants was 34.15 years (SD = 7.65) and the average tenure at the hospital was 9.48 years (SD = 7.30).

The compassion-related items split into three factors: work-related compassion (four items; $\alpha = .79$), ($M = 4.38$, sd .55); non-work-related compassion (four items; $\alpha = .83$, ($M = 3.92$, sd .75) and patient-related compassion (four items; $\alpha = .76$), ($M = 4.25$, sd .54). The results revealed that transformational leadership added to the transactional scales only when looking at work-related compassion. However, when contingent reward and transformational scales were used to define active leadership, an enhancement effect was observed for work-related and non-work-related compassion. However, when only looking at the transformational aspect of leadership, it added significantly to transactional scales in predicting work-related compassion, but had no enhancing effect in the equations for the other forms of compassion.

Kleinman (2004) conducted a study for the purpose of describing nurses' perceptions of managerial leadership styles associated with staff turnover and to compare the nurse manager's leadership styles as perceived by themselves and their staff nurses. A nurse manager who projects an effective leadership style (transformational/transactional) has been associated with staff retention and job satisfaction among nurses in healthcare environments.

The author (2004) distributed the *MLQ* survey to 331 participants comprised of 315 staff nurses and 16 nurse managers. The managers indicated they personally interacted more with their staff who worked the day shifts as opposed to the staff working the night shifts. When examining the relationship among staff nurse characteristics and their perceptions of leadership, it was demonstrated that the more time the staff nurses

were able to see their nurse manager during their shift at work, the less they perceived their nurse manager to display laissez-faire leadership characteristics ($r = -.4, p \leq .01$).

According to Kleinman (2004) the nurse managers who participated in her study had an average of 10 years of management experience and an average of 25 staff nurses reporting to them. Staff nurse turnover per unit for the hospital ranged from 0-11%, with an overall rate of 4% during the designated six-month period. The results showed active management-by-exception was the only leadership behavior that was significantly correlated with staff nurse turnover ($r = .26, p = .03$). No other leadership behaviors were significantly correlated with the turnover of the nursing staff.

When group comparisons were made based on gender, subspecialty certification, non-nursing bachelor degree recipients and whether or not the staff nurses had thought about leaving their jobs, an evaluation using all leadership subscales across the MLQ was performed by Kleinman (2004). In comparing the staff nurses who had thought about leaving to those who had not thought about leaving the organization, it was revealed those who had not given it any thought reported significantly higher frequencies of the following leadership behaviors: (1) idealized influence (attributed and behavior) (M = 2.8, SD = .09; $t = 1.9, p = .05$), (M = 2.7, SD = .8; $t = 2.2, p = .03$), respectively; (2) inspirational motivation (M = 3, SD = .7; $t = 3.1, p < .01$), (3) intellectual stimulation (M = 2.6, SD = .9; $t = 2.2, p = .03$), (4) extra effort (M = 2.8, SD = .1; $t = 2.1, p = .04$), (5) effectiveness (M = 3.0, SD = .9; $t = 2.8, p < .01$) and (6) satisfaction (M = 3.0, SD = .9; $t = 2.7, p < .01$).

Kleinman (2004) noted that the MLQ conceptualization of intellectual stimulation implies that managers must encourage and support their staff members to participate in

solving work-related problems. The results of this study suggest that if managerial behaviors that contribute to intellectual stimulation behaviors among the staff are enhanced, employee retention will improve, meaning that putting an emphasis on problem solving and involving the staff in the problem resolution responsibilities, may be the leadership behavior that will eliminate staff members' thoughts of leaving the organization.

In summarizing the comparisons of the leadership perceptions of staff nurses and nurse managers, group differences were discussed. The nurse managers felt that they demonstrated a higher frequency of idealized influence, intellectual stimulation, individual consideration, contingency reward, and extra effort, when compared to the staff nurses' perception of the manager's leadership behaviors. There were no significant differences found for inspirational motivation, active and passive management by exception and laissez-faire leadership behaviors.

Chen, Beck and Amos (2005) examined the extent to which the leadership style of the nursing deans and directors contribute to nursing faculty job satisfaction. They used the self-administered Chinese version of the *MLQ-5X* to measure faculty perceptions of leadership styles of deans and directors of nursing. The Chinese version of the *Minnesota Satisfaction Questionnaire (MSQ),* which was developed by Weiss, Dawis, England and Lofquist (1967), the MSQ short form, was used to measure job satisfaction. Questionnaire packets were mailed out to 400 faculty members to obtain the sample size of 169 participants.

While controlling the demographic and organizational characteristics, a hierarchical multiple regression was conducted and revealed that contingent reward ($\beta =$

.23, $p < .05$) and individualized consideration ($\beta = .19, p < .05$) significantly and positively contributed to the job satisfaction of the nursing faculty. The passive management-by-exception leadership style was significant, but negatively contributed to nursing faculty job satisfaction ($\beta = -.14, p < .05$) (Chen, Beck & Amos, 2005).

Ginsburg, Norton, Casebeer and Lewis (2005) examined the relationship between the nurse leaders' perception of patient safety culture and occurrence of an adverse event. The purpose of the study was to design a training intervention and test its effects on nurse leaders' perceptions of patient safety culture. Patient safety and medical error have emerged as important quality and public policy issues in healthcare, due in part to the incidence of adverse events. In lieu of an ailment that caused a person to be admitted to the hospital, an adverse event is defined as unintended injury or complication caused by health care management, which results in disability, death or an extended stay in the hospital. Studies of the incidence of adverse events in acute hospitals indicate that between 5 and 20% of patients who are admitted to the hospital experience an adverse event.

Ginsburg, Norton, Casebeer and Lewis (2005) evaluated patient safety training intervention using a quasi-experimental untreated control group design with a pretest and a posttest. There were 243 nurses who were in clinical leadership roles that completed usable pretest and posttest data for this study (93 from the control group, 150 from the study organization). They participated in two patient safety workshops over a 6-month time period. Individuals from both the study and control groups completed surveys, which measured patient safety culture and leadership for improvement. They completed a survey prior to training and then again four months following the second workshop.

A repeated-measures ANOVA and paired t-tests were used to evaluate the effect of the training intervention on the perceived safety culture. The three factors of safety culture that were analyzed were: 1) valuing safety, 2) fear of negative repercussions and 3) the perceived state of safety. The results of the repeated measures revealed that the interaction between group and time was significant for valuing safety ($F(1, 241) = 11.9, p < .001$) and perceived state of safety ($F(1,241) = 4.8, p < .05$) but not significant for fear of negative repercussions ($F(1,241) = 0.6$, n.s.). The hierarchical regression analysis revealed that leadership for improvement explained a significant amount of variance in valuing safety ($\Delta R^2 = .02, p = .001$), perceived state of safety ($\Delta R^2 = .055, p < .001$), and fear of repercussions ($\Delta R^2 = .03, p = .01$), thereby suggesting that leadership for improvement and the training workshops are important in explaining the variation in certain perspectives of perceived safety culture. Although conveying training initiatives with care and concern to nurse leaders and gaining support from upper leadership helps promote a safety culture within the organization, it is the training interventions coupled with leadership support that will have the most significant impact on patient safety culture (Ginsburg, Norton, Casebeer & Lewis, 2005).

Kanste, Kyngas and Nikkila (2007) conducted a study to investigate the relationship between multidimensional leadership and burnout among nursing staff, from the nursing staff's viewpoint. The authors point out that the nursing profession is at high risk for burnout because nursing is typically stressful and demanding work. In this study, burnout is defined as a syndrome of emotional exhaustion. The researchers mailed packets containing the *MLQ-5X* rater form and the *Maslach Burnout Inventory-Human Services Survey (MBI-HSS)* to 601 nurses and nurse managers working in different

organizations of health care. The sample was collected through stratified random sampling and divided into four types of health care organizational subgroups: (1) university, central and district hospitals, (2) health centers, (3) psychiatric hospitals, and (4) private hospitals. In addition to these subgroups, a separate group was created for head nurses regardless of the healthcare organization they work for. Their aim in doing so was to capture a greater degree of sample representation and to be able to include respondents from various types of healthcare organizations. More than half (59%) of the participants were nurses and 94% were women, and were either permanent or temporary staff members. The mean age was 43.5 years and the mean work experience in health care was 17.3 years.

The results revealed that rewarding transformational leadership correlated negatively with emotional exhaustion ($r = -0.15, p < 0.001$) and depersonalization ($r = -0.13, p < 0.01$), which supports the theory that rewarding transformational leadership functions as a protecting factor by protecting the staff from emotional exhaustion and depersonalization. Active management-by-exception correlated positively with personal accomplishment ($r = .13, p < 0.01$), which supports the theory that this type of leadership assists in increasing one's accomplishments. It was concluded that nurses of various ages who were at different stages of their careers and who held different positions required different kinds of leadership to be successful (Kanste, Kyngas & Nikkila, 2007).

Cummings, Olson, Hayduk, Bakker, Fitch, Green, Butler and Conlon (2008) examined the relationship between nursing leadership and the nurses' job satisfaction when considering factors that influence their work environments. The authors reported that statistics support the fact the work environments in the Canadian oncology setting

have faced the challenge that the nursing workforce has missed worked weekly due to illness resulting from being overworked and stressed out.

Cummings et al. (2008) used a prospective descriptive research design. Surveys inquiring about their perceptions of different aspects of their work were mailed to 2,002 registered nurses in Canada; of the 615 valid responses received, only 515 were chosen for use in this study. The surveys were administered to each participant twice, two years apart in 2004 and 2006.

Cummings et al. (2008) research revealed that the nurses' relational leadership behavior, which is behavior that influences outcomes for providers and patients by way of building and maintaining relationships in the workplace, is associated with *less* clinical nurse fatigue and emotional exhaustion **and** *better* job satisfaction, emotional well-being, relationships with other medical staff and the ability to take better care of the patients. Research revealed that many of the issues could be corrected by improving leadership behaviors of the people in leadership positions and by providing additional training/learning resources to further develop the staff members.

The theoretical model was tested using LISREL 8.54. The results of the final model ($x^2 = 58.0$, df = 44, $p = .08$), indicated that relational leadership and relationships between the nurses and their leaders significantly influenced opportunities for the development of the staff and increased the nurses' job satisfaction. This study suggested that relational leadership and positive relationships play an important role in the oncology nursing environments and the job satisfaction of the nurses (Cummings et al., 2008).

In Boerner, Dutschke, and Wied's (2008) study analyzing the impact of the followers' work-stress on the relationship between charismatic leadership and

organizational citizenship behavior (OCB), a questionnaire which included five items from Waldman , Ramirez, House and Puranam (2001) to measure charismatic leadership and three items from Behling and Law (2000) to measure the strain of the followers, was administered to 142 nurses from 18 different workgroups at three different hospitals in Germany.

Boerner, Dutschke and Wied (2008) obtained the mean scores, standard deviations and zero-order inter-correlations of the variables used in this study. The relationship between stressors and strain showed a moderate correlation, with the two variables sharing only 17% of the variance ($r = .42, p < .001$), which supports the premise that the followers' strain does not fully result from the intensity of the stressors, but is also influenced when supplementary variables are factored in. Therefore, in this study, the effects of stressors and strains on the relationship between charismatic leadership and OCB were analyzed separately.

Multiple regression analysis of moderation was performed with OCB as the dependent variable and charismatic leadership and stressors as the independent variables. Results indicated that charismatic leadership was a significant predictor of OCB ($\beta = .26$, $p < .01$). However, the relationship between charismatic leadership and stressors was not significant (Boerner, Dutschke & Wied, 2008).

A multiple regression was also performed to test the mediating effect of the followers' strain on the relationship between charismatic leadership and OCB. A significant relationship exists between charismatic leadership and the followers' strain ($\beta = -.36, p < .001$), as well as between charismatic leadership and OCB ($\beta = .24, p < .001$).

The relationship between charismatic leadership and the mediator strain was also significant (r = -.36, p < .001) (Boerner, Dutschke & Wied, 2008).

Boerner, Dutschke and Wied's (2008) study concluded that stressors moderate the relationship between charismatic leadership and organizational citizenship behavior. However, if charismatic leaders assist followers in perceiving "stressors" as challenges instead of threats, the strain on the followers will be reduced, thereby increasing the OCB of the followers.

Sankelo and Akerblad (2008) conducted a study, which included investigating the nurse entrepreneurs' adoption of their managers' role. Survey questionnaires were mailed to 335 entrepreneurs who had a registered nurse's degree. The questionnaire was developed using information attained from interviews with 16 owner-managers of social care companies and earlier research on management and private care services.

The authors' report that based on the nurse entrepreneurs' responses to 16 statements used to measure the adoption of the managers' role, it appeared that the adoption of this role was complex. The majority of the participants in this study (70%) considered themselves to be health care professionals instead of managers. A little less than half of them (48%) did not believe they fit in with many of the images evoked by the term 'manager'. Less than a quarter of them (23%) admitted that they adopted the managerial role with hesitation and were bothered by being referred to as a manager. The mean of the sum variable measuring the adoption of the manager's role was (M = 2.52, sd = .71), which indicates that the adoption and internalization of the manager's role is weak. However, statistically significant correlations between 1) the adoption of the manager's role and the management training (M= 2.47, p <.002), leadership experience

before starting a business (M = 2.43, $p<.021$), and 2) the adoption of the manager's role and the number of staff in the company (M= 2.51, $p<.043$) existed (Sankelo & Akerblad, 2008).

Sellgren, Ekvall and Tomson (2008) conducted a study using: 1) the *'change, production, employee' model (CPE) questionnaire*, 2) the *Job Satisfaction Questionnaire*, and 3) the *Creative Climate Questionnaire (CCQ)*. The questionnaires were administered in an effort to examine how nurse managers' leadership behavior relates to job satisfaction and an innovative work environment. Three validated questionnaires were used to evaluate job satisfaction, leadership behavior and the work climate. Of the initial 770 participants recruited to participate in the study, only a sample of 426 completed and returned the questionnaires.

The results of the study showed that the relationship between leadership behavior and job satisfaction was significantly correlated. The strongest correlation was between the job satisfaction variable—feeling and the leadership dimension—employee orientation ($r = .51, p < .0001$). The weakest correlation was between the job satisfaction variable—autonomy and the leadership dimension—change orientation ($r = .22, p < .001$). The results of the study also showed that the relationship between leadership behavior and work climate was significantly correlated. There correlations showed a variance between 0.28 and 0.58, $p \leq .001$ (Sellgren, Ekvall & Tomson, 2008).

In a McGuire and Kennerly (2006) study, the findings validate and support other literature, which states that transformational nurse leaders establish and promote a higher sense of commitment in their nursing staff. To foster a nursing staff that is committed to

the organization and the patients, nursing executives should hire and promote leaders who exhibit a balance of both transformational and transactional leadership qualities.

In summary, many authors conducted studies primarily using the MLQ survey to detect relationships between leadership styles of leaders and the behaviors of the followers and the impact these elements have on the job performance of the participants surveyed. A majority of the findings suggests that a significant relationship exists between the leadership style of the leader and the follower's job performance and job satisfaction. There were significant, positive correlations between the job satisfaction of the followers and the transformational leadership style of the leaders. Much of the research revealed that many issues that an organization may face could be minimized or corrected by improving the leadership behaviors of the people in leadership positions and by providing training and learning resources to further develop the staff members.

Gender and Leadership

There have been a vast number of assertions that declare that men and women behave differently in leadership roles, thereby falling into different leadership styles. It has been stated that men are more transactional and women are more transformational. It is generally assumed that women are more transformational because they are the bearers of children, which gives them the nurturing characteristic, whereas men, who cannot bear children, are assumed not to possess this trait. It has also been assumed that due to the "caring" nature associated with healthcare and the less strenuous path to earn a nursing degree as opposed to a medical degree, that more nurses are female.

While assumptions are vast, there has been relatively limited research conducted

on gender differences, although the number of women in leadership and management positions has increased dramatically over the years. A number of factors have contributed to this lack of research. One of the most prominent factors is that the upper management domain has been mostly male-dominated. Another factor is that information on leadership has not always been readily available due to confidentiality concerns (Klein, Astrachan, & Kossek, 1996).

Moore and Rickel (1980) conducted a study to investigate characteristics that differentiate women who choose traditional versus non-traditional careers and who function at different occupational levels. Their sample consisted of 245 nurses who represented the traditional career group and 272 people from the business and industrial positions, in which 20% or fewer were female, represented the non-traditional career group. The women were matched across three occupational levels (second supervisory, first supervisory, non-supervisory) according to their age and education. They delivered an 11-page questionnaire, comprised of three scales (structure, production emphasis, and consideration), with each scale containing 10 questions, to a contact person of each group. The questionnaire was administered to 517 participants. The return rate for the traditional group was 99%, but only 63% were usable, whereas the return rate for the non-traditional group was 83%, but only 54% were usable. There were 53 triads (three-person groups) formed for the traditional group and 49 triads formed for the non-traditional group, for a total of 306 actual participants.

A 2x3 factorial design was utilized with both career categories and the three occupational levels. A multivariate analysis of variance with organizational

setting and occupational level as independent variables was used to analyze eight major dependent variables. The results revealed that there was no difference between the two groups in their attitude towards the importance of their careers or the educational level of their spouse or parent. However, the findings for organizational setting within the first supervisory level, the second supervisory level and the non-supervisory level ($F = 6.708, 4.917, 3.425$ respectively, $p < .001$), concluded that leadership attributes and behavior of women varied between organizational settings and across the occupational levels in predictable ways.

Van Velsor, Taylor and Leslie (1993) assert that there may be gender differences in the probability of one overrating or underrating his/her leadership abilities. They found that women consistently under-rated themselves by under-estimating their abilities on masculine, gender-typed tasks. They stated that women also recalled more task failures than what had actually occurred.

Van Velsor, et al. (1993) used the Benchmarks (Center for Creative Leadership, 1990), a multi-rater assessment instrument that contain twenty-two scales, but only sixteen of the scales were used in this study. The instrument was administered to a sample of managers (451 females, 170 males). In examining whether there was a gender difference in others' ratings of self-awareness, it was revealed that direct reports rated women significantly higher on self-awareness than they rated men ($M = 3.63$ and 3.56 respectively, $p < .02$). Although women do not perceive themselves as having more self-awareness than men have, they are perceived as being more self-aware than men are by their staff (Van Velsor, Taylor & Leslie, 1993).

With respect to decision-making and the quality of those decisions, Johnson and Powell (1994) noted that women are assuming more important roles in business management and are being tested and evaluated in terms of their ability to make decisions. They suggest that research using participants from the general population has shown that: 1) adult females appear to take fewer risks than males, 2) females are less confident in their decision making abilities than their male counterparts are, and 3) males are more unlikely to be influenced under certain conditions than females. Consequently, any difference in the character and quality of the decisions made by male and female managers will have important consequences for organizations.

For use in this study, the quality of a decision was defined as "the demonstrated ability to use available information to make the most appropriate choices given the objectives or rules of the exercise". Decision-making is associated with taking risks, which in turn, could potentially help or hinder an organization's success. Managers must make decisions whether or not to take a particular course of action for any given situation to ensure that potential rewards are balanced against possible negative consequences. Managers' who have a tendency to either look for or shy away from high-risk options can have serious repercussions for an organization. Therefore, in decision-making, it is imperative that the decision-makers realize and understand that high potential rewards are often associated with large potential losses. Effective decision-makers are considered assets within an organization, whereas ineffective decision-makers become liabilities (Johnson & Powell, 1994).

Johnson and Powell (1994) examined the degree to which gender differences in risk propensity and decision quality exists in a group of men and women who were

destined to become managers and have had at least three years of formal management education. The belief was that since the participants in this study initially chose to become decision makers, that they already possess certain personality and behavior characteristics

The authors presented a case study to 130 under-graduate commerce students (84 males and 46 females) who were in their final year of college. The participants were tasked with financially evaluating the project, testing the sensitivity of their evaluations to various identified risk sources and deciding whether or not to make a recommendation to the senior management staff of the organization to take on the project. The objective of this exercise was to explore the effects that formal management education, personality/behavior characteristics and gender have on risk attitudes and decision quality of the participants (Johnson & Powell, 1994).

The results indicated that the score received on decision quality of the males was not significantly greater than the females' score (M = 7.44 and F = 6.03), ($p > .10$). There was also no significant difference between the scores of the students who rejected or accepted the project (M = 7.35, F = 6.65), ($p > .40$). There was also no significant difference between the gender of the students (M = .158, F = .192, $p > .30$, two-tail) and their decision to recommended that the project be accepted or rejected (M = .155, F = .184, $p > .03$). There were no significant differences found in males and females in relation to their tendency to take risks, their perceived control of his/her behaviors or in their level of self-determination (Johnson & Powell, 1994).

The gender differences that exist in management and leadership positions are still very prominent, despite political efforts to have an effect on the process of promoting

women into leadership positions. Two theories that attempt to explain this "glass-ceiling" effect are the stereotype and personality theories (Kaufman, Isaksen, & Lauer, 1996).

Looking at the stereotype theory, research shows that male-trait stereotypes greatly overlap with the traits of a successful manager. Female-trait stereotypes show a significant difference from the overlapping zones of the male-and-manager-trait stereotypes. The personality theory suggests that even if the experience and qualifications are equal between male and females, a significant difference in personal qualities and the ability to relate to management and leadership effectively may exist (Kaufman, Isaksen, & Lauer, 1996).

Kaufman, Isaksen and Lauer (1996) administered *the Kirton's Adaptor-Innovator Questionnaire (KAI)* to 553 (405 males and 148 females) participants from upper, middle and lower levels of management to determine if individuals possess stable preferences for either adaptive or innovative problem-solving strategies. All participants completed the test before attending the training session so as not to bias the results. The regression analysis revealed that the interaction between managerial level and gender on the KAI scores was significant ($F = 4.30$, $p < .014$) which meant that more females interacted more with people on the managerial level than males.

In examining the differences in the developmental job experience of males and females at the managerial level, some studies have shown that men are less likely to assign challenging, developmental tasks to female subordinates, when a male subordinate is available to take on the task. It has been suggested that fewer women are in upper management positions because they have not been given the developmental opportunities that men have been given during their careers.

Several studies suggest that managers are less willing to take the risk of putting a woman in a highly visible position, thereby prohibiting women from gaining access to developmental opportunities (Ohlott, Ruderman, & McCauley, 1994).

Ohlott, Ruderman and McCauley (1994) administered the *Developmental Challenge Profile (DCP)* to 507 participants (281 males, 226 females). Chi-square tests and t-tests were conducted on key demographic and descriptive variables to compare the male and female respondents. A regression analysis was used to determine if there was a difference in developmental components based on gender. Significant differences between males and females were found. Women were better at handling job overload ($F = 2.50$, $M = 2.39$, $p < .01$), whereas men were better at handling external pressure ($F = .67$, $M = .79$, $p < .01$). One of the main differences concerning male and female managers was that there were more men than women managers. Although female participation has increased over the past 10 years, a comparative growth in the number of women managers has not occurred.

Studies comparing the responsiveness of male and female salespersons revealed differences in the way satisfaction with supervision and performance effectiveness more closely relate to the female leadership styles. In order to keep the votes of their subordinates, female leaders must overcome the cultural preference of male supervision. There is evidence that male subordinates sometimes have unprovoked hostility towards a female superior simply because she is a woman. When females try to use a leadership style, which is inconsistent with the stereotypical style already in place, they encounter many difficult situations with their male counterparts (Comer, Jolson, Dubinsky & Yammarino, 1995).

Comer, Jolson, Dubinsky and Yammarino (1995) administered the *MLQ* to 15 male and 15 female managers. Zero-order correlations for each dependent variable were used to show the overall relationships between the variables of interest. Components of transformational and transactional leadership styles were measured by the salesperson's perceptions on multiple items.

For men, all zero-order correlations between each of the four transformational components and satisfaction with supervision were significantly and positively correlated: (charisma: $r = .91, p < .001$), (inspiration: $r = .80, p < .001$), (intellectual stimulation: $r = .84, p < .001$), (consideration: $r = .93$, ($p < .001$). For women, only three of the four correlations were significant: (charisma: $r = .82$, $p < .001$), (intellectual stimulation: $r = .46, p < .04$), (consideration: $r = .68, p < .003$). For the transactional components, correlations between contingent rewards and satisfaction with supervision were statistically significant for both males and females (males: $r = .83, p < .001$), (females: $r = .48, p < .03$). The males and females preferred different types of supervision. Men appreciated considerate sales leaders, whereas women valued the charismatic leaders. The results suggest that men prefer being supervised by women whose style aligns with the typical female stereotype (Comer, Jolson, Dubinsky & Yammarino, 1995).

Studies have also been conducted to determine if gender differences regarding managerial strategies exist in the retail field. The number of female business owners is rapidly increasing in almost every business sector. A prediction has been made that over 50% of all companies will be woman-owned by 2010. However, despite the growth of female-owned businesses, most of the previous research has been done on male-owned

businesses (Gaskill, Jasper, Bastow-Shoop, 1996).

Klein, Astrachan and Kossek (1996) administered the *Chi-Square* test to 319 male and 40 female professionals three months after they attended 14 one-week training seminars. The results obtained, when looking at job levels and gender for significant interaction effects, showed that female executives scored higher on learning about managing anxiety and organizations than male executives ($x^2 = 10.80, p < .01$).

A study was conducted to investigate whether there was a gender difference among nurse executives. It would determine if the males took on a more feminine role of leadership in a female dominated profession. Although nursing is a female-dominated profession, it was revealed that females tend to emulate the masculine characteristics that are valued in the male executives. However, the male nurse administrators are emulating the female nurse executive's leadership style. Thereby, the research on the aspects of management or leadership contradicts whether gender differences exist in management (Rozier, 1996).

Rozier (1996) administered questionnaires modified from the Leadership Study: International Women's Forum (Rosener, McAllister & Stephens, 1990) to a sample of 378 participants (329 females, 49 males) to investigate gender differences in management attributes. In examining the masculine characteristics, it was found that females exhibited more masculine characteristics ($M = 57, p < .001$) than their male counterparts ($M = 57.96, p < .001$). In examining the feminine characteristics, it was found that females exhibited fewer feminine characteristics ($M = 49.5, p < .001$) than their male counterparts

($M = 51.43, p < .001$). The results revealed that nurses did not differ by gender on total masculine, feminine or gender neutral traits. Both male and female nurse executives reported similar overall power.

Transformational leadership is characterized as more of a feminine leadership style because of the socialized characteristics of nurturing and support that women display when dealing with subordinates. "Transformational leadership has been positively associated with leadership effectiveness; therefore, if women typically exhibit transformational leadership behaviors, " 'this may contribute to breaking the glass ceiling as women are increasingly selected to occupy executive-level positions' (Maher, 1997, p.212)" (Aldoory & Toth, 2004).

Aldoory and Toth (2004) administered a demographic survey and the *Leadership Preference Index* to a sample of 240 male and 585 female participants. When asked whether they considered themselves leaders in public relations, men ($M = 3.80$) rated themselves higher than women ($M = 3.57$), ($t = 3.18, p < .01$). When asked whether women make better leaders than men, women ($M = 2.90$) agreed with the statement more than men ($M = 2.23$), ($t = -11.58, p < .000$). When asked whether they agreed that male or females could be equally capable leaders, there was no difference as a result of respondents' gender.

According to Aldoory and Toth (2004), there have been studies conducted to determine whether sex differences exist in leadership styles and effective leadership since the 1970's. The research findings have been varied. Although there have been many arguments declaring that leadership styles are marked by sex differences, others have found no differences at all. The ones that reported

differences have mainly focused on the perceptions of leadership. Women leaders have been rated by both men and women superiors and subordinates with key aspects of transformational leadership more frequently than male leaders. Female leaders were also rated to possess more charisma and individualized consideration than the males were. Many studies found that women displayed significantly more transformational behaviors and significantly fewer transactional behaviors than the male leaders who were rated by their own male subordinates. However, some of the studies found that female leaders are less effective than male leaders. Some of the gender differences that exist are sometimes caused by variables, such as job description, position in the organization and status level.

Peters, Kinsey and Malloy (2004) examined the leadership perceptions within and between genders among African Americans. A sample of 48 African American students (24 males, 24 females) was provided a problem-solving task. The authors used random effects analysis of variance (ANOVA) to test whether a female's leadership judgment of males compared with a male's leadership judgment of females. For the purpose of this study, leadership judgment is defined as others judgments of one's leadership.

The results showed that a higher level of agreement was observed when women judged the leadership of men (38%) ($M = 5.78$, $p < .05$) than when men judged the leadership of women (17%) ($M = 5.24$, $p < .05$). For males, agreeing with leadership judgments of other men was 40% ($M = 5.73$, $p < .05$). The ANOVA showed that both men and women predicted that men would judge both genders higher on leadership than women would (Peters, Kinsey & Malloy, 2004).

Eagly and Johnson (1990) conducted a comprehensive meta-analysis, which included several organizational, and assessment studies. As a result of their study, they determined that differences existed between male and female leadership styles. They asserted that men demonstrated a more autocratic leadership style, whereas women demonstrated a more democratic leadership style. They also reported that women display a more interpersonal style with their subordinates than men, meaning that women were more helpful, friendly, and available, while tending to the welfare and morale of others.

Eagly and Karau (1991) reviewed some existing literature and found that leadership roles differed by the gender of the emerging leaders depending on the type of leadership that was being measured. It was predicted by researchers that men were better than women were when measured on general leadership, whereas women were better when measured on social leadership.

Carli and Eagly (2001) assert that although there is an increase of women both in the workplace and in powerful positions, the number of women as compared to men is still minute. As reported in the Wall Street Journal back in 1986, in an article about women in the corporate arena, the concept of the "glass ceiling" first originated.

Eagly, Johannesen-Schmidt, and van Engen (2003) conducted a meta-analysis in which they analyzed 45 studies of transformational, transactional, and laissez-faire leadership styles looking for differences and similarities between genders. The study was based on group averages comprised of both genders, whereas leadership styles of both males and females could vary significantly. There was evidence females could be just as good or bad as their counterparts in leadership positions and each could practice either

the feminine or masculine leadership styles.

They reported females in leadership positions were more transformational than their male counterparts, who were reported to be more transactional. Although the authors asserted that males exhibited more transactional behaviors than females, their behaviors were aligned with the management-by-exception (active/passive) and laissez-faire transactional styles, whereas the females were found to exhibit more of the transactional behavior in relation to rewarding performance (contingent reward).

Their study also reported that in instances where women support and nurture their subordinates, males have more of a tendency to point out the failures of their subordinates. The authors' surmise that women exhibit more transformational leadership styles due to the fact that they may be more caring and nurturing in their relationships outside of work, which spills over into their work relationships. The authors' also assert that women may also be "out-performing" men on aspects of leadership in an attempt to negate beliefs about the existence of the "glass ceiling" when they are competing with men for a powerful position in the organization. (Eagly, Johannesen-Schmidt & van Engen, 2003).

Although the differences found between the genders on leadership was small, results indicated that women were more likely to practice transformational leadership behaviors along with transactional leadership aligned with contingent reward. Thus, it is stated in the research literature that this combination of leadership styles/behaviors will be more effective in the current work environment. (Eagly, Johannesen-Schmidt & van Engen, 2003).

In the findings in Eagly, Johannesen-Schmidt, and van Engen's (2003) study,

although research reveals that there is still bias against women leaders, compared to earlier decades, many more women are holding powerful leadership positions.

In summary, as mentioned before, there have been many studies conducted to conclude whether sex differences exist in leadership styles, behaviors and effective leadership. The research findings reported various results. Although there have been many arguments declaring that leadership styles are marked by sex differences, others have found no differences at all. However, the studies reviewed pertaining to healthcare revealed that for the most part, the gender of the nurse is not a factor in their performance and behaviors. Although the number of females in leadership positions has increased dramatically over the years, in many instances, it is suggested that the "glass-ceiling" still exists. When contrasting transformational and transactional leadership styles, transformational leadership is characterized as a feminine leadership style in many studies because of the nurturing and supportive traits exhibited by female leaders when dealing with subordinates, whereas transactional leadership style is viewed as more masculine.

Tenure and Leadership

Sin, Nahrgang and Morgeson (2009) used Hunter and Schmidt's psychometric meta-analytic procedure to conduct a meta-analysis to determine whether the *Leader-Member Exchange Agreement (LMX)* is positively related to the length of relationship tenure and/or the frequency or intensity of communication between the members and the leaders, which would support the premise the relationships between leaders and members are stronger when the relationship tenure is longer and the communication is frequent and intense. They

analyzed 64 (33 published articles, 31 unpublished articles) independent samples (N = 10,884 dyads). The mean for relationship tenure ranged from .14 to 5.48 years.

The results of a moderated hierarchical regression analysis revealed that moderating effects of relationship tenure ($\beta = .19, p < .05$) and the intensity of two-way interaction ($\beta = .21, p < .05$) was significantly correlated, but the moderating effect of communication was not significant ($\beta = .12$, n.s.). Member overall LMX was positively related to leader overall LMX for the dyads who had longer relationship tenure, which means that the extent of the LMX agreement increases and the length of the relationship tenure increases. However, in shorter relationship tenure, member overall LMX was not related to the leaders overall LMX (Sin, Nahrgang & Morgeson, 2009).

In summary, research supports the premise the relationship between leaders and followers is stronger when the tenure is longer and field of communication is open and strong. If leaders enhance their behaviors in an effort to stimulate the intellect of the followers, thereby motivating them to do their best, employee retention would improve, increasing the number of years employees remain with the organization.

Number of Nursing Years Experience and Leadership

Evans and Donnelley (2006) explored the relationship between the knowledge, skill and judgment of a nurse and proposed a model to describe the relationship. Their model reveals the interrelationship and the evolution of knowledge, skill, and judgment of a nurse's practice. By only relying on the tasks and psychomotor skills of a nurse to

define what nursing is delimits the true definition, which encompasses the decision-making and judgment processes that are necessary to critical thinking ability and optimal job performance of nurses. This also invalidates one's understanding of the knowledgebase that is important for judgment and decision-making that occur before, during and after the tasks have been completed.

Taylor (2002) conducted a qualitative study to compare the assessment skills of beginner and experienced nurses. She stated that the proficiency in nursing is affected by pertinent experience, learning styles and educational opportunities, which all occur over a period of time. She observed experienced nurses' utilizing several sources of information to a greater extent than the beginner nurses. Also, according to Taylor, experienced nurses ask more questions during the hand-off of patients than the nurses in the beginner stage, which contributes to their ability in recognizing clues when observing the patient. Cue recognition is manifested by the experienced nurse identifying symptoms outside of the normal range, prompting them to ask more questions in order to attain additional information. This type of sharing of information, as demonstrated by the experienced nurse, along with additional learning and experience, allows them to possess 'cue recognition', which supports Evans and Donnelley's (2006) findings which state that due to an expert-level nurse's components of knowledge, skill and judgment, they develop 'global sets' about their patients, which means they evaluate their patients in a broader perspective by recognizing patterns of behavior and integrating both emotional and instinctive processes.

Although more research is needed to fully explore the relationship between the expertise in nursing practice and quality of patient care, the current data has shown years

of experience in nursing support expertise as a positive impact on the quality of care provided. It is imperative that strategies are implemented in order to retain experienced nurses in the workforce. The aging of the experienced nurses along with the predicted retirement of huge numbers of them will have a negative impact on patient care and clinical quality unless this predicted and expected loss of knowledge and expertise is mitigated with actions that encourage the retention of seasoned nurses (Hill, 2010).

Educational Level and Leadership

Morrison, Jones, and Fuller (1997) investigated the relationship between the leadership behaviors and empowerment of the nursing staff and its effect on their job satisfaction in the nursing units. The results of the study revealed that both transformational and transactional leadership styles are positively related to the job satisfaction of the registered nurses, with Pearson's correlation coefficients (r = .64 and .35, respectively, $p < .05$), but transformational leadership was the only leadership style found to be positively related to the empowerment of the RNs, ($r = .26, p < .05$). Furthermore, the results showed that the contribution of leadership behaviors and empowerment varied by personnel type. For instance, perceived nurse leadership behaviors and empowerment scores were lower among the group of unlicensed nursing personnel as compared to the RNs. In regard to job satisfaction, the RNs and unlicensed personnel differed in how much influence was exerted on them by their leaders. This finding was related to the nature of the task being performed and the professional status of the personnel. The RNs felt they were more determined, that their jobs were more meaningful, which would have a greater effect on their working environment than the unlicensed nursing personnel

According to Kleinman's (2004) study of the relationship between managerial leadership behaviors and staff nurse retention, when the staff nurses who possessed a specialty certification (M = 2.1, SD = .85) were compared to those who did not have a specialty certification, the nurses without the certification perceived a higher mean frequency of idealized influence behaviors among their managers (M = 2.6, SD = .80; $t(67) = 2.2$, $p = .03$). An ANOVA was performed on the demographic data, which included the type of nursing degree. It was asserted that the type of nursing degree possessed by the staff nurses revealed perceived differences in reference to passive management by exception behaviors $F(2, 73) = 3.3$, $p = .04$. The nurses who had earned a bachelor's degree perceived a significantly higher mean frequency of passive management by exception leadership behaviors when compared to a combined sample of staff nurses who had an associates degree or a high school diploma ($p = .01$).

In summary, the articles reviewed for this study revealed that the educational level of the followers positively correlated with job satisfaction and the leadership styles and behaviors of the leaders and followers.

Followers Age and Leadership

Cummings, Olson, Hayduk, Bakker, Fitch, Green, Butler and Conlon (2008) report that Canada is predicted to encounter a major nursing shortage by 2016, while the demand for nursing services will increase by 53.4%. The data from their previous study was re-analyzed for this project. Participants who reported they provided direct care to cancer patients at least 60% of the time were

selected, which was 515 of the initial 615 participants. The authors' reported that according to the Canadian Institute for Health Information (2006), the average age of the nurses in Canada reached 44.7 years in 2005 and that one in three Canadian nurses was 50 years of age or older. The average age of the nurses used in this project was 46.43 years old and only 7.2% (37 of the 513) were 30 years old and younger. Data were collected by mailing a self-report questionnaire to the participants, which was comprised of three sections, one of which was demographics information. The demographic questions requested the age, years of nursing, years of oncology nursing experience, nursing education and the type of setting they worked in. A conceptual model of the oncology nursing environment was developed with relational leadership, visible nursing leadership, nurse managers, physician/nurse relationships, age, and gender selected as the external variables. The model investigated the relationships among the internal variables as arising from effects originating in either the external or internal variables. The results revealed that age and gender do not influence job satisfaction and the modification of indices confirmed that no significant relationship between age, gender and job satisfaction were discovered.

Wade, Osgood, Avino, Bucher, Bucher, Foraker, French, and Sirkowski (2008) investigated the effect of organizational characteristics and perceived caring attributes of managers on nurses' job satisfaction. They recruited 731 registered nurses employed by a large healthcare system in the mid-Atlantic region of the U.S. The convenience sample of participants was comprised of white, female, full-time staff nurses who were 41 years of age or older. Most of

them had bachelor degrees in nursing, with the exception of 4-5%, who had an advanced practice license. *The Lake's Practice Environment Scale of the Nursing Work Index* (Lake, 2002), *Nyberg's Caring Assessment Scale* (Nyberg, 1989a), the *Job Enjoyment Subscale of the Atwood and Hinshaw Job Satisfaction Scale* (Atwood & Hinshaw, 1980), and a demographic profile form was administered to the sample of participants. All of the data extracted from the instruments was explored using descriptive statistics.

To analyze the influence of the predictors, all of the variables were entered into a regression equation. Demographic data listed in categories was dummy-coded and entered into the equation, with an alpha level of ($p \leq 0.05$), to determine the effect each variable has on job satisfaction. When age, job type, and practice were added to multiple regression, the explained variance increased to 36%. Based on the beta coefficient ($\beta = 0.096$, $p < .003$), job satisfaction scores increased with the age of the participant. Results revealed that the age of the nurse positively influenced job satisfaction scores just as much as the nurse's ability, staffing and resource adequacy, and nursing foundations for the quality of care did. However, it was found that age was more likely to influence job satisfaction than physician-nurse relations (Wade et al., 2008).

Farag, Tullai-McGuinness and Anthony (2009) examined how nurses from the Baby Boomer and Gen-Xer cohorts perceive their nurse managers' leadership style and how they prefer to be managed. They administered and received completed packets which contained the *MLQ Rater Form* and a modified version of Litwin and Stringer's (1968) *Organizational Climate Questionnaire*

(LSOCQ) from 475 registered nurses located at three hospitals in Cleveland, Ohio, who worked at least 20-hours per week, had been with their current manager for at least 3-months and had no leadership responsibilities. The MLQ Rater Form was used to measure the perceived leadership style of the nurse managers and the LSOCQ was used to measure the perception of the unit climate.

A cross-sectional descriptive study was conducted and although the results revealed that nurses from both age cohorts perceived that their manager used both transformational ($t = 1.39, p < .005$) and transactional ($t = .30, p < .005$) leadership styles more often than passive ($t = -0.81, p < .005$) leadership styles, the differences in their perceptions were not significant. Both groups also perceived the climate in their units was characterized by more warmth and belonging ($t = -2.74, p < .005$) and less structure and administrative support ($t = -2.65, p < .005$). However, t-tests revealed that there were significant differences found when considering the age of the participants. The younger nurses scored higher than the older nurses in both the warmth/belonging ($M = 2.20$, $M = 2.01$, respectively) and the administrative support dimensions ($M = 2.51$, $M = 2.34$, respectively), whereas the higher score signifies a less favorable climate. The authors assert that the differences in perception may be attributed to multi-generational value differences (Farag, Tullai-McGuinness & Anthony, 2009).

In summary, some articles reviewed looking at age as a variable revealed that job satisfaction increased with the age of the follower. The authors attribute the difference in the perceptions of the leaders and followers to multi-generational value differences.

Parental Status, Marital Status, and Leadership

Russell and Rush (1987) conducted a study to examine the effects of an employee's sex and marital/parental status on performance evaluations because of their interest to find out if a person gets a particular score based on if he/she is single or married and whether they have toddler-aged children. At the time that this article was written, there had been minimal investigative research done to determine how working women with children were perceived when they entered the work force, in conjunction with how men of varying marital and parental statuses were viewed, prompted the authors' to conduct this study.

The expected hypothesis used in this study states that the performance of working mothers with toddler-aged children would be less favorably evaluated than the same level of males because mothers may be perceived to possess non-work related or family obligations that could interfere with their performance at work. Because men are considered not to have the same childcare responsibilities as working mothers (Fernandez, 1986), the evaluations based on the males performance would not be expected to differ because of their marital status.

The authors (1987) utilized a 2 x 2 x 2 crossed factorial design for this study. There were 320 undergraduate students (160 males, 160 females) randomly selected as participants and were assigned to four experimental conditions with the provision that males and females were evenly dispersed across conditions, which meant 40 participants per cell. They were instructed to assume the role of a supervisor who had to make administrative decisions concerning a subordinate who was performing poorly at work. Based on the results of a previous pilot study

by Russell (1983), which indicated that a sales position was a neutral sex-stereotyped occupation, a two-page report with the job description for a sales position, along with a summary of a favorable market, organization and work conditions, was administered to each participant.

The evaluation form to be used to rate the employee's performance consisted of 10 items on a 7-point scale covering four dimensions: (1) overall performance, (2) goal acceptance, (3) goal commitment, and (4) goal persistence. They were also rated on ability, effort, expected future effort, and expected future performance. The participants were then given the task to make recommendations concerning two forms of disciplinary action ranging from one, which was representative of termination, to seven, which was representative of no disciplinary action, and on the closeness of supervision ranging from one, which was representative of daily monitoring to seven, which was representative of monitoring bi-annually. A multivariate analyses was executed and revealed that there was a significant correlation between the sex and marital/parental status of the subordinate ($F(10,303) = 2.82$, $p < .01$), which supports the hypothesis. In investigating the means of the following groups: (1) married fathers, (2) married mothers, (3) single males, single females, it was discovered that marital/parental status had a more significant effect on the ratings given to the females than males. In contrast to the hypothesis, married mothers received the highest score on the performance evaluations and the least extreme disciplinary actions. The ratings for males were not different based on marital/parental status (Russell & Rush, 1987).

In summary, the reviewed research asserted the marital status of females was significant in achieving the highest scores on performance evaluations and played a part in them receiving the least extreme disciplinary actions in the organization. In contrast, the ratings of the males were not found to be statistically significant based on their marital and parental status.

CHAPTER 3

METHODOLOGY

This research study employed a correlation design using the *MLQ-5X* short form (Bass & Avolio, 2004), the *LBDQ - XII (Self)*, (Stodgill, 1963) and a Demographic Profile. This study examined the leadership styles of nurse managers, clinical nurse leaders (CNLs), and their subordinates to determine if there is a relationship between the leadership styles of nurse managers and the leadership styles of the CNLs, while controlling for position, gender, ethnicity, tenure, nursing years, educational level, age, marital status, parental status and primary caregiver status. Additionally, it examined the relationship between the leadership styles of the CNLs and the leadership behaviors of the staff nurses who report to them, which may affect how they care for their patients.

Regression analyses, hierarchical cluster analysis, and t-tests were conducted on the data. Leadership styles of the nurse managers and the CNLs were measured using the *MLQ-5X* Leader and Rater forms, whereas the behaviors of the staff nurses were measured using the LBDQ–XII (Stodgill, 1963).

Instruments

Leadership style in this study was measured using the *Multifactor Leadership Questionnaire (MLQ-5X short)* (Avolio & Bass, 2004). The *MLQ-5X* short form consists of 45 questions using a 5-point Likert rating scale, from zero to four (zero = not at all, one = once in a while, two = sometimes, three = fairly often, and four = frequently, if not always). Cronbach's coefficient alpha's ranged from .74 to .94 (Bass & Avolio, 2000).

Leadership behavior in this study was measured using the LBDQ – XII – Self (Abridged) (Ohio State University, 1962), which is a shortened version of the original one. The widely-used, modified version consisting of 20 questions was used in the present study. The questions were grouped as follows:

1. Major Scale: People-Oriented Components:

   Questions – 1, 3, 5, 7, 9, 11, 13, 15, 17, and 19

2. Major Scale: Task-Oriented Components:

   Questions – 2, 4, 6, 8, 10, 12, 14, 16, 18, and 20

This instrument was administered to the staff nurses to describe their own leadership behaviors.

Validity and Reliability of the Instruments

MLQ-5X Short Form

The three categories of leadership measured using the MLQ are transformational, transactional and laissez-faire. It is the most widely used instrument within the field of leadership studies. Multiple studies have helped establish its validity and reliability. However, issues concerning its validity still arise (Northouse, 2004).

Avolio, Bass and Jung (1999) conducted a study to re-examine the validity of the MLQ. They analyzed the transformational and transactional leadership components. The MLQ is designed to measure the following six leadership factors: 1) charisma, 2) intellectual stimulation, 3) individualized consideration, 4) contingent reward, 5) management-by-exception, and 6) laissez-faire, all of which are recommended in addressing any limitations identified with the original MLQ.

The MLQ-5X form was administered to 3,786 respondents. They were divided into 14 different sample groups, who worked at a variety of U.S and foreign firms. Participants rated their supervisor's leadership. Data was initially collected from nine of the sample groups. To confirm the findings of the first sample, they collected the data from the remaining sample groups at a later date. A confirmatory factor analysis was used to determine if the six-factor model of the MLQ was reliable in its measurement of leadership (Avolio, Bass & Jung, 1999).

According to Avolio, Bass and Jung, (1999), the six-factor model did not generate an acceptable fit because there were high inter-correlations between the transformational leadership factors and the contingent reward leadership style. The Goodness-of-Fit Index (GFI) and the Root Mean Square Residual (RMSR) values were .73 and .10, respectively, and the chi square with 2,889 degrees of freedom was 13,378, ($p< .0001$), demonstrating a poor fit for the six-factor model. However, LISREL VII provided Modification Indices, which reduced the number of items per scale on the MLQ, resulting in fewer parameters to be investigated. These modifications were made to eliminate redundancies. After several modifications to the MLQ-5X by various researchers, their findings revealed a broader base of evidence supporting the instrument in measuring transformational and transactional leadership factors.

Confirmatory Factor Analysis (CFA) was used to test convergent and discriminant validity for each MLQ subscale. The Goodness of Fit Index (GFI) and the Root Mean Squared Residual (RMSR) were found to be .91 and .04, respectively, which indicated that the MLQ adequately measured the dimensions of transformational and transactional leadership styles. Cronbach's coefficient

alpha's ranged from .74 to .94 (Bass & Avolio, 2000).

Vandenberghe, Stordeur and D'hoore (2002) conducted a confirmatory analysis to examine the measurement and construct validity of Bass's (1985) transformational and transactional leadership model. The primary purpose was to assess the factorial structure of the MLQ in a French-speaking environment. Three of the transformational factors (charisma, intellectual stimulation, individualized consideration) and three of the transactional factors (passive and active management-by-exception, contingent reward) from the MLQ-5X Rater Form were examined in this study. The results revealed that the six-factor model outperformed the three-factor model on statistical and practical grounds, Δx^2 (12) = 1.191.3, p< .01).

Kanste, Miettunen and Kyngas (2007) conducted a study to investigate and test the psychometric properties of the MLQ among nurses. The internal consistency of the MLQ was examined using Cronbach's α coefficient and item analysis. Questionnaires were mailed out to 601 nurse leaders and nurses working at different healthcare organizations in Finland. The results provided support for the internal consistency of the MLQ. Confirmatory factor analysis supported the validity of the modified 6-factor model structure of the MLQ.

In the 6-factor model, charisma (α = .90, p < .01), intellectual stimulation (α = .85, p < .01), individualized consideration (α = .89, p < .01) and contingent reward (α = .93, p < .01) correlated positively with transformational and transactional leadership. These same variables were negatively correlated with active management-by-exception (α = .78, p < .01) and laissez-faire leadership. However, active management-by-exception and laissez-faire leadership was positively correlated. The psychometric measurements

constructed in this study suggested that the modified 6-factor version of the MLQ is an acceptable instrument to measure multidimensional leadership of nursing (Kanste, Miettunen & Kyngas 2007).

Leadership Behavior Description Questionnaire (LBDQ) – XII (Self)

The original version of the *LBDQ* was developed by Hemphill and Coons in 1957. They conducted what is known as the "Ohio State Studies" providing research on the behavioral approaches that reiterates consideration and structure, thereby developing the LBDQ. According to the authors', structure describes the extent to which a leader is focused on tasks and production and directs followers work activities toward the achievement of the organization's goals, whereas consideration describes the extent to which the leader is more people-oriented and respects the ideas and feelings of their followers, which establishes a relationship of mutual trust.

The *LBDQ – XII* (Self) (Ohio State University, 1962) is the most widely used version in research and is considered to have the least number of autonomous items. The internal consistency reliabilities were high scores on both factors that were derived from the items drawn according to their use (consideration = .90, initiation of structure = .78) (Bass & Bass, 2008). The information provided by this instrument can be used to decipher whether a leader's orientation is more towards the people or more towards the task in an organization. However, it is noted that a measure of leadership style or behavior does not necessarily measure the same thing when used as an external rating as it does when used as a self-assessment (Templer, 1973).

Participants

The research sampled from 198 participants (18 clinical nurse leaders, 180 staff nurses) at various Kelsey-Seybold Clinic (KSC) locations. The clinic combines the expertise of over 250 physicians in 39 areas of medical specialties and sub-specialties. KSC also offers a full range of diagnostic testing services and treatments. There are more than 20 neighborhood locations in the Houston area, serving over 400,000 patients per year.

Null Hypotheses

The purpose of this study was tri-fold. First, it examined the relationships between staff nurses' (SNs') perceptions of their clinical nurse leaders' (CNLs') full range leadership style and the SNs' ratings of their own leadership behaviors.. Second, it examined the relationship between the clinical nurse leaders' (CNLs') perceptions of the leadership style of nurse managers' (NMs') and the self-reported leadership style of the CNLs. Finally, it aimed to discover if differences exist in the SNs leadership behaviors as a function of the NMs levels of engagement

The three areas of null hypotheses that were considered:

Area 1: There is no relationship between the leadership styles of the CNLs and the leadership behaviors of the staff nurses.

H0:1 There is no relationship between the staff nurses' rating of their CNLs transformational and transactional style and the staff nurses' rating of their own leadership behaviors (consideration-concern for people), when controlling for gender, ethnicity, tenure, nursing years, educational level, age,

marital status, parental status and primary caregiver status.

H0:2 There is no relationship between the staff nurses' rating of their CNLs transformational and transactional style and the staff nurses' rating of their own leadership behaviors (structure – concern for production), when controlling for gender, ethnicity, tenure, nursing years, educational level, age, marital status, parental status and primary caregiver status.

Area 2: There is no relationship between the leadership styles of the NMs and the leadership styles of the CNLs.

H0:3 There is no relationship between the CNLs rating of their nurse managers' transformational or transactional style and the CNLs self-ratings of their transformational style.

H0:4 There is no relationship between the CNLs rating of their nurse managers' transformational and transactional style and the CNLs self-rating of their transactional.

Area 3: There is no difference in the SNs leadership behaviors as a function of the NMs levels of engagement.

H0:5 There is no difference between nurse managers who are "engaged leaders" and nurse managers who are "non-engaged leaders" in terms of the leadership behaviors (consideration) of the staff nurses.

H0:6 There is no difference between nurse managers who are "engaged leaders" and nurse managers who are "non-engaged leaders" in terms of the leadership behaviors (structure) of the staff nurses.

Procedure

A sample of full-time clinical nurse leaders (CNLs) and staff nurses (SNs) at KSC were asked to participate in this study. A consent form, which provides information to participants about any risks and/or benefits associated with this study, as well as a confidentiality statement, was given to the participants to read and sign prior to completing the survey instruments. The consent form was collected prior to giving the participants a research packet.

All participants were asked to sign a consent form prior to participating in this study. Each CNL completed the *MLQ-5X* Rater form to rate their manager's leadership style and the *MLQ-5X* Leader form to rate their own leadership style. The staff nurses completed the *MLQ-5X* Rater form to rate their CNL's leadership style and the *LBDQ - XII* (Self) (Ohio State University, 1962) to measure their own leadership behaviors. The participants also completed a Demographics Profile, which provided additional independent variable information (position, gender, ethnicity, tenure, nursing years, educational level, age, marital status, parental status and primary caregiver status) that could possibly influence the adoption of the leadership styles (transformational/transactional) being measured. The completed research packets were dropped off at the designated drop locations at their clinic site for the researcher to pick up. After the research packets were collected, the analyses of the data began.

IBM SPSS Statistics, Student Version 18.0 was used for data analysis. The statistical procedures used in analyzing the data of this study included multiple regression, cluster analysis, and t-tests. Descriptive statistics was used to

summarize and present the findings through tables and graphs by calculating the means, medians, standard deviations, frequency distributions, and percentages of the demographic variables used in this study. The descriptive statistics for the *MLQ* (Bass & Avolio, 2004) and *LBDQ* (Stodgill, 1963) of the sample were also reported.

Ethical Considerations

Participants of this study received a consent form, which fully disclosed the research process and provided contact information for the researcher, faculty advisor and the Institutional Review Board (IRB). Participation was completely voluntary and participants were not penalized if they decided not to participate. This study posed no known risks to participants in this research.

CHAPTER 4

RESULTS

Characteristics of the Sample

Completed and usable surveys were returned by 198 of the 350 clinical nursing staff who consented to participate in this study, consisting of clinical nurse leaders (18) and staff nurses (180). The nurses who consented to participate in this study were primarily Caucasian females (51%), followed by African Americans (32%), were 30 to 60 years of age, had tenure with the same medical clinic for at least 10 years, had more than 15 years of nursing experience, had associate degrees (40%), followed by those who had professional certificates (33%).

All demographic variables, both continuous and categorical were further examined according to the leadership styles of the nurse managers (NMs) and clinical nurse leaders (CNLs) and leadership behaviors of the staff nurses (SNs).

Table 1

Distribution by Position

Position Held	N	Percent
Nurse Leader	18	9.1
Nurse	180	90.9
Total	198	100.0

As indicated by Table 1, 198 completed and usable surveys were returned

by clinical nursing staff, consisting of 18 CNLs and 180 SNs, who consented to participate in this study.

Figure 1 provides a visual representation of the distribution by the participant's position at the organization.

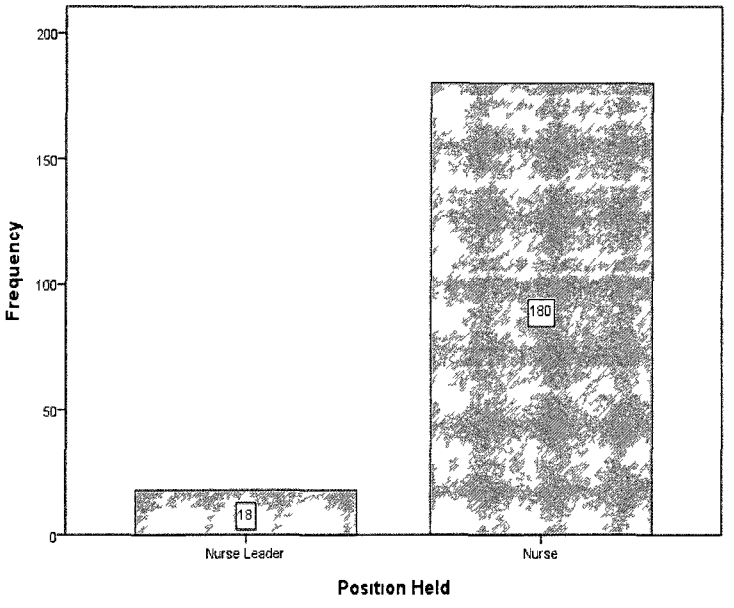

Figure 1. Distribution by position held.

Table 2

Distribution by Gender

Gender	N	Percent
Male	6	3 0
Female	192	97 0
Total	198	100 0

As indicated in Table 2, 97% of the participants were female. Figure 2 provides a visual representation of the distribution by the participant's gender.

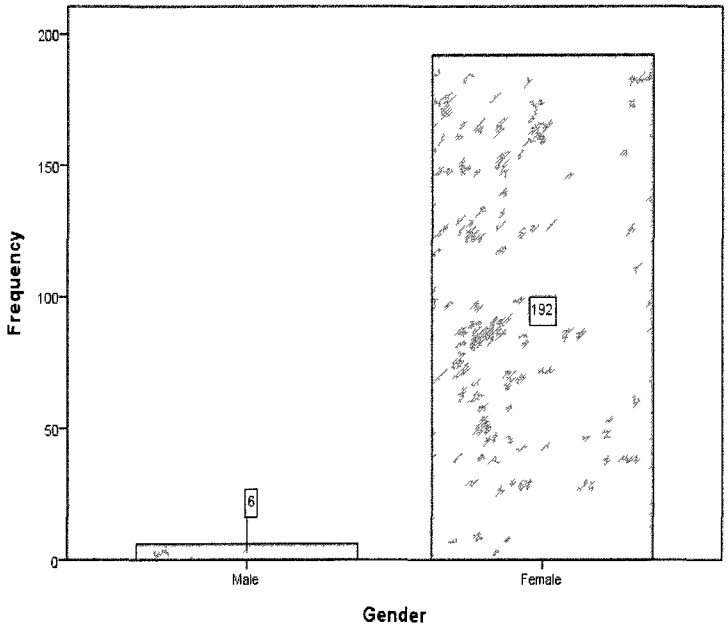

Figure 2 Distribution by gender.

Table 3

Distribution by Ethnicity

Ethnicity	N	Percent
Caucasian	101	51 0
African American	63	31 8
Hispanic/Latina	23	11 6
American Indian	2	1 0
Other	9	4 5
Total	198	100 0

As indicated in Table 3, the ethnicity of the participants included 51% Caucasian, 32% African American, 12% Hispanic/Latina, 1% American Indian and 5% Other. Figure 3 provides a visual representation of the distribution by the participant's ethnicity.

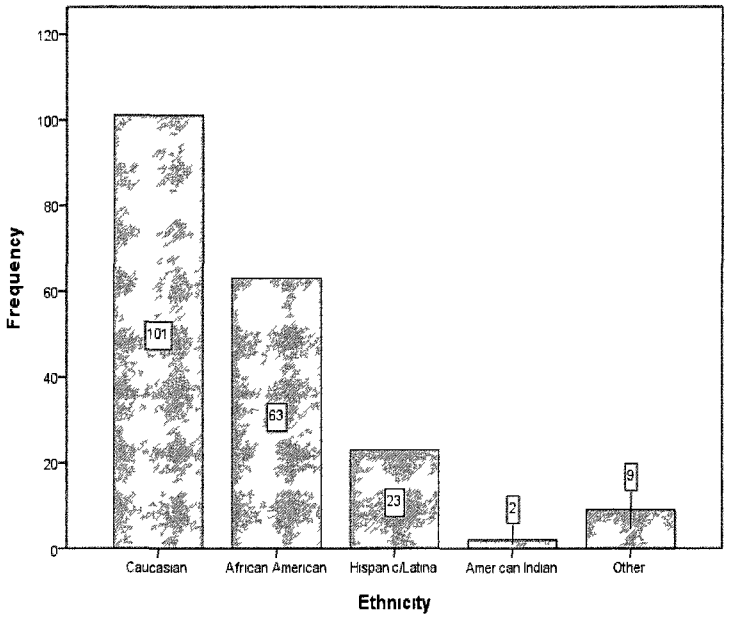

Figure 3. Distribution by ethnicity.

Table 4

Distribution of Tenure

Tenure	N	Percent
Less than 1 year	27	13 6
1-3 years	49	24 7
4-6 years	35	17 7
7-10 years	36	18 2
> 10 years	51	25 8
Total	198	100 0

As indicated in Table 4, the participants possessed a wide range of tenure with the organization, 26% had greater than 10 years, followed by 25% with between 1-3 years. Figure 4 provides visual representation of the distribution of tenure.

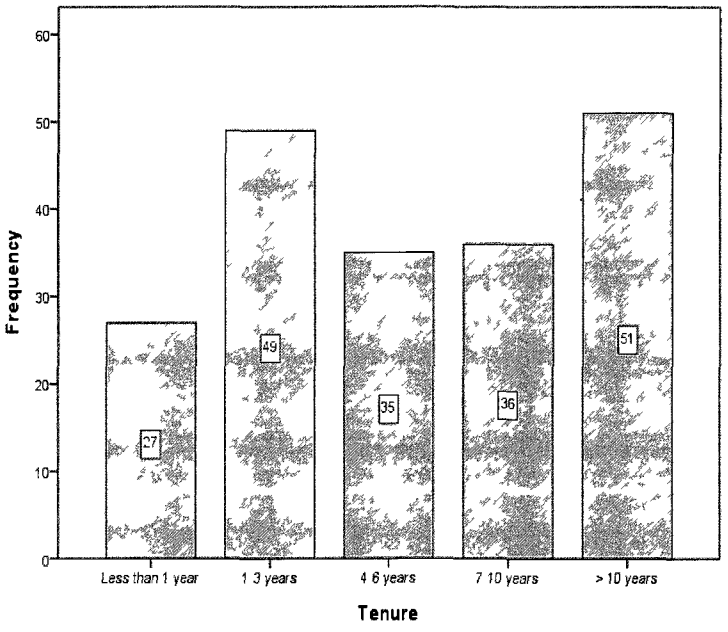

Figure 4. Distribution by tenure.

Table 5

Distribution by Number of Nursing Years

# of Nursing Years	N	Percent
0-5 years	12	6 1
6-8 years	14	7 1
9-12 years	30	15 2
13-15 years	25	12 6
> 15 years	117	59 1
Total	198	100 0

As indicated in Table 5, the participants were experienced clinicians, with the majority (59%) having greater than 15 years nursing experience. Figure 5 provides visual representation of the participants' years of nursing experience.

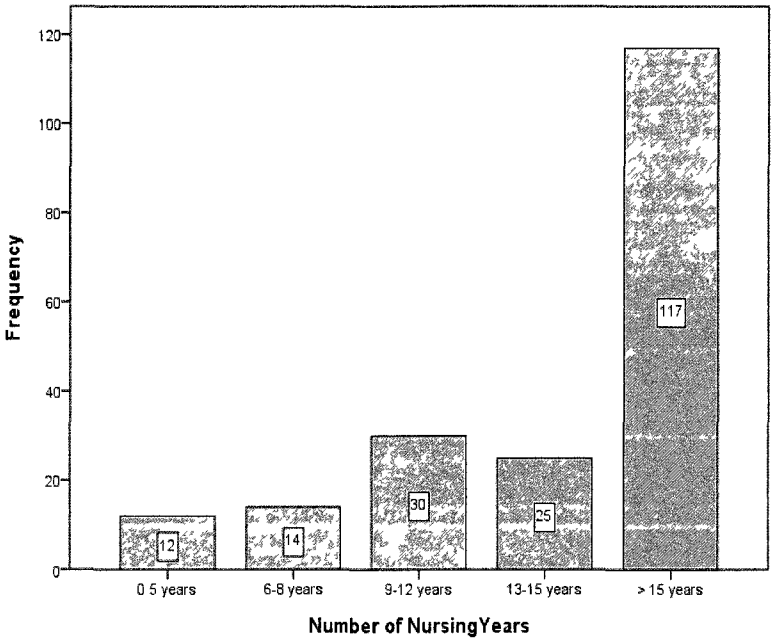

Figure 5. Distribution by number of nursing years.

Table 6

Distribution by Education

Educational Level	N	Percent
2-year Degree	80	40.4
4-year Degree	42	21.2
Graduate School	10	5.1
Professional Certificate	66	33.3
Total	198	100.0

As indicated in Table 6, the greater number of participants attained a 2 – year degree (40%), followed by 33% who attained a professional certificate. Figure 6 provides a visual representation of the participants' education level.

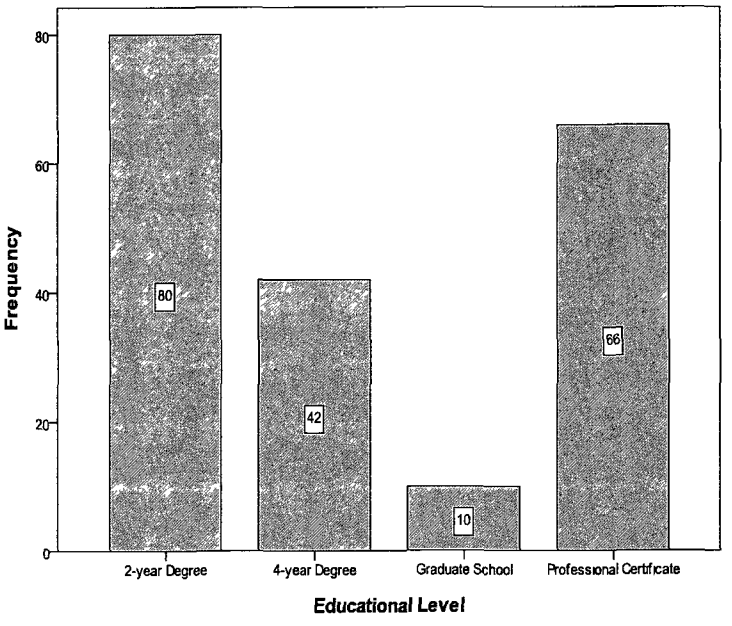

Figure 6. Distribution by education level.

Table 7

Distribution by Age

Age (Range)	N	Percent
Under 30	5	2.5
30-40	59	29.8
41-50	58	29.3
51-60	61	30.8
>60	15	7.6
Total	198	100.0

As indicated in Table 7, the greatest number of the participants was between the ages of 30-60 years of age, with 31% in the 51-60 age range, 30% in the 30-40 age range and 29% in the 41-50 age range. Figure 7 provides visual representation of the distribution of participants by age.

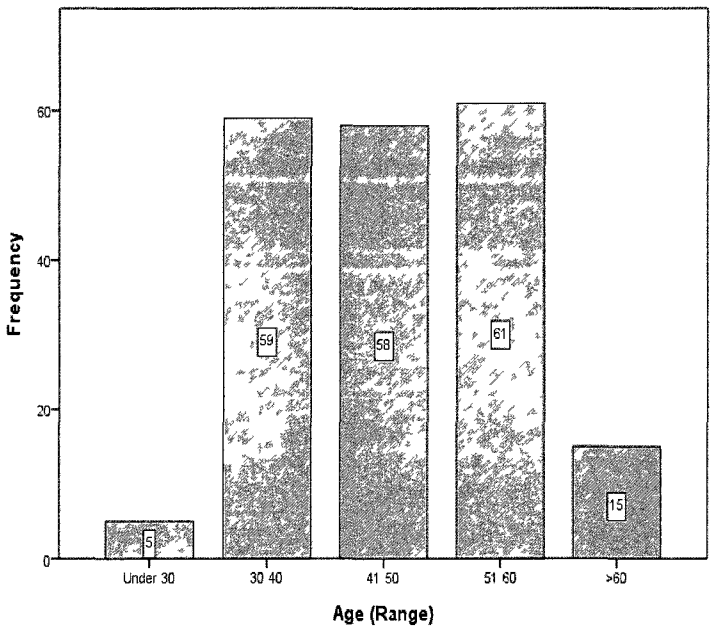

Figure 7. Distribution of age range.

Table 8

Distribution by Marital Status

Marital Status	N	Percent
Single	33	16 7
Married	125	63 1
Divorced	35	17 7
Widowed	5	2 5
Total	198	100 0

As indicated in Table 8, a majority of the participants were married (63%). Figure 8 provides visual representation of the distribution of participants by marital status.

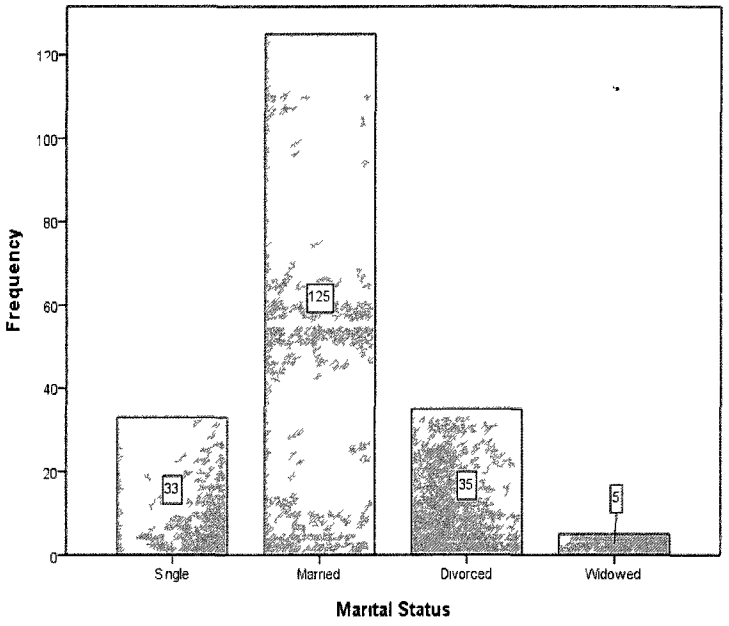

Figure 8. Distribution by marital status.

Table 9

Distribution by Parental Status

# of Children	N	Percent
.0	30	15.2
1	32	16 2
2	74	37.4
3	42	21.2
4	13	6.6
= or > 5	6	3.0
Total	197	99.5
System	1	.5
Total	198	100.0

As indicated in Table 9, the 85% of the participants had children. Figure 9 provides visual representation of the distribution of participants by parental status.

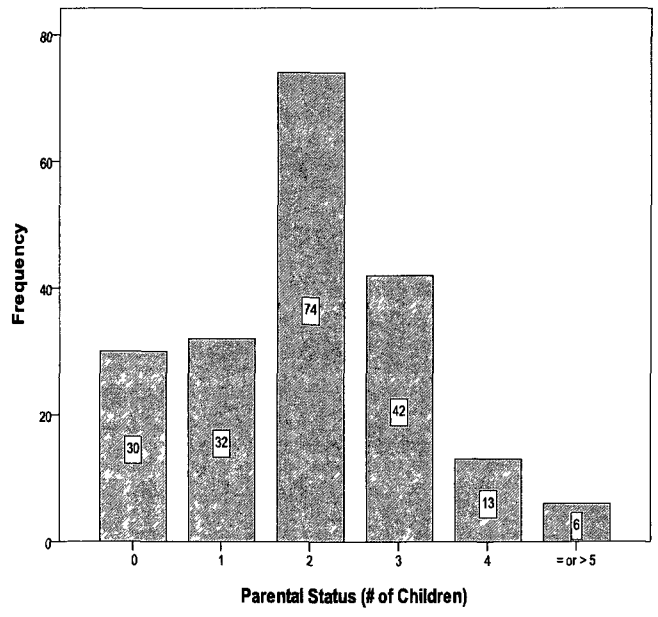

Figure 9. Distribution by parental status.

Table 10

Distribution by Primary Caregiver

Primary Caregiver	N	Percent
Yes	27	13 6
No	171	86 4
Total	198	100 0

As indicated in Table 10, most were not primary caregivers for anyone other then a child. Figure 10 provides visual representation of the distribution of participants by primary caregiver status

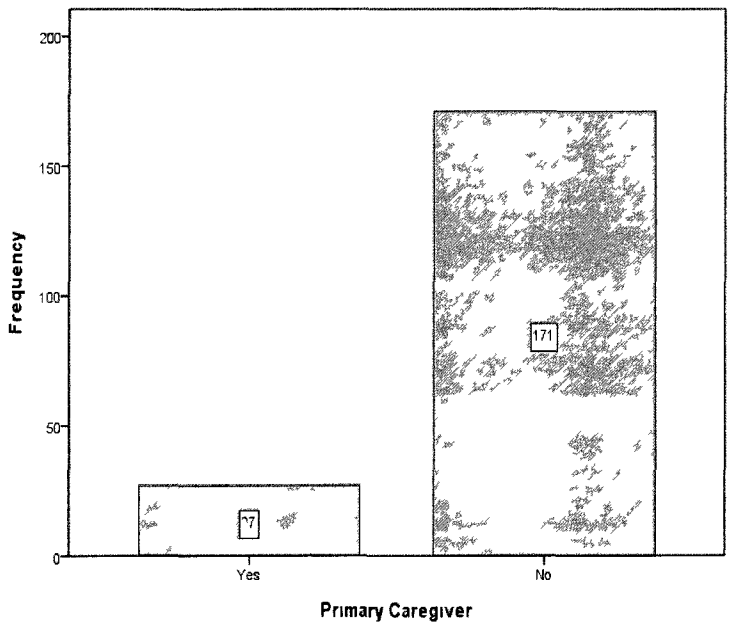

Figure 10. Distribution by primary caregiver status.

Figure 11 is a visual representation of the mean scores of the CNLs perceptions of the NMs transformational and transactional leadership.

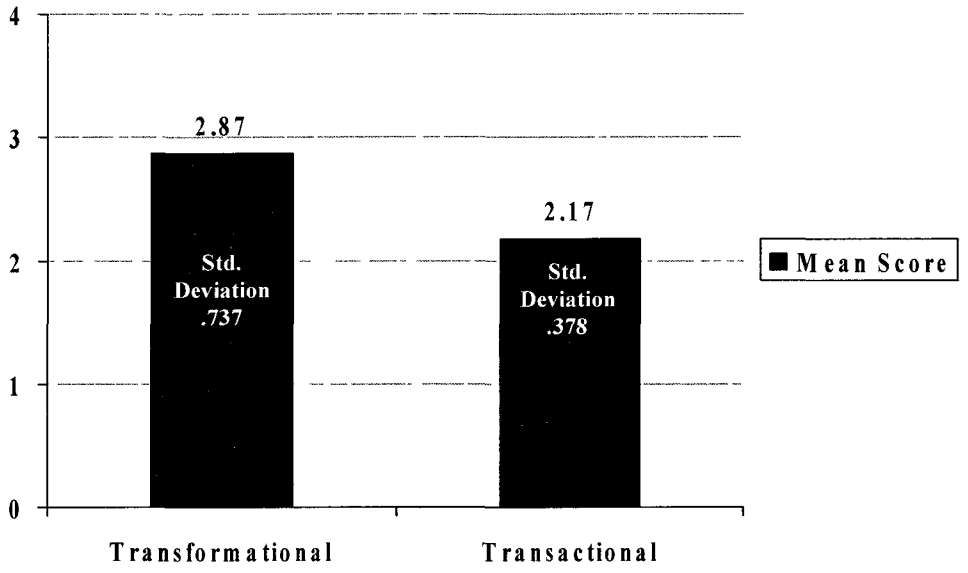

Figure 11. CNL's perceptions of NMs transformational and transactional leadership.

Figure 12 is a visual representation of the mean scores SNs perception of CNL's transformational and transactional style.

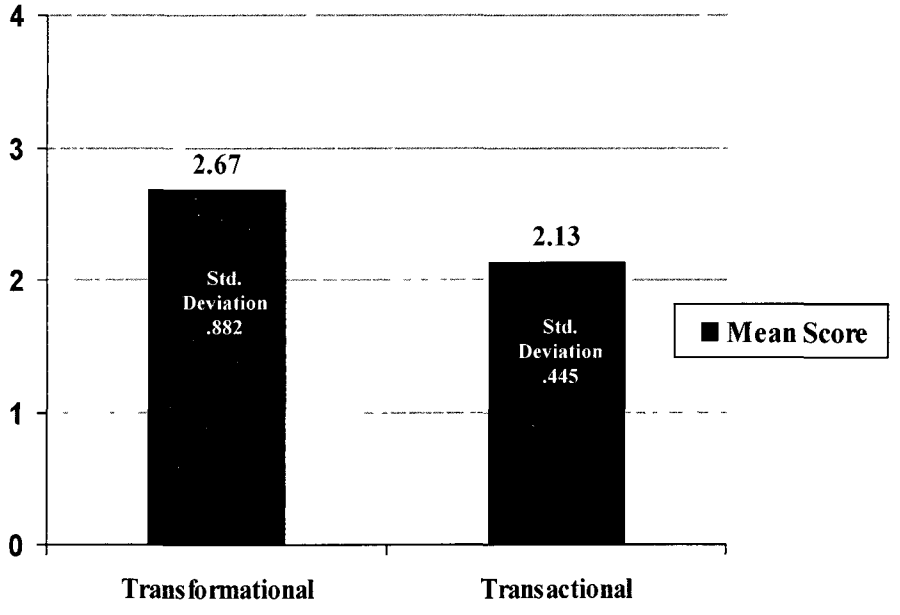

Figure 12. SNs perception of CNL's transformational and transactional style.

Figure 13 is a visual representation of the mean scores of the SNs self-perception of consideration and structure.

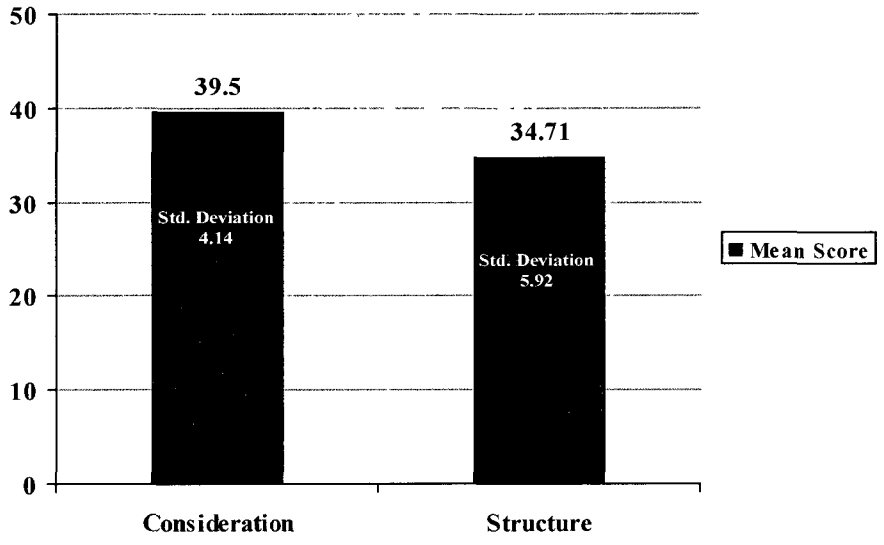

Figure 13. SNs self-perception of consideration and structure.

Findings

Regression Analyses

Null Hypothesis Area 1: There is no relationship between the leadership styles of the CNLs and the leadership behaviors of the staff nurses.

Table 11 provides the results of the regression analysis, conducted to test the first null hypothesis, in Area 1, to determine if there was a relationship between the SNs rating of their CNLs transformational/transactional leadership style and the SNs self-ratings of their own leadership behaviors (consideration). There was a significant, positive relationship between the CNL's transformational style and SN's self-rating on consideration ($\beta = .340$, $p = .002$).

Table 11

Model Summary for Staff Nurses rating of CNLs Leadership Style and self-rating on Consideration

Model	R	R Square	Std. Error of the Estimate	R Square Change	df1	df2	Sig.
1	.382	.146	4.18932	.146	30	149	.695
2	.480	.230	4.00295	.085	2	147	.000

Note. a. Control Variables, b. Control Variables, Transformational and Transactional Leadership.

Table 12 provides the correlation matrix for the SNs' ratings of their CNL's transformational leadership style and the SNs self-rating of their leadership behaviors (consideration).

Table 12

Correlation Matrix for Staff Nurses rating of CNLs Leadership Style and self-rating on Consideration

	Consideration	Transformational Leadership	Transactional Leadership
Pearson Correlation	1.000		
	.278	1.000	.687
	.206	.687	1.000
Sig. (1 -tailed)	.	.000	.003
	.000	.	.000
	.003	.000	.

Note. a n = 180, b Staff Nurses, c **. Correlation is significant at the 0.01 level (1-tailed).

Table 13 provides the results of the regression analysis, conducted to test 2 null hypothesis 2, in Area 1, to determine if there was a relationship between the SNs rating of their CNLs transformational/transactional leadership style and the SNs self-ratings of their own leadership behaviors (structure). There was a significant, positive relationship between the CNL's leadership style and SN's self-rating on structure. Transformational leadership explained 6% of the variance in how SNs rated themselves on structure.

Table 13

Model Summary for Staff Nurses rating of CNLs Leadership Style and self-rating on Structure

Model	R	R Square	Std. Error of the Estimate	R Square Change	df1	df2	Sig.
1	.425	.181	5.87153	.181	30	149	.348
2	.489	.239	5.69770	.058	2	147	.004

Note. a. Control Variables, b. Control Variables, Transformational and Transactional Leadership.

Table 14 provides the correlation matrix for the SNs' rating of their CNL's transformational/transactional leadership style and the SNs self-ratings of leadership behaviors (structure).

Table 14

Correlation Matrix for Staff Nurses rating of CNLs Leadership Style and self-rating on Structure

	Transformational Score of Nurse Leader	Transformational Score of Manager	Transactional Score of Manager
Pearson Correlation	1.000	.757	.610
	.757	1.000	.773
	.610	.773	1.000
Sig. (1-tailed)		.000	.004
	.000		.000
	.004	.000	

Note. a n=18, b Clinical Nurse Leader, c **Correlation is significant at the 0.01 level (1-tailed).

Null Hypothesis Area 2: There is no relationship between the leadership styles of the NMs and the leadership styles of the CNLs.

Table 15 provides the results of the regression analysis, conducted to test null hypothesis 1, in Area 2. The first of these two analyses was run to determine if there was a relationship between the transformational or transactional leadership styles of the NMs and the transactional leadership styles of the CNLs. There was a significant, positive relationship between the CNL's transformational leadership style and NM transformational leadership style, ($\beta = .757, p = .000$).

Transformational leadership explained 57% of the variance in how the CNLs rated their NMs on transformational leadership. Transactional leadership was non-significant, as shown in Model 2.

Table 15

Model Summary for CNLs rating of NMs Leadership Style and CNLs self-rating of Transformational Leadership Style

Model	R	R Square	Std. Error of the Estimate	R Square Change	df1	df2	Sig.
1	.757	.574	.29203	.574	1	16	.000
2	.758	.575	.30109	.001	1	15	.823

Note. a. Transformational Score of Manager, b. Transformational Score of Manager, Transactional Score of Manager.

Table 16 provides the correlation matrix for the CNLs rating of the NMs leadership style and CNLs self-rating of transformational leadership style.

Table 16

Correlation Matrix for Clinical Nurse Leaders (CNLs) rating of Nurse Managers (NMs) Leadership Style and CNLs self-rating of Transformational Leadership Style

		Transformational Score of Nurse Leader	Transformational Score of Manager	Transactional Score of Manager
Pearson Correlation		1.000	.757	.610
		.757	1.000	.773
		.610	.773	1.000
Sig. (1-tailed)			.000	.004
		.000		.000
		.004	.000	

Note. a n=18, b Clinical Nurse Leader, c **Correlation is significant at the 0.01 level (1-tailed).

Table 17 provides the results of the regression analysis, conducted to test the null hypothesis 2, in Area 2. The second analysis was run to determine if there was a relationship between the CNLs rating of the NMs transformational or transactional leadership style and the CNLs self-rating on transformational leadership. There was a significant, positive relationship between the CNLs transactional leadership style and NMs transactional leadership style ($\beta = 1.029$, $p = .003$). Transactional leadership explained 43% of the variance in how the CNLs rated their NMs on transactional leadership. Transformational was non-significant as shown in Model 1.

Table 17

Model Summary for CNLs rating of their NMs Leadership Style and CNLs self-rating of Transactional Leadership Style

Model	R	R Square	Std. Error of the Estimate	R Square Change	df1	df2	Sig.
1	.271	.073	.27528	.073	1	16	.278
2	.706[b]	.498	.20916	.425	1	15	.003

Note. a. Transformational Score of Manager, b. Transformational Score of Manager, Transactional Score of Manager.

Table 18 provides the correlation matrix for the CNLs rating of the NMs leadership style and CNLs self-rating of transactional leadership style.

Table 18

Correlation Matrix for Clinical Nurse Leaders (CNLs) rating of Nurse Managers (NMs) Leadership Style and CNLs self-rating of Transactional Leadership Style

		Transactional Score of Nurse Leader	Transformational Score of Manager	Transactional Score of Manager
Pearson Correlation	Transactional Score of Nurse Leader	1.000	.271	.623
	Transformational Score of Manager	.271	1.000	.773
	Transactional Score of Manager	.623	.773	1.000
Sig. (1 tailed)	Transactional Score of Nurse Leader		.139	.003
	Transformational Score of Manager	.139		.000
	Transactional Score of Manager	.003	.000	

Note. a n=18, b Clinical Nurse Leader, c ** Correlation is significant at the 0.01 level (1-tailed).

Hierarchical Cluster Analysis

Null Hypothesis Area 3: There is no difference in the SNs leadership behaviors as a function of the NMs levels of engagement.

Figure 14 illustrates the dendogram created by the results of the hierarchical cluster analysis. This analysis was performed because the effects of the NMs leadership style on the SNs could not be measured directly because the SNs did not rate the NMs in this study; only the CNLs directly rated the NMs leadership style. Since the SNs did not directly rate the NMs, and there was only a

sample of 18 for the leadership scores of the NMs, a regression of the SNs behaviors on the NMs leadership style could not be performed. However, the researcher could use the transformational and transactional leadership styles of the nurse managers as a categorical variable. A cluster analysis was conducted to see if the data itself could distinguish groups on those variables and be used to create a categorical variable.

As a result of the cluster analysis, there were clearly two distinct groups into which the NMs fell, which were Group 0, comprised of 10 NMs and Group 1, which was comprised of 8 NMs.

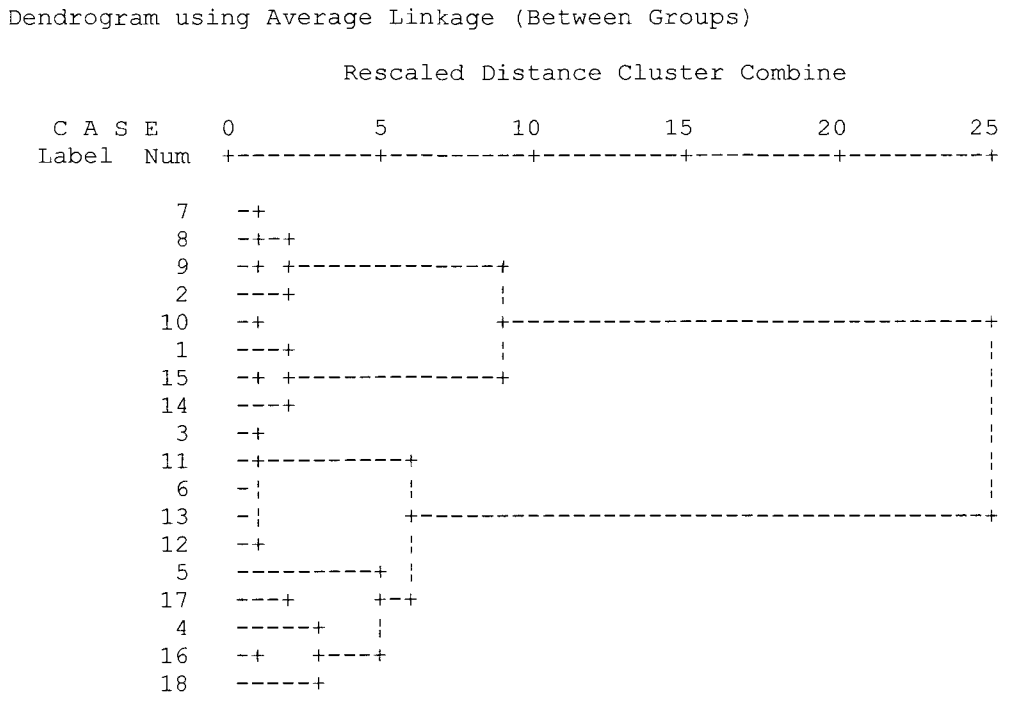

Figure 14. Dendogram.

Analyses Using t-tests

There were (8) nurse managers in Group 0 and (10) nurse managers in Group 1. A t-test was performed on each group to see how they differed on their transformational and transactional scores. As illustrated in Figure 12, the first set of t-test results were on the transformational scores between these two groups. The (10) NMs in Group 0 had significantly higher transformational mean scores (M = 3.43) than the (8) NMs in Group 1, (M = 2.69), $p = .00$.

		t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference Lower	Upper
Transformational Score of Manager	Equal variances assumed	-7.236	16	.000	-1.26125	-1.63077	-.89173
	Equal variances not assumed	-6.938	12	.000	-1.26125	-1.65732	-.86518

Figure 15. t-test on transformational score of NM.

As illustrated in Figure 16, the second set of t-test results were on the transactional scores between these two groups. The (10) NMs in Group 0 had significantly higher transactional mean scores (M = 2.42) than the (8) NMs in Group 1, (M = 1.86), $p = .00$.

		t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference Lower	Upper
Transactional Score of Manager	Equal variances assumed	-4.575	16	.000	-5.5600	-.81363	-.29837
	Equal variances not assumed	-4.831	15	.000	-5.5600	-.80119	-.31081

Figure 16. t-test on transactional score of NM.

From the t-tests conducted on the mean differences between the two groups on the transformational and transactional scores, of the two distinct groups of nurse managers that were formed, Group 0 was labeled "engaged leaders" because they had significantly higher means on both transformational and transactional leadership, whereas Group 1 was labeled "non-engaged leaders" because they scored significantly lower means on both transformational and transactional leadership.

Null Hypothesis for Area 3: There is no difference in the SNs leadership behaviors as a function of the NMs levels of engagement.

Figure 17 provides the results of the t-tests that were conducted to test null hypotheses for Area 3, to determine if differences in leadership styles of NMs affect the leadership behaviors (consideration) of the SNs.

A t-test was performed on mean differences between engaged and non-engaged NMs on the SNs consideration. No significant differences were found for consideration.

		t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
						Lower	Upper
Consideration	Equal variances assumed	.414	178	.679	.25750	-.96941	1.48441
	Equal variances not assumed	.414	169	.679	.25750	-.96996	1.48496

Figure 17. t-test on mean differences between engaged and non-engaged NMs and on SNs consideration.

Figure 18 provides the results of the t-tests that were run to test null hypotheses for Area 3, to determine if differences in leadership styles of NMs

affect the leadership behaviors (structure) of the SNs.

A t-test was performed on mean differences between engaged and non-engaged NMs on the SNs structure. No significant differences were found for structure.

		t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
						Lower	Upper
Structure	Equal variances assumed	-.478	178	.633	-.42500	-2.18083	1.33083
	Equal variances not assumed	-.477	169	.634	-.42500	-2.18250	1.33250

Figure 18. A t-test on mean differences between engaged and non-engaged NMs and on SNs structure.

CHAPTER 5

DISCUSSION OF FINDINGS AND CONCLUSION

Evidently, little is known about the relationship between the CNL's leadership style and the behaviors of the nurses they lead. Several published articles that addressed these situations were descriptive studies, which provided a limited understanding of the relationship. In addition, most of the studies were mainly focused on the roles of the nurse managers and the CNL's, with minimal attention to the impact the leaders' leadership styles had on their followers' behaviors.

The present study examined: (1) the relationship between the leadership style of NMs and the leadership style of their CNLs, (2), the relationship between the leadership style of the CNLs and the leadership behaviors of the SNs, and (3) if differences in the leadership levels of engagement between NMs affect the SNs behaviors.

The findings indicate that SN's perceptions of their CNL's transformational leadership style was a significant predictor of the SNs' self-ratings on consideration and that the relationship was positive, (2) CNLs' ratings of their NM's transformational leadership style was a significant predictor of the CNL's self-ratings on transformational, and the CNLs' ratings of their NM's transactional leadership style was a significant predictor of the CNL's self-ratings on transactional, and (3) there were no differences in SNs' self-ratings of leadership behaviors based on engaged versus non-engaged NMs.

While the results cannot be directly compared to previous studies, the findings in the present study generally support previous research, which has indicated a positive relationship between transformational leadership style and various indicators of nurse behavior and performance.

According to the reviewed studies, transformational leadership and desirable leadership behaviors are related to high levels of patient satisfaction and other organizational outcomes, such as a decrease in staff turnover, which directly impact the financial stability and performance of the organization (Boumans & Landeweerd, 1993; Sellgren, Ekvall & Tomson, 2008; McNeese-Smith, 1995; Vecchio & Norris, 1996).

The present study did not establish any of the control variables as significant predictors. In the case of gender and parental status, this could be explained by the relative lack of variability in the data on those variables; the sample was relatively homogenous on those variables. With respect to the other control variables, the results did not support findings from previous literature concerning education, age, or tenure; however, the studies reviewed in the literature did not specifically address these control variables as related to the leadership behaviors measured in this study, which were consideration and structure. Specifically, while Kleinman's (2004) study did find differences in perceived leadership styles, as measured by transformational and transactional factors, based on certification and degree types, the education level of the staff nurses was not a significant predictor of the leadership behaviors (consideration and structure) in the present study.

Due to the leadership position that nurse managers and CNLs are in, it is very important for them to understand factors that can both influence and diminish job performance because job satisfaction is the key that boosts morale within the unit and creates an atmosphere, which supports growth, and change

moving forward. Staff nurses need to have positive relationships with their nurse leaders in order to function effectively in the demanding healthcare sector.

The results of the present study have several implications for the field of leadership. Healthcare organizations can use the data from this study as a tool to educate nurse leaders on effective leadership styles and show how they can potentially influence the behaviors of nursing staff.

In current healthcare environments, nurse leaders are confronted with countless leadership and management challenges, including retaining the nursing staff. In fact, based on much of the previous research, staff retention is one of the most significant challenges they face (Cummings, Olson, Hayduk, Bakker, Fitch, Green, Butler & Conlon, 2008). Thus, more research is needed to further examine and clearly understand the relationship between the nurse leaders' leadership styles and the nursing staffs' behaviors in the current healthcare arena, which has often been labeled as complex, tumultuous, erratic, divided and expensive (Rosentein & O'Daniel, 2005).

Limitations of the Findings

Only a small sample of CNLs (18) rated the leadership style of the NMs, thereby limiting the research. Additionally, a sample of convenience was used, which limited the generalizability of the results, such that the results from this study are generalized to the extent that the sample used is representative of the population.

Implications and Recommendations for Future Research

Currently, in the dynamic healthcare environment, it is often challenging to identify those sources which impede progress, and even more challenging to determine

the level of impact they will have on the future of healthcare quality. By addressing and resolving key issues in reference to the 'high price' an organization pays for an exhibition of ineffective leadership styles and/or behaviors, one could argue that healthcare organizations will make a huge leap forward in improving the future of healthcare quality, thereby enhancing patient care and patient satisfaction.

Going forward, it is imperative that researchers respond to the needs of nurse leaders and administrators by developing empirical evidence to support the strategies that enhance the frequency of effective managerial leadership styles as perceived by staff nurses. Many of the studies reviewed and/or discussed for this study support transformational leadership styles for nursing leaders in the 21st century healthcare delivery systems. The results of the present study did not support a relationship between the leadership style of the nurse manager and the leadership behaviors of the staff nurses; this could possibly be attributed to the data being somewhat limited by the small sample size of nurse manager ratings. Future research should examine the relationship using hierarchical regression and with a larger number of nurse manager ratings.

Researchers should also conduct studies to examine the relationship between leadership behaviors of staff nurses and performance of staff nurses, using a variety of outcome measures, such as patient morbidity and mortality, and patient satisfaction.

REFERENCES

Aldoory, L., & Toth, E. (2004). Leadership and gender in public relations: perceived effectiveness of transformational and transactional leadership styles. *Journal of Public Relations Research, 16(2).*

Atwood, J. R., & Hinshaw, A. S. (1980). Job satisfaction instrument: a program of development and testing (Abstract). *Communicating Nursing Research 13, 55.*

Avolio, B. J., Bass, B. M., & Jung, D. (1999). Reexamining the components of transformational and transactional leadership using the multifactor leadership questionnaire. *Journal of Occupational and Organizational Psychology 7, 441-462.*

Avolio, B. J., & Bass, B. M. (2004). *Multifactor leadership questionnaire: manual and sampler set*. Mind Garden, Inc. 3rd. edition.

Bass, B. M. (1985). *Leadership and performance beyond expectations*. New York: Free Press.

Bass, B. M. (1991). Two decades of research and development in transformational leadership. *European Journal of Work and Organizational Psychology, 8(1), 9-32.*

Bass, B., & Avolio, B. (2000). *The multifactor leadership questionnaire (2nd. Ed.).* Redwood, City, CA: Mind Garden, Inc.

Bass, B. M. (1998). *Transformational leadership: industrial, military, and educational impact.* Mahwah, NJ: Lawrence Erlbaum Associates.

Bass, B., & Bass, R. (2008). *The bass handbook of leadership: theory, research*

and managerial applications, 4th Edition, New York: Free Press.

Begun, J. W., Tornabeni, J., & White, K. R. (2006). Opportunities for improving patient care through lateral integration: the clinical nurse leader. *Journal of Healthcare Management*, 51(1), 19-25.

Behling, O., & Law, K. S. (2000). Translating questionnaires and other research instruments: Problems and solutions. *Thousand Oaks, CA: Sage.*

Benchmarks (1990). Assessment instrument. *Center for Creative Leadership.* Greensboro, NC.

Boerner, S., Dutschke, E., & Wied, S. (2008). Charismatic leadership and organizational citizenship behavior examining the role of stressors and strain. *Human Resource Development International, 11(5), 507-521.*

Boumans, N. P. G., & Landeweerd, J. A. (1993). Leadership in the nursing unit: relationships with nurses' well-being. *Journal of Advanced Nursing 18, 767-775.*

Carli, L., & Eagly, A. (2001). Gender, hierarchy, and leadership: an introduction. *Journal of Social Issues, 57(4), 629-636.*

Chen, H., Beck, S. L., & Amos, L. K. (2005). Leadership styles and nursing faculty job satisfaction in taiwan. *Journal of Nursing Scholarship, 37(4), pp374-380).*

CIHI (Canadian Institutes for Health Information) (2006). Work force trends of regulated nurses in canada. Available at: http://secure.cihi.ca/cihiweb/dispPage.jsp?cw_page-

download_form_e&cw_sku-WTRNC05PDF&cw_ctt-1&cw_dform-N, accessed 27 February 2008.

Cohen, J., & Cohen, P. (1983). *Applied multiple regression/correlation analysis for the behavioral sciences. (2nd ed.)* Hillsdale, NJ: Eribaum.

Comer, L. B., Jolson, M. A., Dubinsky, A. J., & Yammarino, F. J. (1995). When the sales manager is a woman: an exploration into the relationship between salespeople's gender and their responses to leadership styles. *Journal of Personal Selling & Sales Management, 15(4).*

Cummings, G. G., Olson, K., Hayduk, L., Bakker, D., Fitch, M., Green, E., Butler, L., & Conlon, M. (2008). The relationship between nursing leadership and nurses' job satisfaction in Canadian oncology work environments. *Journal of Nursing Management 16, 508-518.*

Daft, R. L. (2005). *The Leadership Experience, 3rd Edition.* Mason, OH: Thomson South-Western.

Eagly, A. H., Johannneson-Schmidt, M. C., & van Engen, M. L. (2003). Transformational, transactional, and laissez-faire leadership styles: A meta-analysis comparing women and men. *Psychological Bulletin, 129, 569-591.*

Eagly, A. H., & Johnson, B. T. (1990). Gender and leadership style: a meta-analysis. Psychological Bulletin, 108, 233-256.

Eagly, A., & Karau, S. (1991). Gender and the emergence of leaders: a meta-analysis. *Journal of Personality and Social Psychology, 60(5), 685-710.*

Evans, R., & Donnelley, G. (2006). A model to describe the relationship between knowledge, skill and judgment in nursing practice. *Nursing Forum, 41(4), 150-157.*

Farag, A. A., Tullai-McGuinness, S., & Anthony, M. K. (2009). Nurses' perception of their manager's leadership style and unit climate: are there generational differences? *Journal of Nursing Management, 17, 26-34.*

Fernandez, J. P. (1986). *Child care and corporate productivity: resolving family/work conflicts*. Lexington, MA: D. C. Heath and Co.

Fuller, J. B., Morrison, R., Jones, L., Bridger, D., & Brown, V. (1999). The effects of psychological empowerment on transformational leadership and job satisfaction. *Journal of Social Psychology, 139(3).*

Gaskill, L., Jasper, C., & Bastow-Shoop, H. (1996). Operational planning and competitive strategies of male and female retailers. *The International Review of Retail, Distribution and Consumer Research, 6(1).*

Gellis, Z. D. (2001). Social work perceptions of transformational and transactional leadership in healthcare. *Social Work Research 25(1).*

Ginsburg, L., Norton, P. G., Casebeer, A., & Lewis, S. (2005). An educational intervention to enhance nurse leader's perceptions of patient safety culture. *Health Research and Educational Trust, 40(4).*

Graham, I. (2003). Leading the development of nursing within a nursing development unit: the perspectives of leadership by the team leader and a professor of nursing. *International Journal of Nursing Practice, 9, 213-222.*

Hill, K. (2010). Improving quality and patient safety by retaining nursing expertise. *Journal of Issues in Nursing, 15(3).*

Johnson, J.E.V., & Powell, P. L. (1994). Decision making, risk and gender: are managers different? *British Journal of Management, 5.*

Judge, T., Piccolo, R., & Ilies, R. (2004). The forgotten ones? The validity of consideration and initiating structure in leadership research. *Journal of Applied Psychology, 89(1), 36-51.*

Kanste, O., Miettunen, J., & Kyngas, H. (2007). Psychometric properties of the multifactor leadership questionnaire among nurses. *Journal of Advanced Nursing, 57(2), 201-212.*

Kanste, O. J., Kyngas, H., & Nikkila, J. (2007). The relationship between multidimensional leadership and burnout among nursing staff. *Journal of Nursing Management, 15, 731-739.*

Kaufmann, G., Isaksen, S. G., & Lauer, K. (1996). Testing the "glass ceiling" effect on gender differences in upper level management: the case of innovator orientation. *European Journal of Work and Organizational Psychology, 5(1).*

Klein, E. B., Astrachan, J. H., & Kossek, E. E. (1996). Leadership education: the impact of managerial level and gender on learning. *Journal of Managerial Psychology, 11(2).*

Kleinman, C. (2004). The relationship between managerial leadership behaviors and staff nurse retention. *Hospital Topics: Research and Perspectives on Healthcare, 82(4).*

Lake, E. T. (2002). Development of the practice environment scale of the nursing work index. *Research in Nursing & Health 25, 176-188.*

Liden, R. C. & Maslyn, J. M., (1998). Multidimensionality of leader-member exchange: an empirical assessment through scale development. *Journal of Management, 24, 43-72.*

Litwin, G., & Stringer, R. (1968). *Motivation and organizational climate.* Division of Research, Graduate School of Business Administration, Harvard University, Boston, MA.

Maher, K. J. (1997). Gender-related stereotypes of transformational leadership. Sex Roles, 37, 209-225.

Mathena, K. A. (2002). Nursing manager leadership skills. *Journal of Nursing Administration, 32, 136-142.*

McGuire, E., & Kennerly, S. (2006). Nurse managers as transformational and transactional leaders. *Nursing Economics, 24(4).*

McNeese-Smith, D. (1999). Job satisfaction, productivity and organizational commitment the result of leadership. *Journal of Nursing Administration, 25, pp. 17-26.*

Medley, F., & Larochelle, D. R. (1995). Transformational leadership and job satisfaction. *Nursing Management, 26(9).*

Moiden, N. (2002). Evolution of leadership in nursing. *Nursing Management Journal, 9(7).*

Moore, L. M., & Rickel, A. U. (1980). Characteristics of women in traditional and non-traditional managerial roles. *Personnel Psychology (33).*

Morrison, R., Jones, L., & Fuller, B. (1997). The relation between leadership style and empowerment on job satisfaction of nurses. *Journal of Nursing Administration, 27, pp. 27-34.*

Northouse, P. G. (2004). *Leadership theory and practice*. Thousand Oaks, CA: Sage Publications, Inc.

Nyberg, J. (1989a). *A caring approach in nursing administration.* University of Colorado Press, Niwot, CO.

O'Halloran, P., Martin, G., & Connolly, D. (2005). A model for developing, implementing and evaluating a strategy to improve nursing and midwifery care. *Practice Development in Health Care, 4(4).*

Ohlott, P. J., Ruderman, M. N., & McCauley, C. D. (1994). Gender differences in managers' developmental job experiences. *Academy of Management Journal, 37(1).*

Peters, S., Kinsey, P., & Malloy, T. E. (2004). Gender and leadership perceptions among african americans. *Basic and Applied Social Psychology, 26(1).*

Quinn, R. E. (1988). *Beyond rational management*. San Francisco, CA: Jossey-Bass.

Rosener, J. B., McAllister, D. J., & Stephens, G. K. (1990*). Leadership study: international women's forum*. University of California, Irvine: UCI Graduate School of Management.

Rosentein, A. H., & O'Daniel, M. (2005). Disruptive behavior and clinical outcomes: perceptions of nurses and physicians. *American Journal of Nursing, 105, 54-64.*

Rozier, C. K. (1996). Nurse executive characteristics: gender differences. *Nursing Management, 27(12).*

Russell, J. E. A. (1983). Performance evaluations as a function of performer's gender, marital/family status, and job type. *Unpublished doctoral dissertation, University of Akron.*

Russell, J. E., & Rush, M. C. (1987). The effects of sex and marital/parental status on performance evaluations and attritions. *Sex Roles, 17 (3,4) .*

Sankelo, M., & Akerbald, L. (2008). Nurse entrepreneurs' attitudes to management, their adoption of the manager's role and managerial assertiveness. Journal of Nursing Management, 16(7), 829-836.

Sellgren, S. F., Ekvall, G., & Tomson, G. (2008). Leadership behaviour of nurse managers in relation to job satisfaction and work climate. *Journal of Nursing Management, 16, 578-587.*

Sheridan, J. E., Vredenburgh, D. J., & Abelson, M. A. (1984). Contextual model of leadership influence in hospital units. *Academy of Management Journal 27(1), pp. 57-58.*

Sin, H., Nahrgang, J. D., & Morgeson, F. P. (2009). Understanding why they don't see eye to eye: an examination of leader-member exchange (lmx) agreement. *Journal of Applied Psychology, 94(4), 1048-1057.*

Slavitt, D., Stamps P., Piedmont, E., & Hasse, A. (1986). Index of work satisfaction. *Ann Arbor, MI: University of Michigan Press.*

Smith, P., Kendall, L., & Hulin, C. (1969). *The measurement of satisfaction in work and retirement.* Chicago: Rand McNally.

Spreitzer, G., Kizilos, M., & Nason, S. (1997). A dimensional analysis of the relationship between psychological empowerment and effectiveness, satisfaction, and strain. *Journal of Management*, 23(5), 679-704.

Stodgill, R. M. (1963). *Manual for the leader behavior description questionnaire form xii*. Columbus: Ohio State University, Bureau of Business Research.

Taylor, C. (2002). Assessing patients' needs: does the same information guide expert and novice nurses? *International Nursing Review, 49(1), 11-19.*

Templer, A. J. (1973). Self-perceived and others-perceived leadership style using the leader behavior description questionnaire. *Personnel Psychology 26, 359-367.*

Van Velsor, E., Taylor, S., & Leslie, J. B. (1993). An examination of the relationships among self-perception accuracy, self-awareness, gender, and leader effectiveness. *Human Resource Management*, 32(2-3).

Vandenberghe, C., Stordeur, S., & D'hoore, W. (2002). Transactional and transformational leadership in nursing: structural validity and substantive relationships. *European Journal of Psychological Assessment, 18(1) pp. 16-29.*

Vecchio, R. P., & Norris, W. R. (1996). Predicting` employee turnover from performance, satisfaction and leader-member exchange. *Journal of Business and Psychology, 11(1).*

Wade, G. H., Osgood, B., Avino, K., Bucher, G., Bucher, L., Foraker, T., French, D., & Sirkowski, C. (2008). Influence of organizational characteristics and caring attributes of managers on nurses' job enjoyment. *Journal of*

Advanced Nursing 64(4), pp. 344-353.

Waldman, D. A., Ramirez, G. G., House, R. J., & Puranam, P. (2001). Does leadership matter? CEO leadership attributes and profitability under conditions of perceived environmental uncertainty. *Academy of Management Journal 44(1) pp. 134-43.*

Weiss, D., Dawis, R. V., England, G. W., & Lofguist, L. H. (1964). *Minnesota Studies in Vocational Rehabilitation, 41, 1-75.*

APPENDICES

APPENDIX A: KSC Approval Letter

Kelsey-Seybold Clinic

Your Doctors for Life

Information Systems • 8275 El Rio, Suite 180 • Houston , Texas 77054

February 12, 2010

Our Lady of the Lake University
411 S.W. 24th St.
San Antonio, TX 78207

Attn: Professor Mark T. Green/Leadership Studies

This letter is presented to document that Selena Guillory (Sibley) has received permission to conduct research for her dissertation on the subject of leadership styles. Selena has presented the proposed research questions and method to the appropriate parties within Kelsey-Seybold and has received permission to proceed with her work upon receiving the approved IRB form from the university.

Regards,

Martin Littmann
Director, Information Technology Systems
Kelsey-Seybold Clinic
Your Doctors For Life.
Office: 713-442-9977
cell: 832-865-6837
email: martin.littmann@kelsey-seybold.com

APPENDIX B: KSC Approval Letter from HR

Kelsey-Seybold Clinic
St. Luke's Episcopal Health System

Administrative Business Center
8300 Lakes At 610 Drive
Houston Texas 77054

TO: Our Lady of the Lake University Institutional Review Board

FROM: Kay J. Moore, Director Human Resource Services

RE: Leadership Study for Dissertation Requirement

DATE: July 15, 2010

This memorandum is to inform you that Selena Guillory (Sibley), Change Control Administrator at Kelsey-Seybold Clinic (KSC), has the permission of the organization to conduct her research study on nurse managers, clinical nurse leaders and staff nurses of KSC to meet the requirements of her dissertation. Selena is a Ph.D. candidate in the Leadership Studies program at your institution.

Selena's proposed study will examine the relationships between the leadership styles of nurse managers and the leadership style adopted by their clinical nurse leaders (CNLs) and nursing staff. She will be administering two survey instruments to a group of nurse managers, clinical nurse leaders and staff nurses selected from a list of clinical staff provided to her by the HR department. Participants taking part in this study will be provided with an informed consent form prior to participating.

If you need additional information, please contact me at 713-442-4940.

APPENDIX C: Consent Form

Consent Form

A Study To Examine The Relationships Between The Leadership Styles Of Nurse Managers And The Leadership Style Adopted By Their Clinical Nurse Leaders (Cnls) And Nursing Staff

You are invited to take part in this research study. The information in this form is meant to help you decide whether or not to take part. If you have any questions, please do not hesitate to ask.

The purpose of this study is three-fold. First, it will examine the leadership style of nurse managers and the clinical nurse leaders (CNLs) to determine whether or not the CNLs adopt their manager's leadership style. Second, it will examine the leadership behaviors of the nurses working under the CNLs' guidance in an effort to determine whether or not the CNLs' leadership style affects the leadership behaviors of the nurses. Third, it will investigate if gender plays a part in the leadership styles assessed in this study. The researcher will provide you with a packet containing a demographic profile and the Multifactor Leadership Questionnaire (MLQ) 5X short form and/or the Leadership Behavior Description Questionnaire (LBDQ) XII-Self survey instrument(s). Packets given to clinical nurse leaders will contain a demographic profile and the MLQ 5X short form. Packets given to nurses will contain a demographic profile, the MLQ 5X short form and the LBDQ XII-Self.

If you agree to participate in this research study, you will need to complete a combination of the following:

1) The Multifactor Leadership Questionnaire (MLQ-5X Short) form (approximately 15 minutes)
2) The LBDQ XII-Self Form (approximately 15 minutes)
3) The Leadership Demographic Profile form (approximately 5 minutes)

There is no cost to you to participate in this research study. There are no known risks to you and you are not expected to get any benefit from being in this research study. However, the results of this study will provide additional useful information to the vast amount of literature already available on leadership and leadership styles.

Your participation in this study is completely voluntary. If you choose to participate, you can stop your participation at any time without being penalized.

The data collected in this study is anonymous. This means that no identifying information will be recorded during this study. There is no way to connect your identity with any of your responses. Surveys will be compiled numerically (i.e., nurse leader/nurse 1, 2, 3 etc.).

If you have any questions or concerns, please contact:

Researcher: Selena Guillory Sibley	Faculty Advisor: Meghan Carmody-Bubb, Ph.D.
Email: anelesyelbis@yahoo.com	Email: macarmody-bubb@lake.ollusa.edu
Phone: (713) 817-0357	Phone: (210) 434-6711

This study has been approved by the Our Lady of the Lake University Institutional Review Board. If you have any questions regarding your rights as a participant, you can contact the researcher or you can contact Our Lady of the Lake Institutional Review Board (IRB) at (210) 434-6711 or email Dr. Cynthia Gonzalez at cgonzalez1@lake.ollusa.edu.

Your signature on this form indicates that you understand the information indicates that you understand the information provided to you about participation in this research study and that you freely agree to participate. You will be given a signed copy of this form to keep and the researcher will keep a signed copy.

_____

Participant's Printed Name

_____

Participant's Signature Date

_____

Researcher's Printed Name

_____

Researcher's Signature Date

APPENDIX D: IRB Approval Letter

S. Harris

OUR LADY OF THE LAKE UNIVERSITY

Psychology Department 411 SW 24th Street San Antonio, TX 78207 210-431-3

NOTICE OF APPROVAL TO BEGIN RESEARCH

Approved ____ at a Convened Meeting ✓ by Expedited Review & Approval

Approval Date: 7/21/2010 Expiration Date: 7/21/2011

Provisions: Please read below.

Upon receipt of this letter, and subject to any provisions listed above, you may now begin this research. This approval, contingent upon compliance with the following stipulations, will expire as noted above.

CHANGES—The P.I. must receive approval from the IRB before initiating any changes, including those required by the sponsor, which would affect human subjects. Such changes include changes in methods or procedures, numbers or kinds of human subjects, or revisions to the informed consent document or process. In addition, co-investigators must also receive approval from the IRB. In addition, the P.I. will notify the IRB as to the disposition of the research upon leaving the institution.

UNANTICIPATED RISK OR HARM, OR ADVERSE DRUG REACTIONS – The P.I will immediately inform the IRB of any unanticipated problems involving risks to subjects or others, of any serious harm to subjects, and of any adverse drug reactions. For applicable research, this notification may be accomplished by sending copies of reports filed with the sponsor/the FDA.

RECORDS—The P.I. will maintain adequate records, including signed consent documents if required, in a manner with ensures confidentiality. With the exception of review by such Federal agencies as HHS or the FDA, IRB policy relating the maintenance of subject confidentiality will be followed during any monitoring/verification of data by an outside agency or sponsor. Such records may also be used during any necessary internal investigation.

SUBSEQUENT REVIEW—The P.I will respond promptly to IRB review request, which will occur prior to the expiration date noted above.

Copy: ____ Sponsored Programs Office

Cynthia G. Gonzales, Ph.D.
IRB MEMBER SIGNATURE

APPENDIX E: Demographic Profile

Demographic Profile

1. Position held: ☐ Nurse Manager ☐ Nurse
2. Ethnicity: ☐ Caucasian ☐ African American ☐ Hispanic/Latina
   ☐ American Indian ☐ Other (Please specify): _____
3. Gender: ☐ Male ☐ Female
4. Age: _____
   a. Age (As of January 1, 2010): _____
5. Marital Status: ☐ Single ☐ Married ☐ Divorced ☐ Widowed
6. Time in current position as of January 1, 2010: ☐ Less than one year ☐ 1-3 years
   ☐ 4-6 years ☐ 7-10 years ☐ Greater than 10 years
7. Number of years in the nursing profession as of January 1, 2010: _____
8. Highest level of education: ☐ 2-year degree ☐ 4-year degree
   ☐ Graduate school ☐ Professional certificate
9. How many children do you have? _____
   a. If applicable, list age(s) of child(ren): _____
10. Are you the primary caregiver for anyone other than your child(ren)? ☐ Yes ☐ No
    If yes, please select one: ☐ Parent(s) ☐ Relative ☐ Spouse ☐ Other

APPENDIX F: MLQ 5X-Short Form

Multifactor Leadership Questionnaire
Leader Form

My Name: _____ Date: _____

Organization ID #: _____ Leader ID #: _____

This questionnaire is to describe your leadership style as you perceive it. Please answer all items on this answer sheet. If an item is irrelevant, or if you are unsure or do not know the answer, leave the answer blank.

Forty-five descriptive statements are listed on the following pages. Judge how frequently each statement fits you. The word "others" may mean your peers, clients, direct reports, supervisors, and/or all of these individuals.

Use the following rating scale:

Not at all	Once in a while	Sometimes	Fairly often	Frequently, if not always
0	1	2	3	4

1.	I provide others with assistance in exchange for their efforts	0	1	2	3	4
2.	I re-examine critical assumptions to question whether they are appropriate	0	1	2	3	4
3.	I fail to interfere until problems become serious	0	1	2	3	4
4.	I focus attention on irregularities, mistakes, exceptions, and deviations from standards	0	1	2	3	4
5.	I avoid getting involved when important issues arise	0	1	2	3	4
6.	I talk about my most important values and beliefs	0	1	2	3	4
7.	I am absent when needed	0	1	2	3	4
8.	I seek different perspectives when solving problems	0	1	2	3	4
9.	I talk optimistically about the future	0	1	2	3	4
10.	I instill pride in others for being associated with me	0	1	2	3	4
11.	I discuss in specific terms who is responsible for achieving performance targets	0	1	2	3	4
12.	I wait for things to go wrong before taking action	0	1	2	3	4
13.	I talk enthusiastically about what needs to be accomplished	0	1	2	3	4
14.	I specify the importance of having a strong sense of purpose	0	1	2	3	4
15.	I spend time teaching and coaching	0	1	2	3	4

Continued →

Not at all	Once in a while	Sometimes	Fairly often	Frequently, if not always
0	1	2	3	4

15. I make clear what one can expect to receive when performance goals are achieved. 0 1 2 3 4
17. I show that I am a firm believer in "If it ain't broke, don't fix it." 0 1 2 3 4
18. I go beyond self-interest for the good of the group 0 1 2 3 4
19. I treat others as individuals rather than just as a member of a group 0 1 2 3 4
20. I demonstrate that problems must become chronic before I take action 0 1 2 3 4
21. I act in ways that build others' respect for me 0 1 2 3 4
22. I concentrate my full attention on dealing with mistakes, complaints, and failures 0 1 2 3 4
23. I consider the moral and ethical consequences of decisions 0 1 2 3 4
24. I keep track of all mistakes 0 1 2 3 4
25. I display a sense of power and confidence 0 1 2 3 4
26. I articulate a compelling vision of the future 0 1 2 3 4
27. I direct my attention toward failures to meet standards 0 1 2 3 4
28. I avoid making decisions 0 1 2 3 4
29. I consider an individual as having different needs, abilities, and aspirations from others 0 1 2 3 4
30. I get others to look at problems from many different angles 0 1 2 3 4
31. I help others to develop their strengths 0 1 2 3 4
32. I suggest new ways of looking at how to complete assignments 0 1 2 3 4
33. I delay responding to urgent questions 0 1 2 3 4
34. I emphasize the importance of having a collective sense of mission 0 1 2 3 4
35. I express satisfaction when others meet expectations 0 1 2 3 4
36. I express confidence that goals will be achieved 0 1 2 3 4
37. I am effective in meeting others' job-related needs 0 1 2 3 4
38. I use methods of leadership that are satisfying 0 1 2 3 4
39. I get others to do more than they expected to do 0 1 2 3 4
40. I am effective in representing others to higher authority 0 1 2 3 4
41. I work with others in a satisfactory way 0 1 2 3 4
42. I heighten others' desire to succeed 0 1 2 3 4
43. I am effective in meeting organizational requirements 0 1 2 3 4
44. I increase others' willingness to try harder 0 1 2 3 4
45. I lead a group that is effective 0 1 2 3 4

APPENDIX G: LBDQ-XII

LEADER BEHAVIOR DESCRIPTION QUESTIONNAIRE – Form XII Self

Originated by staff members of
The Ohio State Leadership Studies
And revised by
Bureau of Business Research

On the following pages is a list of items that may be used to describe how you behave as a leader. This is not a test of ability It simply asks you to describe as accurately as you can, how you behave as a leader of the group that you supervise

Note The term, "*group*" as employed in the following items, refers to a department, division, unit or collection of peoples that you supervise

The term "*members*" refers to all the people in the unit that you supervise.

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DIRECTIONS:

a. READ each item carefully.
b. THINK about how frequently you engage in the behavior described by the item.
c. DECIDE whether you (A) Always (B) Often, (C) Occasionaly, (D) Seldom or (E) Never act as described by the item.
d. DRAW A CIRCLE around one of the five letters (A B C D E) following the item to show the answer you selected.

A = Always
B = Often
C = Occasionaly
D = Seldom
E = Never

e MARK your answers as shown in the examples below.

Example: Often acts as described A (B) C D E

Example: Never acts as described A B C D (E)

Example: Occasionally acts as described A B (C) D E

---

1. I act as the spokesman of the group. A B C D E
2. I wait patiently for the results of a decision A B C D E
3. I make pep talks to stimulate the group A B C D E
4 I let group members know what is expected of them A B C D E
5. I allow the members complete freedom in their work A B C D E
6 I am hesitant about taking initiative in the group A B C D E
7. I am friendly and approachable A B C D E
8 I encourage overtime work A B C D E
9 I make accurate decisions A B C D E
10 I get along well with the people above me A B C D E
11 I publicize the activities of the group A B C D E
12. I become anxious when I cannot find out what is coming next A B C D E

13. My arguments are convincing	A	B	C	D	E
14. I encourage the use of uniform procedures	A	B	C	D	E
15. I permit the members to use their own judgment in solving problems	A	B	C	D	E
16. I fail to take necessary actions	A	B	C	D	E
17. I do little things to make it pleasant to be a member of the group	A	B	C	D	E
18. I stress being ahead of competing groups	A	B	C	D	E
19. I keep the group working together as a team	A	B	C	D	E
20. I keep the group in good standing with higher authority	A	B	C	D	E
21. I speak as a representative of the group	A	B	C	D	E
22. I accept defeat in stride	A	B	C	D	E
23. I argue persuasively for my point of view	A	B	C	D	E
24. I try out my ideas in the group	A	B	C	D	E
25. I encourage initiative in the group members	A	B	C	D	E
26. I let others persons take away my leadership in the group	A	B	C	D	E
27 I put suggestions made by the group into operation	A	B	C	D	E
28. I needle members for greater effort	A	B	C	D	E
29. I am able to predict what is coming next	A	B	C	D	E
30. I am working hard for a promotion	A	B	C	D	E
31. I speak for the group when visitors are present	A	B	C	D	E
32. I accept delays without becoming upset	A	B	C	D	E
33. I am a very persuasive talker	A	B	C	D	E
34. I make my attitudes clear to the group	A	B	C	D	E
35. I let the members do their work the way they think best	A	B	C	D	E

36. I let some members take advantage of me	A	B	C	D	E
37. I treat all group members as my equals	A	B	C	D	E
38. I keep the work moving at a rapid pace	A	B	C	D	E
39. I settle conflicts when they occur in the group	A	B	C	D	E
40. My superiors act favorably on most of my suggestions	A	B	C	D	E
41. I represent the group at outside meetings	A	B	C	D	E
42. I Become anxious when waiting for new developments	A	B	C	D	E
43. I am very skillful in an argument	A	B	C	D	E
44. I decide what shall be done and how it shall be done	A	B	C	D	E
45. I assign a task, then lets the members handle it	A	B	C	D	E
46 I am the leader of the group in name only	A	B	C	D	E
47 I give advance notice of changes	A	B	C	D	E
48. I push for increased production	A	B	C	D	E
49. Things usually turn out as I predict	A	B	C	D	E
50. I enjoy the privileges of my position	A	B	C	D	E
51. I handle complex problems efficiently	A	B	C	D	E
52. I am able to tolerate postponement and uncertainty	A	B	C	D	E
53. I am not be a very convincing talker	A	B	C	D	E
54. I assign group members to particular tasks	A	B	C	D	E
55. I turn the members loose on a job, and lets them go to it	A	B	C	D	E
56. I back down when I ought to stand firm	A	B	C	D	E
57. I keep to myself	A	B	C	D	E
58. I ask the members to work harder	A	B	C	D	E

59. I am accurate in predicting the trend of events	A	B	C	D	E
60. I get my superiors to act for the welfare of the group members	A	B	C	D	E
61. I get swamped by details	A	B	C	D	E
62. I can wait just so long, then blow up	A	B	C	D	E
63. I speak from a strong inner conviction	A	B	C	D	E
64 I make sure that my part in the group is understood by the group members	A	B	C	D	E
65. I am reluctant to allow the members any freedom of action	A	B	C	D	E
66. I let some members have authority that I should keep	A	B	C	D	E
67. I look out for the personal welfare of group members	A	B	C	D	E
68. I permit the members to take it easy in their work	A	B	C	D	E
69. I see to it that the work of the group is coordinated	A	B	C	D	E
70 My word carries weight with his superiors	A	B	C	D	E
71. I get things all tangled up	A	B	C	D	E
72. I remain calm when uncertain about coming events	A	B	C	D	E
73. I am an inspiring talker	A	B	C	D	E
74. I schedule the work to be done	A	B	C	D	E
75. I allow the group a high degree of initiative	A	B	C	D	E
76. I take full charge when emergencies arise	A	B	C	D	E
77. I am willing to make changes	A	B	C	D	E
78. I drive hard when here is a job to be done	A	B	C	D	E
79. I help group members settle their differences	A	B	C	D	E
80. I get what I ask for from my superiors	A	B	C	D	E

81. I can reduce a madhouse to system and order	A	B	C	D	E
82. I am able to delay action until the proper time occurs	A	B	C	D	E
83. I persuade others that my ideas are to their advantage	A	B	C	D	E
84. I maintain definite standards of performance	A	B	C	D	E
85. I trust the members to exercise good judgment	A	B	C	D	E
86. I overcome attempts made to challenge my leadership	A	B	C	D	E
87. I refuse to explain my actions	A	B	C	D	E
88. I urge the group to beat its previous record	A	B	C	D	E
89. I anticipate problems and plans for them	A	B	C	D	E
90. I am working my way to the top	A	B	C	D	E
91. I get confused when too many demands are made of me	A	B	C	D	E
92. I worry about the outcome of any new procedure	A	B	C	D	E
93. I can inspire enthusiasm for a project	A	B	C	D	E
94. I ask that group members to follow standard rules and regulations	A	B	C	D	E
95. I permit the group to set its own pace	A	B	C	D	E
96. I am easily recognized as the leader of the group	A	B	C	D	E
97. I act without consulting the group	A	B	C	D	E
98. I keep the group working up to capacity	A	B	C	D	E
99. I maintain a closely knit group	A	B	C	D	E
100. I maintain cordial relationship with superiors	A	B	C	D	E