### **Molloy College** DigitalCommons@Molloy

Theses & Dissertations

12-2015

## The Relationship Between New Nurses Who Volunteer and the Caring Behavior New Nurses Exhibit in the Practice Setting, One Year Post Graduation

Nicolette Fiore-Lopez

This research was completed as part of the degree requirements for the Nursing Department at Molloy College.

Follow this and additional works at: https://digitalcommons.molloy.edu/etd



Part of the Other Nursing Commons

This Dissertation has All Rights Reserved. DigitalCommons@Molloy Feedback

#### Recommended Citation

Fiore-Lopez, Nicolette, "The Relationship Between New Nurses Who Volunteer and the Caring Behavior New Nurses Exhibit in the Practice Setting, One Year Post Graduation" (2015). Theses & Dissertations. 27. https://digitalcommons.molloy.edu/etd/27

This Dissertation is brought to you for free and open access by Digital Commons@Molloy. It has been accepted for inclusion in Theses & Dissertations by an authorized administrator of DigitalCommons@Molloy. For more information, please contact tochtera@molloy.edu,thasin@molloy.edu.

The Relationship Between New Nurses Who Volunteer and the Caring Behavior New Nurses Exhibit in the Practice Setting, One Year Post Graduation

by

Nicolette Fiore-Lopez

Dissertation Committee:

Veronica D. Feeg, PhD, RN, FAAN, Chairperson

Patricia Eckardt, PhD, RN

Mary E. Fassetta, EdD, RN

Diane J. Mancino, EdD, RN, CAE, FAAN

Approved by the Committee

December 8, 2015

Submitted in partial fulfillment of the Requirements for the Degree of Doctor of Philosophy

Molloy College

© Copyright 2015 Nicolette Fiore-Lopez

All Rights Reserved

#### MOLLOY COLLEGE

#### DIVISION OF NURSING

The dissertation of Nicolette Fiore-Lopez entitled THE RELATIONSHIP BETWEEN NEW NURSES WHO VOLUNTEER AND THE CARING BEHAVIOR NEW NURSES EXHIBIT IN THE PRACTICE SETTING, ONE YEAR POST GRADUATION in partial fulfillment of the requirements for the degree of Doctor of Philosophy in the Division of Nursing has been read and approved by the committee:

Veronica D. Feeg, PhD, RN, RAAN Chair Molloy College

Mary Fassetta, EdD, RN Molloy College

Patricia Eckardt, PhD, RN Molloy College

Diane Manoino, EdD, RN, CAE, FAAN National Student Nurses Association

Veronica D. Feeg, PhD, RN, NAAN
Associate Dean and Director
PhD Program in Nursing

Date: December 8,2015

#### **Abstract**

The Relationship Between New Nurses Who Volunteer and the Caring Behavior New Nurses Exhibit in the Practice Setting, One Year Post Graduation

by

#### Nicolette Fiore-Lopez, PhD(c), RN, CNEP

Volunteering is engaged in by millions world-wide and nurses comprise a significant portion of those who provide their professional talents, unpaid, to the underserved in local, national and international efforts. Nurses who have engaged in volunteer activities anecdotally describe personally transforming experiences gained through their efforts and for many nurses volunteeringbecomes part of their professional mandate. Although many social disciplines have studied volunteering, to date there has been a paucity of research on nurses who volunteer. The purpose of this study was to describe the characteristics of novice nurses who volunteer and determine the influence of volunteering and associated characteristics on their self-reported caring behaviors and their satisfaction with career choice.

This was a quantitative survey study with several open-ended questions. A descriptive, correlational design was used to determine the effect of spirituality, altruism and prosocialness on nurse volunteerism and how volunteerism mediates caring behavior and satisfaction with career choice in the new nurse.

Those in the final data set were mainly young, White non-Hispanic female novice nurses who attained baccalaureate degrees as their basic nursing education (n= 1023). Nearlytwo thirds of respondents reported as having volunteered and mostly at the local level. Significant findings include that volunteering is positively influenced by participation in non-school related, voluntary volunteer activity and negatively influenced by required volunteer activity. Caring behavior was positively influenced by local volunteer activity that was non-school related,

voluntary volunteer activity. Volunteering did not influence satisfaction with career choice, although the measurement tool did not yield adequate internal consistency and reliability. Spirituality, altruism and prosocialness were each positively correlated with caring behavior and satisfaction with career choice. Volunteerism in nursing was not found to mediate the relationship between spirituality, altruism and prosocialness and either caring behavior or satisfaction with career choice.

The sixth Caritas Process of Watson's Theory of Transpersonal Caring (2012) requires the creative use of self. The findings of this study reveal that the novice nurse who engages in purely voluntary volunteer activity may be able to nurture caring behaviors through that interaction. Education may need to revisit how undergraduate service learning is done. Practice should not only consider previous volunteer experience of prospective RN staff but also provide ongoing opportunities to engage in volunteer activities. Further research should focus on other outcome variables of volunteering in nursing such as job satisfaction, career mobility and mentoring.

#### **ACKNOWLEDGEMENTS**

I would like to acknowledge all of those who made the completion of this dissertation possible. This includes my family, my colleagues at work and in the 2010 PhD cohort, and my Dissertation Committee. This would not have been possible without them. You have each provided unwavering support as I have moved forward with this Program.

My husband and my children have each contributed in their own way to making this journey easier as they have allowed the necessary quiet time needed to formulate my thoughts and write.

My colleagues at work have been supportive and granted me minimal interruption during my time off so I could complete the writing of this document.

My colleagues in the 2010 PhD cohort have been a wonderful group to get to know professionally and personally. We will continue our journey together, regardless of where our paths may lead.

And, finally my Dissertation Committee has been there for me throughout this writing, always available for emails, phone calls and other electronic communications. I was truly blessed to have been able to choose each of you as part of my Committee. I would like to especially thank Dr. Feeg for her patience, guidance and support throughout the entire program.

## The Relationship Between New Nurses Who Volunteer and the Caring Behavior New Nurses Exhibit in the Practice Setting, One Year Post Graduation

Contents Chapter 1: Introduction	12
•	
Background to the Problem	
Gender and Age in Volunteering	
Volunteering Commitment and Retention	15
Volunteering and Impact on Families	17
Research on the Volunteer	18
Volunteering and Prosocial Behavior	19
Volunteerism, Altruism, and Religiosity	20
Research on Volunteerism in Health Care	21
Statement of the Problem	24
Purpose of the Study	25
Significance of the Study	26
Theoretical Framework	26
Research Questions	28
Definition of Terms	29
Summary	30
Chapter 2: Review of the Literature	32
Introduction	32
Literature Review	32
Theoretical Framework: Watson's Human Caring Science	32
Figure A. Nurse Volunteer Model	36
Volunteerism	36
Summary of Review	67
Chapter 3: Methods	71
Introduction	71
Research Design	71
Population of the Study	73
Table 1.New Graduates Who Entered Nursing School with Previous Degrees and Certifications	74

Table 2.Employment 4 Months Post-Graduation, by Nursing Program	74
Table 3.Percentage of New Graduates Employed 4 Months Post-Graduation	75
(2009-2012), by Region	75
Sampling	77
The Sample	78
Instrumentation and Operational Definitions of Research Variables	79
Independent Variables	80
Mediating Variable: Volunteerism	87
Dependent Variables	88
Data Collection	91
Ethical Considerations	91
Category of Review	91
Consent	91
Data Preparation	92
Planned Analysis	92
Procedure for Answering Research Questions	93
Chapter 4: Results	99
Introduction	99
General Description of Data	99
Sample Characteristics	99
Table 4. Sample Characteristics	102
Reliability of the Measurement Instruments	105
Table 5. Reliability of the Measurement Instruments	106
Descriptive Correlational Study (Descriptive Questions)	106
Self-Report Altruistic (SRA) Scale	106
Prosocialness Scale for Adults	107
Spiritual Transcendence Index (STI)	107
Nyberg Caring Assessment Scale	107
Satisfaction with Career Choice (derived)	108
Table 6. Descriptive Statistics for Measurement Instruments	109
Answering the Research Questions	109
What are the influencing characteristics of new nurses who volunteer?	109

Table 7. Correlation Coefficients between the Variables: Ever Volunteer, Gender, Age and Birth Order
Table 8.Correlation Coefficients between the Variables: Ever Volunteer, Level of Basic Nursing Education
Table 9. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer, Present Enrollment in School by Program
Table 10. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer, School: Part Time or Full Time, Caretaking Responsibilities
Table 11. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer and Marital Status
Table 12. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer, Buddhist, Jewish, Muslim, Protestant
Table 13. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer, Roman Catholic, Non-Affiliated, Other, Multiple, Actively Practicing
Table 14. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer and Race
Table 15. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer and Employment Status
Table 16. Pearson's Correlation Coefficients between the Variables: Longevity Volunteer, Spirituality, Altruism, Prosocialness
Table 17. Correlation Coefficients (Phi Coefficients) between the Variables: Longevity Volunteer, School-related/Course-Required, School-related/Voluntary, Not School-related/Voluntary
What are the influencing characteristics of new nurses who volunteer? Summary of findings 117
How do volunteer experiences in school and professionally influence the new nurse's caring behaviors in practice, at least one year post graduation?
Table 18. Correlation Coefficients (Point Biserial) between the Variables: Nyberg Caring Assessment Scale (NCAS), School-Related/Required (SR/R), School-Related/Voluntary (SR/V), Not School-Related/Voluntary (NSR/V)
Table 19. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Local Volunteering, National Volunteering, International Volunteering
How do volunteer experiences in school and professionally influence the new nurse's caring behaviors in practice, at least one year post graduation? Summary of findings
Does volunteer experience in school and professionally influence the new nurse's self-report of satisfaction with career choice, at least one year post graduation?122
Table 20. Point Biserial Correlation Coefficients between the Variables: Satisfaction with Career Choice (SCC), School-Related/Required (SR/R), School-Related/Voluntary (SR/V), Not School-Related/Voluntary (NSR/V)

Table 21. Point Biserial Correlation Coefficients between the Variables: Satisfaction with Career Choice (SCC), Local Volunteering, National Volunteering, International Volunteering
Does volunteer experience in school and professionally influence the new nurse's self-report of satisfaction with career choice, at least one year post graduation? A summary of findings124
What are the determinants of caring behavior in the new nurse, at least one year post graduation? 125
Table 22. Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Gender, Age and Birth Order
Table 23. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Level of Basic Nursing Education
Table 24. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Present Enrollment in School by Program
Table 25. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), School: Part Time or Full Time, Caretaking Responsibilities
Table 26. Point Biserial Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS) and Marital Status
Table 27. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Buddhist, Jewish, Muslim, Protestant
Table 28. Point Biserial Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Roman Catholic, Non-Affiliated, Other, Multiple, Actively Practicing
Table 29. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS) and Race
Table 30. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS) and Employment Status
Table 31. Pearson's Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Spirituality, Altruism, Prosocialness
What are the determinants of caring behavior in the new nurse, at least one year post graduation? A summary of findings
Do internal characteristics such as spirituality, altruism or prosocialness predict satisfaction with career choice in the new nurse, at least one year post graduation?
Table 32. Pearson's Correlation Coefficients between the Variables: Satisfaction with Career Choice (SCC), Spirituality, Altruism, Prosocialness
Do internal characteristics such as spirituality, altruism or prosocialness predict satisfaction with career choice in the new nurse, at least one year post graduation? A summary of findings132
Are internal characteristics such as spirituality, altruism or prosocialness and select demographic variables, combined with volunteering experience, predictive of caring behaviors and satisfaction with career choice in the new nurse, at least one year post graduation?
Table 35. Regression Coefficients for Internal Characteristics and Their Effects on Caring Behavior 134

Table 34. Regression Coefficients for Internal Characteristics and Their Effects on Volunteer A	•
Figure B. Path Model: Caring Behaviors	
Table 35. Direct and Indirect Effects of Altruism, Prosocialness and Spirituality on Volunteeris Caring Behavior	sm and
Table 36. Regression Coefficients for Internal Characteristics and Their Effects on Satisfaction Career Choice	n with
Figure C. Path Model: Satisfaction with Career Choice	137
Table 37. Direct and Indirect Effects of Altruism, Prosocialness and Spirituality on Volunteeris Satisfaction with Career Choice	
Table 38. Effects of Selected Demographics on the Caring Behavior Model	138
Table 39. Effects of Selected External Opportunities on the Caring Behavior Model	139
Table 40. Effects of Selected External Opportunities on the Satisfaction with Career Choice M	odel . 140
Summary of Findings	141
Sample Characteristics	141
Reliability of the Instruments and Descriptive Results of the Variables	142
Answering the Research Questions	142
What are the influencing characteristics of new nurses who volunteer?	142
How do volunteer experiences in school and professionally influence the new nurse's caring behavior in practice, at least one year post graduation?	•
Does volunteer experience in school and professionally influence the new nurse's self-report satisfaction with career choice, at least one year post graduation?	
What are the determinants of caring behavior in the new nurse, at least one year post gradua	tion 143
Do internal characteristics such as spirituality, altruism or prosocialness predict satisfaction career choice in the new nurse, at least one year post graduation?	
Are internal characteristics such as spirituality, altruism or prosocialness and select demogration variables, combined with volunteering experience, predictive of caring behaviors and satisfative with career choice in the new nurse, at least one year post graduation?	action
hapter 5: Discussion	145
Introduction	145
Discussion of Findings	145
Sample	146
Research Questions	146
Watson's Transpersonal Caring Relationship	159

Co	onclusions	160
,	Study Findings	160
-	Tools	161
(	Contribution to the Science	162
Re	commendations	162
]	Education	163
]	Practice	163
]	Research	163
Lir	mitations	163
Su	mmary	165
Perm	issions	189
1.	Spiritual Transcendence Index	189
2.	Altruism	190
3.	Prosocialness	193
A.	Institutional Review Board	194
B.	Consent	195
C.	Demographic Questionnaire	196
D.	Spiritual Transcendence Index	199
E.	Self-Report Altruism Scale	200
F.	Prosocialness Scale for Adults	202
G.	Questionnaire on Volunteering	203
H.	Nyberg Caring Assessment Scale	205
I.	Satisfaction with Career Choice Questionnaire	206
J.	Data	207

#### **Chapter 1: Introduction**

#### **Background to the Problem**

Volunteering is a social phenomenon that calls into question what motivates individuals to work without pay and, in some cases, risk their lives or safety. Often, there are few if any monetary rewards. Wilson (2000) describes volunteering as part of a general cluster of helping activities and distinguishes it from spontaneous helping in that "volunteerism is typically proactive rather than reactive and entails some commitment of time and effort" (p.216). Volunteers are found contributing their unpaid activities locally, nationally and internationally. In all three arenas, volunteers work in diverse areas. Locally, volunteers can be seen as coaches of little leagues, as firefighters and emergency medical technicians, and as community health workers. One of the most recognizable national disaster relief organizations, the American Red Cross, depends on the work of thousands of volunteers to be able to deliver support and assistance in difficult times (Rozario, 2003). International volunteer activities vary widely: workers may be found responding to natural disasters such as the aftermath of the 2010 earthquake inHaiti(Miller, 2010);increasing education in developing countries through such programs as World Teach (Lough, McBride, & Sherraden, 2009); or participating in organized college-level teaching assistant experiences in Tanzania and Viet Nam (Jones, 2005).

Nurses are a large part of the community, national and international efforts to provide cost-free healthcare to the underserved. The American Red Cross (Dalton, 2014) states that over 15,000 nurses are engaged in paid and unpaid positions providing direct services, teaching and developing courses, acting in management and supervisory roles, and functioning in leadership roles. Sigma Theta Tau International (n.d.) lists numerous website links for international nurse volunteer opportunities that includes Doctors without Borders and The Peace Corp. Anecdotally,

it has been observed that these can be transformative experiences for nurses who participate and yet there has been a dearth of either qualitative or quantitative research in this area. A profession should determine what motivates its members to provide unpaid professional services to the underserved, how the experience may affect the volunteer providing the service, and whether the effects are seen in the traditional workplace. The transformative experience may be that which encourages the volunteer to engage in repeated events and the experience may enhance areas of care, such as caring behavior.

#### Gender and Age in Volunteering

For the year ending September 2013, the most recent report from the Bureau of Labor Statistics (2014) indicates that about 62.6 million people volunteered through or for an organization at least once during the preceding year. The data indicate that differences exist for gender and age in the likelihood to volunteer: (a) women continue to volunteer at higher rates than men across all demographic groups; and (b) among the 25 and over age group, 39.8% of college graduates volunteered compared with much lower rates for high school graduates (16.7%) and those who did not complete high school (9%).

The Bureau of Labor Statistics (2014) also reports that most volunteers were involved with either one (71.3%) or two (19%) organizations. During this reporting period, the main organization in which volunteers participatedwas most frequently religious, followed by educational or youth service related and social or community service organizations. Older volunteers (42.9%) were more likely to volunteer for religious organizations than younger volunteers (26.8% of volunteers age 16 to 24). As would be expected, volunteers with children volunteered mainly for educational or youth service organizations (the assumption is that these volunteers are helping their own children) while those without children were more likely to

volunteer for other types of organizations. Research on volunteerism that focuses on demographics, types of volunteering opportunities, and outcomes for people served is abundant in the literature, but not as much is known about the antecedents of those who volunteer, the professional match between volunteers and volunteering organizations, and the changes that volunteers report about themselves as a result of the volunteer experience. Volunteering organizations have different missions, e.g., preventive health, health maintenance, disaster relief. It should be determined whether the volunteer is matched with his or her desired organization that makes it a difference on any change reported by the volunteer about themselves as a result of the experience.

#### **Volunteering Commitment and Retention**

Volunteer commitment and retention has been studied, particularly related to organizations whose missions depend on volunteers. For example, improving volunteer retention efforts in public library systems was the focus of a study conducted by Waters&Bortre(2012). The results of a survey of 471 volunteers in three library systems in three different states, representing different cultural and socio-economic communities, supported two organization theories that can improve the effectiveness of volunteer coordinator efforts as follows:(a) female volunteers evaluated their volunteering relationships with the library systems significantly higher for relationship commitment, trust and satisfaction; (b) males viewed the relationship more favorably in terms of distribution of power. A path analysis was run to determine which inclusion types impacted the relationship indicators and found the strongest predictors of female volunteers' future intentions to volunteer were group inclusion and overall participation in organizational events whereas the strongest predictors for male volunteers were inclusion in the organization's information network and participation in decision making. While gender predictors

were identified, this study did not explore the reasons why these gender differences exist.

Perhaps volunteering met the needs of females who sought inclusion and males who sought power.

In another example, mechanisms of ongoing commitment of volunteers in organizations have been studied in an effort to sustain the ranks of volunteers. Two studies explored organizational commitment in non-profit sport organizations. Bang, Ross, & Reio(2013) used job satisfaction as a mediator variable between valuesand affective commitment. They surveyed 214 participants who volunteered continuously in sport organizations longer than a year. Structural equation modeling resulted in three models that supported a partial mediation effect of volunteer motivation on affective behavior. The study results indicated that volunteers who are motivated by their values would be more satisfied with their volunteer experience and consequently more committed to the nonprofit sports organization. These findings contribute to understanding how motivational values help contribute to commitment. A significant limitation of this study was that the instrument used derived a major portion of its questions from a tool that was developed for paid employees. This brings into question the face validity of the tool and mismatch between the populations to be studied.

In asecond study on the commitment of sport volunteers by Engleberg, Zakus, Skinner, and Campbell (2012), measures of sport volunteer commitment were developed to be used in further studies. Based on research in both volunteer and paid settings, this study adapted measures of affective and normative commitment to three targets: the organization, the team of volunteers and the volunteer role. The measures were tested on 204 volunteers who were recruited from 52 Little Athletic Centers in Queensland, Australia. Using Partial Least Squares Regression (PLS), the proposed structure of the scale was evaluated; subsequently, in a second

stage, the scale was then evaluated for internal reliability. Results provided support for a two-dimensional model, affective and normative, within and across each of the targets of organizational, team and role commitment. Generalizability may be limited in this study in that it only involved one sport context, but the application of a two-dimensional model was new and may be appropriate to apply with other groups or settings. This can serve to help define the parameters of this nursing study that seeks to understand the underlying reasons for the volunteer's commitment to serve.

#### **Volunteering and Impact on Families**

The importance of the effects of volunteer activities on families has been studied as this affects whether volunteers can be committed to ongoing involvement. Cowlishaw, Evans, and McLennan(2010) studied volunteer emergency service workers and volunteer firefighters to determine the effect of work-family conflict and social support and found that work-related antecedents such as time invested in on-call and post-traumatic stress were linked to volunteer burnout and their partner's support for their volunteer work role did not immediately influence the volunteer's work-related stress. Efforts to ameliorate the negative effects of these antecedents such as time invested in on-call and post-traumatic stress is important to support the ongoing commitment of these trained volunteers. In fact, the work of Huynh, Xanthopoulou, and Winefield(2013)suggests that family and friend support may protect volunteer firefighters from burnout. The results of these two studies underscore the importance the support of family and friends for the volunteer.

There has been much research published that focus on volunteerism across the lifespan. For example, the findings of the study by McBride, Greenfield, Morrow-Howell, Lee, and McCrary(2012) indicated that the quality of volunteer management may facilitate volunteer

engagement in older volunteers. In contrast, Luping (2011) found three motivational categories for youth volunteer participation: (a) traditional motivation (focused on responsibility), (b) the modern motivation (focused on development) and (c) the postmodern motivation (focused on pleasure). The findings of Van Willigen (2000) suggested that differences in volunteer benefits across the life course may be influenced by the different types of volunteer activity engaged in by older adults and younger adults. It appears, then, that when efforts are made to enhance volunteer engagement and motivation, the age of the volunteer should be taken into consideration when matching the interest of the volunteer with the activity.

#### Research on the Volunteer

The effects of volunteering on the volunteer have been studied extensively by the social disciplines. Mellor, Hayashi, Firth, Stokes, Chambers and Cummins(2008)had over a thousand participants respond to a 97-item questionnaire that included measures of subjective well-being, perceived control, optimism, self-esteem and volunteerism as well as demographics. Through two different methods of mediation analysis, this study demonstrated that perceived control and optimism partially mediate the effect of volunteering on subjective well-being, while self-esteem did not.

In another study of the effects of volunteering on the volunteer, Omoto and Snyder (1995) were interested in what they termed as "sustained helping without obligation." They had a representative sample of volunteers of 116 who worked for a Midwestern AIDS service organization complete a survey instrument that assessed demographic characteristics, information about current and past volunteer service, and multiple-item measures of constructs at each stage of the volunteer process. Respondents were contacted at one year, 1½ years and 2½ years to assess their current status as an AIDS volunteer. Although 90% of respondents planned

to continue their volunteer work, only 54% of volunteers were active after a year and 16% of volunteers were still active after 2 ½ years. Omoto and Snyder (1995) found that those volunteers without social support had longer tenure as volunteers than those with social support and hypothesized that the volunteers without social support may be seeking to acquire what they lack through their volunteer efforts.

In a third study on volunteering and well-being, Thoits and Hewitt(2001) used two waves of panel data with a sample size of 2,681 to examine the relationships between community volunteer work and personal well-being. Their findings suggest that a typical volunteer has socioeconomic resources such as education, personality "goods" such as happiness, self-esteem, and low depression, and are socially integrated as active members of religious and other organized community groups. Thoits and Hewitt (2001) concluded that generally people with greater well-being invest more hours in volunteer work and volunteer work promotes positive well-being and social integration mediates the well-being-to-volunteer work relationship. The mixed findings of these groups of studies taken together suggest that it is not yet clear how the dynamics of the personal characteristics of the volunteer impact the results of volunteering. In professional disciplines such as nursing, how these internal characteristics affect the values and outward behaviors of the professional in subsequent activities is important to understand. If we are to continue to sustain the numbers of nurses who provide unpaid professional services to the underserved, understanding how these dynamics impact the results of volunteering may enable sponsoring organizations to develop volunteer support programs for their volunteers.

#### **Volunteering and Prosocial Behavior**

Carlo and Randall (2001) define prosocial behavior as behavior that benefits others and believe that understanding this behavior allows for a more positive perspective on human

behavior. They propose that the study of the mechanisms that underlie prosocial behaviors involves both the individual and social context in which the behaviors occur. In a series of four studies on prosocial behavior conducted by Weinstein and Ryan (2010), investigators offer further support for the association between volunteering and its positive influence on well-being:

- a) When participants reported helping for autonomous reasons, greater daily well-being was evident in study 1.
- b) In study 2, results showed that helping others may elicit higher well-being but only when the helping is autonomous.
- c) Study number 3 examined the impact of the helping act on the person being helped. This study demonstrated recipients of autonomous help derived similar benefits as the autonomous helpers, namely more positive affect, greater vitality and more self- esteem than did non-helpers or controlled helpers after the helping task.
- d) Finally, study 4 replicated previous results showing that motivation has marked impact on helpers' well-being and recipients' well-being results paralleled those of the helpers.

#### Volunteerism, Altruism, and Religiosity

Ji, Pendergraft, and Perry (2006) were interested in the influence of religion on altruistic belief and prosocial behavior. Their sample of sixth to twelfth grade students enrolled in schools affiliated with a conservative, evangelical Protestant church resulted in a final database of 11,481 respondents that were generally a representative sample of the larger population all sixth to twelfth grade students enrolled in schools affiliated with a conservative, evangelical Protestant church. Several findings are germane to the present study:

a) Those who scored high on extrinsic religiosity may be more sympathetic to those in need and this provides motivation to volunteer for altruistic work

b) The magnitude of positive effect of horizontal faith maturity ("love-thy-neighbor" faith) on altruism was greater than that of other religiosity variables and also resulted in an increase in prosocial behaviors

An unexpected finding that was discussed but not concluded by the authors was that although intrinsic religiosity, defined in the study as doctrinal orthodoxy, was positively associated with altruistic belief, it was inversely associated with altruistic behavior.

#### Research on Volunteerism in Health Care

Within the health care arena, a study on volunteering was conducted that examined the volunteer activities of healthcare executives (Weil, Kimball, & Lerner, 2010). Specifically, these authors were interested in determining the types of volunteer activities engaged in by health executives and how these executives thought the activities affected their career trajectories. The study employed an abbreviated version of the Volunteer Functions Inventory (Clary, Snyder, Ridge, Copeland, Stukas, Haugen, & Miene, 1998), a widely used instrument, and measured two additional motives for volunteering, enjoyment and team building, uncovered in the study by Allison, Okun, and Dutridge (2002). The study by Weil and colleagues (2010) found that most executives volunteer for a wide array of organizations with CEOs volunteering the most hours. Most respondents stated that they tried to contribute their workplace skills to the organizations for which they volunteer and an overwhelming majority felt that volunteering had a positive effect on their careers, and so may fulfill a personal need. Other study findings were specific to volunteer activities for the professional organization of this group: American College of Healthcare Executives (ACHE). Weil and colleagues (2010) concluded that nearly all healthcare executives engage in volunteer work and perform that work in civic and community organizations and that, predictably, more CEOs than senior or mid-level executives volunteer for

their ACHE. CEOs have more reasons to be actively involved in civic and community organizations, including required community and civic volunteer activity as part of the application for Fellow in the American College of Healthcare Executives (FACHE).

Nurse volunteerism has been the subject of editorials in professional journals.

Reeder(2001)tells of fulfilling her unstated commitment to volunteer as a nurse with the American Red Cross and going on to chair the local chapter in her hometown. Moore(2010) wrote of nurses who, when faced with life's tragedies, accept the challenges and do whatever it takes to make the situation better. The subject of nurse volunteerism was covered in a news section of a professional journal, *Primary Health*, where nurses were challenged to respond to a recruitment campaign by an international services organization and commit to work in the poorest countries of the world(Primary Health Care, 2011).

The literature is filled with first-hand, anecdotal accounts of nurses who volunteer. Rudden (2011) describes his experience of being the lead nurse for the Order of Malta (OMV). Rudden (2011) had only three months experience before making his first trip with the OMV, a pilgrimage to Lourdes, one of the activities that the OMV engages in regularly. Despite many challenges, including recruitment of an interdisciplinary staff, Rudden (2011) has continued to serve this group over the years, taking over as the head nurse in 2007, and leading the OMV to Haiti in 2010, six weeks after the earthquake. Rudden (2011) describes his volunteer activities as helping him maintain his love for the profession and appreciate the good that nurses achieve. Another nurse, Tuttas (2009) offers a unique perspective of how she combines travel nursing with volunteerism in the communities she visits. Foster (2011) shares the experiences and reflections of a faculty member who spent 5 months volunteering with faculty and students at a

university in Kenya and states "nursing in a diverse cultural context requires resilience, humility, and a deep respect for the people served" (p. 5).

The 2010 devastating earthquake in Haiti resulted in an outpouring of volunteer activities. The efforts of numerous nurse volunteers in post-earthquake Haiti have been chronicled in the literature. Mankamyer(2010) writes of her personal experiences in Haiti in an effort to prepare other and poses a series of questions to consider for those who may be interested in what she describes as a rewarding experience. Chally, Hernke, and Scaz(2010), three nurse executives from Florida, embarked upon a medical mission to pre-earthquake Haiti, when conditions were dire, even then. In sharing their story, Chally and colleagues (2010) reflected that of the many lessons the experience taught them, one of the more difficult was that not everyone could be helped. They returned with a desire to develop a long-term plan to address the medically underserved in Haiti. Miller (2010), who first went to Haiti as a medical volunteer in 2005, describes her experience returning to Haiti in 2010, five weeks after the earthquake. She described a repeated theme: to serve as a nurse on international medical missions, one needs to be able to move out of their comfort zone and work in areas of medical care delivery that may be unique to them. In addition, she shared her feelings of being challenged by this work and being part of something bigger than herself.

Volunteers are found in a variety of places performing a host of services for mostly grateful recipients. Typically, a volunteer is a college educated woman involved in at least one organization, usually religious (Colishaw et al., 2010; Ji et al., 2006; Waters & Bortre, 2002). There exists a wide range of studies on volunteers. Some describe volunteer motives, activities, and behaviors (Mellor et al., 2008; Omoto & Snyder; Thiots & Wilson, 2001). Other studies describe what is known in relation to some aspect of the volunteer and volunteering (Luping,

2011; Mc Bride, et al., 2012; Van Willigen (2000). Still others describe the organizations whose missions depend on volunteers (Bang et al., 2013; Engleberg et al., 2012). While there are some anecdotal reports in the nursing literature (Chally, et al., 2010; Foster, 2011; Mankamyer, 2010; Miller, 2010; Rudden, 2011; Tuttas, 2009), there are relatively few empirical studies in nursing that can help inform the profession about the benefits of what is described as a transformative experience—to have volunteered.

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

Within the field of nursing, there have been very few studies of nurse volunteers. Wilson, Lester, and Simson(2000)identified retired nurses and physicians through The National Directory of Free Clinics and administered in-depth telephone surveys to a total of 23 nurses and 31 physicians. This study investigated the characteristics, activities and problems of retired nurses and physicians volunteering in free clinics and determined that these two groups were a valuable option in aiding the underserved and meeting the burgeoning numbers who need this service. A study exclusive to nurse volunteers has not been conducted with the exception of one study of retired nurses(Cocca-Bates & Neal-Boylan, 2011). This qualitative, descriptive study used a convenience sample that was recruited from a group of retired RNs in Kansas that had begun a focused effort to provide volunteer nursing services locally. The strength of this study was the variability of the sample, except for race and gender. The findings of this study support that of past research on older adults, older adults are motivated by a desire to help others and to engage in social activities.

It is important to study why nurses engage in activity where they voluntarily lend their professional talents to serve the underserved. Many healthcare agencies and sponsoring organizations rely on this support that seems to have sustained itself over time. The mechanisms

by which this occurs need to be explored so that these individuals can be supported in their work and more individuals may join their ranks. Additionally, the effects of volunteering that may be seen in the volunteer and the effects in the volunteer when he or she returns to the work setting are worthy of exploration.

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

The purpose of the study is two-fold: (1) to describe the characteristics of nurses who volunteer early in their nursing career or during their education; and (2) to determine the influence of volunteering and associated nurse characteristics on the self-reported caring behaviors of novice nurses (one year following graduation) and their satisfaction with career choice. The relationship between external opportunities such as service learning on volunteering and the caring behaviors and reported satisfaction with career choicewill be examined in a national sample of new nurses, at least one year post graduation. In this age of increasingly technological health care, it is the nurse who is charged with preserving and advancing human caring (Watson, 2012), while "... cherishing the wholeness of human and humanity" (p. 37). Nurses who volunteertheir professional talents may report increased caring behaviors as a result of the experience.

The professional volunteer activity may be local, national or international experience and those effects will be explored in relation to caring behaviors and satisfaction with career choice. Internal characteristics of spirituality, altruism, and prosocialness will be measured to determine their relationship to volunteering. Demographic variables such as marital status and gender will be examined for those who volunteer and those who do not and the association of volunteering along with external opportunities reported such as service learning and intent to volunteer will be

examined in relation to the new nurses' self-report of caring behaviors and satisfaction with career choice.

#### **Significance of the Study**

Despite all of the anecdotal reports of practicing nurses volunteering their time locally, nationally and internationally, there has been very little research to date on their activities. It is important that research on volunteerism in nursing is conducted separately from the social sciences as the influences, traits and motives of a nurse volunteer may differ greatly from those studied in the other social disciplines. Nurses who volunteer bring to the experience their nursing knowledge and skill that can be used in the process of assisting others especially related to health and well-being and may result in innovative solutions to challenges faced. Anecdotally, nurses have been observed to continue their volunteer activities after their initial encounter and these encounters have been reported to result in unique effects for both the nurse and the recipient of the service. This study will explore this gap in the literature and provide implications for education, practice and research.

#### **Theoretical Framework**

The theoretical framework for this study will draw upon Jean Watson's Human Caring Science and the transpersonal caring relationship (Watson, 2012). The transpersonal relationship is a special kind of human care relationship, a connection with another person that places a high regard for the whole person and his or her being-in-the world. This relationship affects both the nurse and patient, and radiates out beyond the moment, connecting with the universal field of infinity to which we all belong and dwell; thus, the moment lives on (J. Watson, 2008).

"Human caring begins when the nurse enters into the life space or phenomenal field of another person, is able to detect the other person's condition of being (spirit, soul), feels the condition within him-or herself, and responds to the condition in such a way that the recipient has a release of subjective feelings and thoughts he or she had been longing to release" (Watson, 2012, p. 75).

The nurse and the person are each influenced by the relationship although Watson (2012) points out that there are those who have difficulty with the blurring of professional lines. It is in this "participation of the entire self, using every dimension of the person," (Watson, 2012, p. 77) where the nurse truly commits to the transpersonal relationship. It is this relationship where caring behaviors are developed and refined.

Watson (2012) provides a list of factors that support a transpersonal relationship and these factors will be postulated in this study as the basis for the role that nurse volunteerism may have in caring behaviors. First, the volunteer experience where the nurse uses his or her professional talents to assist those in need provides the nurse with an opportunity to make a moral commitment to protect and enhance human dignity, allowing the nurse to affirm the subjective, spiritual significance of the person. The developments that can and do occur in many nurse volunteer interactions are spontaneous and improvised, allowing for the authentic presence. These situations also allow the nurse volunteer to "assess and realize another's condition of being-with-the-world and to feel a human-to-human connection with another" (Watson, 2012, p. 76). Finally, the nurse brings her entire self to the volunteer interaction, his or her own life history and experiences that contribute to the personal growth and maturity of the nurse. The volunteer caring may enhance the nurse's sense of self and sense of commitment.

This study seeks to determine how Watson's theory of human caring may play an integral role in the experience of nurse volunteerism. The transpersonal relationship that develops between the nurse and the benefits derived from the volunteer experience will be explored in its

relationship to how the nurse experiences satisfaction with career choice and exhibits caring behavior in his or her paid job.

#### **Research Questions**

This study seeks to describe how volunteerism results from characteristics of the new nurse and influences subsequent caring behaviors and satisfaction with career choice. The following research questions will guide the study:

- 1. What are the influencing characteristics of new nurses who volunteer?
  - Are demographic characteristics related to volunteerism?
  - Are internal characteristics such as spirituality, altruism or prosocialness related to volunteering?
- 2. How do volunteer experiences in school and professionally influence the new nurse's caring behaviors in practice, at least one year post graduation?
- 3. Does volunteer experience in school or professionally influence the new nurse's selfreport of satisfaction with career choice, at least one year post graduation?
- 4. What are the determinants of caring behavior in the new nurse, at least one year post graduation?
  - Are demographic characteristics related to caring behaviors in the new nurse?
  - Are internal characteristics such as spirituality, altruism or prosocialness related to caring behaviors in the new nurse?
- 5. Do internal characteristics such as spirituality, altruism or prosocialness predict satisfaction with career choice in the new nurse, at least one year post graduation?
- 6. Are internal characteristics such as spirituality, altruism or prosocialness and select demographic variables, combined with volunteering experience, predictive of caring

behaviors and satisfaction with career choice in the new nurse, at least one year post graduation?

#### **Definition of Terms**

For the purpose of this study, several terms related to the subjects, activities, behaviors, perceptions and values will be used. The following are general, conceptual definitions of these terms that will each be operationalized through self-report questionnaires.

The new nurse: The new nurse, at least one year post graduation, referred to in this study will be new RNs who have mainly graduated in the spring and summer of 2012 and surveyed in January of 2014.

Nurse Volunteerism: Nurse Volunteerism will be defined as unpaid activity of nurses who engage in providing health care for underserved or underprivileged populations. There will be a distinction made among local, national and international nurse volunteer activities.

Spirituality: Spirituality will focus on perceived psychological effects of one's identified spirituality and not reference religion, per se (Seidlitz, Abernethy, Duberstein, Evinger, Chang, & Lewis, 2002).

Altruism: Altruism concerns itself with those that are seen as being consistently more generous, helping and kind than others (Rushton, Chrisjohn, & Fekken, 1981). Rushton and colleagues (1981) argue that altruism is a trait where people not only act in this consistentway but are readily perceived this way, making it possible to directly measure through self-report questionnaires.

<u>Prosocialness:</u>Caprara, Steca, Zelli, & Capanna, 2005, p. 77) define prosocialness as "the set of voluntary actions one may adopt to help, take care of, assist, or comfort others." Although this type of responding becomes stable during late childhood and early adolescence, prosocial

behavior in adulthood may be of particular importance as this capacity may increase the likelihood of overcoming the challenge of fulfilling personal needs as during later stages of life (Eisenberg, Carlo, Murphy, & van Court, 2002).

Satisfaction with Career Choice: Satisfaction with career choice will be defined as the RNs affective reaction to the career choice made without reference to any career aspect in a similar way to how Kovner, Brewer, Fairchild, Poornima, Kim, and Djukic (2007) describe job satisfaction as an "employee's affective reaction to the job without reference to any job aspect" (p. 64).

<u>Caring Behavior:</u>Caring behavior will be defined as behavior that "involves a will and a commitment to care, knowledge, caring actions and consequences" (Watson, 2012, p. 38). Caring is a concern which motivates action or intervention on behalf of the well-being of another.

#### **Summary**

In the United States, nearly 62.6 million people volunteer for or through an organization (Bureau of Labor Statistics, 2014), and many of those are registered nurses. The literature reveals many studies about commitment and retention of volunteers, volunteerism across the lifespan and a wealth of research on volunteers conducted by the social disciplines. There is a dearth of research about health care volunteers in general and nurses specifically.

The proposed study will utilize some of the known traits of volunteers that have been researched by the social disciplines, such as spirituality, altruism and prosocialness, to determine whether they affect nurse volunteerism. In turn, volunteerism of the new nurse, at the local, national and international level, will be studied to determine its effects on the caring behaviors and satisfaction with career choice of the nurse.

Watson's Theory of Human Caring (Watson, 2012) will be used as the theoretical framework. The Theory of Human Caring suggests a transpersonal relationship that develops between a nurse and patient that flourishes when the imaginary boundaries between the nurse and patient are blurred. The present study proposes the nurse volunteer experience as an example of a transpersonal experience that encourages and supports the development of caring behaviors and satisfaction with career choice in the new nurse who volunteers. The volunteer – volunteer recipient relationship differs from that of the work setting as mutual expectation are different and the environment of care will most likelybe different.

#### **Chapter 2: Review of the Literature**

#### Introduction

This chapter will provide a review of the literature that will inform this study. It will begin with the theoretical framework that will be used to underpin the assumptions made in the model. The literature on volunteerism will then be extensively reviewed, using the approaches that have been employed by the social disciplines. It will finish with what has been studied on volunteerism in the nursing literature.

#### **Literature Review**

#### Theoretical Framework: Watson's Human Caring Science

This section will begin with the theory components and definitions of Watson's Human Caring Science. A selected Caritas Process of Watson's theory will then be offered as a possible explanation for the relationship that develops between the nurse volunteer and the recipient of the service. And, finally, the transpersonal caring relationship offered by Watson will be described along with how it relates to the transformative nature of the nurse volunteer experience.

#### Theory Components and Definitions of Watson's Human Caring Science

Watson (2012) believes that human care and caring is the moral ideal of nursing.

It consists of transpersonal human-to-human attempts to protect, enhance, and preserve humanity and human dignity, integrity and wholeness, by helping a person find meaning in illness, suffering, pain, and existence and to help another gain self-knowledge, self-control, self-caring, and self-healing wherein a sense of inner harmony is restored regardless of the external circumstances. (p. 65)

Watson (2012) further states that "nursing in this context may be defined as a human caring science of persons and human health-illness experiences that are mediated by professional, personal, scientific, aesthetic, and ethical human care connections and relationships" (p. 66).

Within the context of the nurse volunteer-recipient relationship, then, human caring occurs. The nurse, unencumbered by the restrictions inherent in organized heath care, is free to provide care that assists in the restoration of inner self harmony. The care provided in these circumstances may be unorthodox, although always maintaining professional standards, because of environmental and other circumstances that may surround the delivery of such care. A volunteer—volunteer beneficiary relationship may be more open and freely given than the nurse—client relationships that are frequently assigned in traditional health care settings. Nurses who volunteertheir professional talent may be more freely able to care in the nontraditional settings where volunteering usually occurs. The preservation of humanity and human dignity are always the goals.

# Caritas Process 6: Creative use of self and all ways of knowing as part of the caring process; engage in the artistry of Caritas nursing (Watson, 2008)

Of all of the Caritas processes, this process most succinctly relates to nurse volunteerism as this process best describes professional nursing as a science and an art, or as Watson (2008) states "Professional nursing involves systematic logic, along with imagination and creativity" (p. 107). It is with this evolution of thought that she describes the Caritas Nurse who "celebrates the caring process as creative, intuitive, aesthetic, ethical, personal, and even spiritual process, as well as a professional empirical-technical process" (p. 107).

Nurses bring both professional knowledge and clinical skills to the volunteer encounter that can result in innovative solutions to challenges faced by nurse volunteers. Nurse volunteers have the unique opportunity to practice the science and art of nursing. They may use their clinical knowledge to solve some challenges and their collective knowledge to creatively solve others, while using their presence as an opportunity for caring for those who require their

volunteer services. Some settings where nurse volunteering occurs provide more than the usual challenges to maintain professional standards, such as during disasters or pandemic outbreaks. These settings may require the professional nurse to use his or her full repertoire of knowledge, skills and creativity to maintain the highest of professional standards.

#### **Transpersonal Caring Relationship**

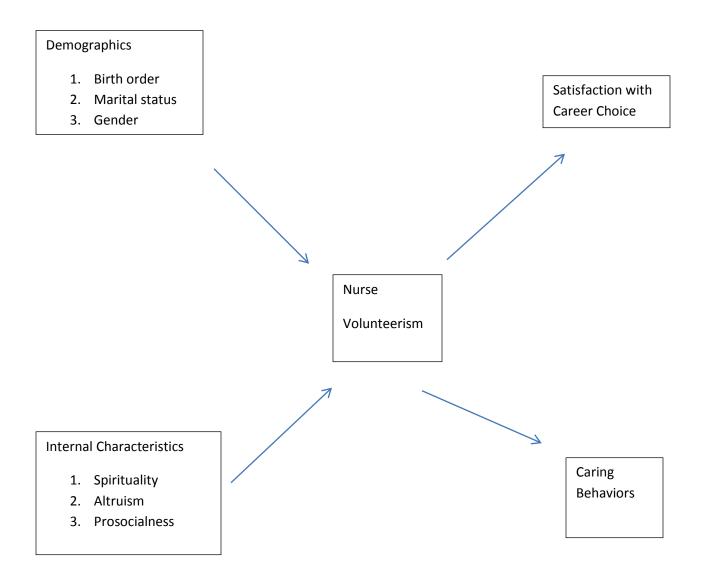
A transpersonal caring relationship, as described by Watson (2012), is "a connection/union with another person, a high regard for the whole person and their being with the world" (p. 75). This description is predicated upon Watson's definition of nursing described earlier, that "caring, in this sense, is viewed as the moral ideal of nursing where there is the utmost concern for human dignity and preservation of humanity" (p. 75). Among the factors that Watson (2012) believes are necessary for a transpersonal relationship is this: "the nurse's own life history (collective past) and previous experiences, culture, background, and opportunities of having lived through or experienced one's own feelings and various human conditions and of having imagined others' feelings and sufferings from various human conditions" (p. 76). The collective past and previous experiences of the nurse volunteer is brought to the volunteer experience. The very essence of that encounter may be viewed as the nurse volunteer who derives the most satisfaction from the experience may be the nurse volunteer that has the utmost concern for human dignity and the preservation of humanity. A satisfied volunteer may be one who feels that he or she has made a difference.

Watson (2012) proposes that "the introduction of the professional nurse as a person in a transpersonal relationship with the patient may conflict with traditional views of the professional nurse" (p. 77). It may be that the reason for the transformative experience occurs in the nurse volunteer because the nurse, unfettered, allows this to occur. Traditionally, nurses and other

health care professionals have been warned against developing personal relationships with their patients. Health care professionals are encouraged to keep professional boundaries or risk being seen as unprofessional and, hence, assumed ineffective in their professional relationship with their patients. Yet, Watson's (2012) transpersonal caring relationship concept encourages the nurse to enter that transpersonal relationship "which implies going-beyond ego-self and connecting with something greater" (p. 77).

This section began with some of the theory components and definitions of Watson's Human Caring Science (2012). The sixth Caritas Process of Watson's theory: creative use of self and all ways of knowing as part of the caring process. Engaging in the artistry of Caritas nursing (2012) was then discussed in light of the nurse volunteer experience when one is able to participate in the experience relatively unencumbered, allowing for the creativity that may be necessary to address a specific healthcare need for the recipient. Finally, Watson's transpersonal caring relationship was offered as the basis for the transformative nature of the nurse volunteer experience for the nurse. The nurse volunteer who goes beyond his or herself in establishing a transpersonal relationship with the recipient of the volunteer experience may find it a truly transformative experience. This transpersonal relationship may impact nursing practice in the work setting, resulting in an increase in self-reported caring behaviors and an increase in satisfaction with career choice when compared with nurses who have not participated in a volunteer experience (see Figure A).

Figure A. Nurse Volunteer Model



# Volunteerism

This section will provide a literature review on volunteerism divided into six broad areas: trait-based research, generational differences, gender differences, international volunteerism, research on volunteerism in other social disciplines and research on nurse volunteerism. The research reviewed will support the development of the research model (see figure A). It will also

demonstrate the dearth of nursing research on nurse volunteerism and support the importance of such research.

#### **Trait-based research**

Two studies(Carlo, Okun, Knight, & de Guzman, 2005; Vantilborgh, Bidee, Pepermans, Willems, Huybrechts, & Jegers, 2013) have reported on volunteerism and what psychologists refer to as the big five personality traits of volunteers: agreeableness, extraversion, openness, neuroticism, and conscientiousness. The study by Carlo and colleagues (2005) found conceptually linked personality traits such as agreeableness and extraversion were more strongly linked to volunteerism, prosocial motivation mediated the relations between these two personality traits and volunteerism, extraversion and agreeableness interacted to influence prosocial value motive which then predicted volunteerism. Neuroticism was inversely correlated with volunteering and had no significant effects in the mediation or moderation models on volunteerism.

In contrast, Vantilborgh and colleagues (2013) were interested in the relationship between personality and volunteer behavior where psychological contract types are mediators. Here, psychological contracts are defined as "perceptions of promised inducements... in return for certain contributions" (p. 160) and are categorized into three types: transactional, relational, and ideological. Personality contracts are subjective and represent the perception of what the organization promised the individual, rather than what the organization actually promised. The results indicated that there are direct relationships between personality traits and each of the contract types and that transactional and relational contracts act as mediators. The findings by Vantilborgh and colleagues (2013) supported the hypothesis that, on the basis of personality

differences, psychological contract types help explain why some volunteers give more of their time than others.

Clary and colleagues (1998) make a clear distinction between spontaneous helping and planned helping, where volunteerism is exemplary of the latter type of helping. To assess the motivations of volunteers, Clary and colleagues (1998) use functionalist theory, "an approach that is explicitly concerned with the reasons and purposes, the plans and goals that underlie and generate psychological phenomena" (p. 1517) and developed a set of six motivational functions served by volunteerism:

- (1) Values: express how one values concern for others;
- (2) Understanding: use knowledge and skills not usually exercised;
- (3) Social: work with friends or doing work that is viewed favorably by others of importance;
- (4) Career: career-related benefits, which may result in a new career or maintenance of skills;
- (5) Protective: reduction in guilt over being more fortunate than others; and
- (6) Enhancement: "...a motivational process that centers on the ego's growth and development and involves positive strivings of the ego" (p. 1518)

Clary and colleagues (1998) point out that volunteer recruitment, satisfaction, and commitment are predicated upon appealing to these psychological functions. This may be a useful approach to the study of nurse volunteerism as some of these functions, such as values, are already inherent in nursing.

There are two examples of studies that examined volunteerism and attachment. Looking beyond personality traits and their associated motives, Erez, Mikulincer, van Ijzendoorn, and Kroonenberg(2008) examined the potential motives for volunteering using an attachment theoretical framework. An assumption of attachment theory that was used in this study was that

people can only find the time to invest in others after their own securities have been addressed. The findings of this study imply that those who are attachment avoidant are also not likely to volunteer and may view others with hostility, disrespect human nature and see others as unworthy of help. A surprising finding of this study was that highly anxiously attached people may be more likely to engage in volunteering because of self-focused reason, implying that egoistic motives encourage this group to volunteer.

Mikulincer, Shaver, Gillath, and Nitzberg(2005)state that the "ability to help others is a consequence of having witnessed and benefitted from good care provided by one's own attachment figures, which both increases one's sense of security and provides models of good caregiving" (p. 818) and conducted five experiments to address the effects of attachment security on empathy, compassion and altruism. Their study participants were from the United States and Israel. All five experiments showed that if there was primed attachment security then there was a greater compassion and willingness to help a person in distress. The findings of Mikulincer and colleagues (2005) support the notion that "the caregiving system can be generalized or extended to help a stranger and that attachment security can facilitate such a generalized compassionate attitude toward humanity" (p. 837). Attachment security and its ability to foster altruistic behavior are of importance to the present study. Nurse volunteers who report positive experiences may be highly altruistic and have had that behavior nurtured by attachment security. Sometimes, negative role modeling and injustice anger can stimulate activity, too.

There have been a number of studies, using variations of trait-based approaches, which have sought to determine the antecedents of and motivations for volunteerism. The results of a series of three studies (Mowen & Sujan, 2005) supported the assumption that functional motives

perform as motivated reasons for the act of volunteerism. Specifically, the results of these studies:

- (a) developed a measure of trait predictors of volunteer orientation: altruism, need for learning, need for activity and present time orientation;
- (b) identified four functional motives as significant predictors of volunteer behaviors: the motive to help others, the motive to make career contacts, the motive to learn, and the motive for self-enhancement, using the functional motives identified by Clary and colleagues (1998);
- (c) found that career is on the minds of students and, therefore, the motive to enhance one's career was significantly associated with student responses but not with the responses of adults over 40 years of agethat did affect the results of the study.

In a study on dispositional and structural determinants of volunteerism, altruistic and prosocial personality characteristics predicted several of the volunteer behaviors (Penner & Finkelstein, 1998). A surprising but relevant finding of this study was that length of service was not strongly correlated with the other three measures of volunteerism: amount of time spent volunteering, attendance at organizational meetings, and contact with the primary beneficiaries of the organization's services. Penner and Finkelstein (1998) caution that length of service does not mean that the volunteer "is any more (or less) active and involved with an organization than someone who has been volunteering for a short period of time" (p. 533).

In another study byFinkelstein (2009), the constructs of intrinsic and extrinsic motivations were incorporated into an investigation of the dispositional factors that contribute to volunteering and linked aspects of functional analysis and role identity to the broader concept of motivation. Finkelstein (2009) found that those who scored higher on intrinsic motivation also

had higher scores on prosocialness, had internal motives for volunteering and established a volunteer role identity, whereas those who scored higher on extrinsic motivation had only external motives for helping. Lastly, a study that looked at determinants of volunteerism, Lipford and Yandle (2009) concluded that volunteerism depends on group homogeneity so that volunteers can identify with beneficiaries and participate in volunteering and that volunteerism also depends on the volunteer's resources and opportunities.

In summary, this section presented research that has been conducted to determine the traits, motives and determinants of volunteerism. Nurse volunteerism may be informed by this research as the traits of altruism and prosocialness appear repeatedly as antecedents to volunteer behavior. Research findings also conclude that volunteering may serve functions for the individual volunteer. These important as effects of volunteering on the volunteer should be studied.

## **Generational differences**

This section will discuss generational differences seen in volunteering. It will start with a study that focuses on the benefits of volunteering across the lifespan. Studies are presented that separately address younger volunteers and older volunteers. Finally, findings and their implications for the present study will be discussed.

Van Willigen (2000) examined the impact of volunteering among the elderly and contrasts the benefits with those experienced by younger volunteers. The study author hypothesized that if volunteering positively affects mortality as was shown in previous studies, then it should also affect physical and psychological well-being. Van Willigen (2000) found that, especially at higher rates of volunteering, older volunteers reported greater life satisfaction than the younger volunteers. The author offers that the difference in the types of volunteer

activities that older adults participate in contrast to their younger counterparts may account for some of the differences.

A number of studies have looked at the youth and young adult volunteers. Luping (2011) interviewed 24 young Chinese volunteers in an effort to delineate the motives for youth volunteers. The findings indicated that there were three motives for youth volunteering:

- (1) traditional motivation with a "sense of responsibility" as its axis;
- (2) modern motivation with "advancement" as its axis; and
- (3) postmodern motivations centered on "happiness"

Another study examined the effect of volunteering on two measures of academic achievement: grade point average and persistence from freshman to sophomore year (Parnell, 2010). Although the findings indicated that for every hour of volunteer service that a student earns, their grade point average could increase by .05, there was no support for the hypothesis that there would be an increase in persistence from freshman to sophomore year.

Jones (2005) examined the benefits to young people's personal development when they engage in structured overseas volunteering placements. The findings of this study show that young volunteers derive benefits that range from the acquisition of soft skills such as communication, organizational and interpersonal capabilities but also a "strongly transformative experience in term of cross-cultural interaction and in enabling young people to develop their own identity in a much wider global context then they would have developed through their home country" (p. 98).

Two studies examined the effects of family influence on adolescent volunteers. The first study was a multilevel analysis on adolescent civic engagement where the role of family on civic engagement was examined, along with peers, school, and neighborhood(Wilkenfeld, 2009). This

study found that political discourse with parents positively affects civic knowledge, attitudes and anticipated behavior. A second study took place in Hong Kong and was concerned with family influence on volunteering retention and behavior(Law & Shek, 2009). Although these authors found that family support, family belief, and family modeling were positively associated with both volunteering intention and volunteering behavior, family belief in volunteerism was the most critical factor.

These four studies support the positive effects of volunteering on adolescents and young adults. From improving college grade point averages and global skills to improving civic engagement and having family support, it is apparent that the volunteer experience has transforming effects on the volunteer that may be difficult to otherwise duplicate. These transforming effects may be parallel to the transformation experienced by the nurse volunteer.

There is more research that has been done on volunteering in the older adult population than younger adults. Smith (2010), drawing on life course and couple decision-making theories, focused on the interconnectedness between work, volunteering, and family, especially in the linked lives of spouses. The primary result of this study was that when compared to couples where at least one member volunteers, non-volunteer couples report lower joint marital satisfaction.

McBride, Greenfield, Morrow-Howell, Lee, and McCrary (2012) were interested in volunteer programmatic features that increase volunteer engagement and found that volunteer management basics such as supervision, flexibility, assistance, training, recognition, and stipend support facilitate volunteer engagement. Erlinghagenand Hank(2006) explored cross-national patterns of volunteering and participation in volunteering among those aged 50 and older in ten countries. Their analysis revealed that higher participation rates in Northern Europe than in

Mediterranean countries persists into older age groups and they speculate that older volunteers are just younger volunteers who have aged. They further purport that the potential of the older population to volunteer has yet to be fully realized and, therefore, important unmeasured aspects that may facilitate the volunteer engagement process should be further explored.

Petriwskyj and Warburton (2007) provide a critical review of the literature on motivations and barriers to volunteering by seniors. Motivators included helping socially and generativity, contributing skills or knowledge, learning or developingskills and feeling good or needed. Barriers to volunteering were: health problems, age, perceived lack of ability or confidence, family obligation or schedule, work commitments. Petriwskyj and Warburton (2007) urge that future researchers need to be more rigorous to include differentiation for age and activities and use of validated scales.

The results of a qualitative study by Narushima (2005) reveal that "the self-help and transformative mechanisms embedded in community volunteering provide opportunities for retirees to sustain their self-esteem and sense of well-being, while cultivating 'generativity' in late adulthood" (p. 567). Narushima (2005) suggests that non-profit organizations involve their volunteers so their volunteer experience is meaningful. The volunteer experience affects the volunteer and the larger society.

Okun and Eisenberg(1992) take a multidimensional approach to aggregating motive items to predict elders' intent to continue volunteering. The three-way motive interaction term (value-expressive, knowledge, and social-adjustive) was the strongest predictor of intent to continue volunteering. "If people can fulfill practical as well as value-related goals by means of volunteering, then they may be more likely to fulfill their needs by reinvesting their time and energy in the volunteer role" (p. 186).

Finally, two studies placed older adult volunteers in two different contexts. In the first study, Tang, Copeland, and Wexler (2012) examined the differences in volunteer experience and perceived benefits from volunteering between older black adults and white adults. This study found that older black adults were involved in organizational volunteering less often than white adults but, once involved, they devoted greater amounts of time. In addition, older black adults were more likely than their white counterparts to feel empowered by volunteering, creating a sense of accomplishment, social integration, personal growth and improved quality of life.

In the second study, Manning(2010) used a nationally representative sample of older Americans to investigate the effect gender and religiosity has on volunteerism later in life. The results of this study indicated that women are 15.8 times more likely to volunteer in late life when compared to men, controlling for all other factors. A noteworthy finding of this study was that religiosity was not a significant indicator of volunteering later in life.

The preceding studies of older volunteers, taken collectively, provide some guidance for the study of nurse volunteerism. There are two particular findings that are useful. The value-expressive motive scores of Okun and Eisenberg (1992) were found to be significantly related to intent only for volunteers who scored high on both knowledge and social-adjustive motive scores. One may expect that nurses who volunteer to be both highly knowledgeable and socially adjusted, and therefore, have high scores on value-expressive motives. The fact that nursing is an overwhelming female profession and women have a 15.8 times higher odds of volunteering in late life compared to men, as shown in the study by Manning (2010), is of great significance for the present study.

## **Gender Differences**

This section will discuss the role of gender in volunteering. It begins with a study that explores caring and gender orientation in volunteering. A study that focuses on the implications of gender differences on the motivation of hospital volunteers will also be discussed. Another study presents how gender response to surveys about giving and volunteering experience may be influenced by survey methodologies. Two works on gender differences and volunteering that used data from the National Survey of Midlife Development in the United States (MIDUS) 1995-1996 (Brimm et al., 1996) are discussed: one focuses on the effects of employment and family characteristics and another study focuses on gender differences in the correlates of charitable giving. Finally, findings and their implications for the present study will be explored.

The work of Karniol, Grosz, and Schorr (2003) relies heavily on the previous work of others, such as Gilligan (1988) and Bem and Lewis (1975). Gilligan (1988) suggests women and men differ in their development of an ethic of care and an ethic of justice. An ethic of care, associated with a female orientation, is a socialization that encourages empathy towards others whereas an ethic of justice, associated with a male orientation, is not linked with need but the basis of morality. The analysis provided by Bem and Lewis(1975)indicates that it is not the actual gender of an individual but the taking on of the gender role orientation that is crucial to development of empathy in an ethic of care.

Karniol and colleagues (2003) wished to determine whether gender role orientation in adolescence is a better predictor of ethical orientation than gender itself and whether this adopted ethical orientation can predict volunteering behavior. In the first study, girls and individuals high in femininity scored higher on caring than did boys and individuals high in masculinity, and regression analysis indicated that gender role orientation accounted for a greater percentage of

the variance than did gender. This supports the work of Gilligan (1988). In the second study, Karniol and colleagues (2003) determined that volunteering is better predicted by one's adoption of an ethic of care than by one's gender and those with higher caring scores volunteered for more hours than those with lower caring scores, supporting the work of Bem and Lewis (1975).

Ibrahim and Brannen (1997)proposed that, in order to develop effective hospital volunteer recruitment, management and retention programs, an understanding of the motivations of volunteers is warranted. Specifically, Ibrahim and Brannen (1997) sought to determine whether the motivation of male hospital volunteers is different than that of female hospital volunteers. Findings in this study showed significant differences between men and women in 8 of 18 items. Males were more externally or occupationally focused in their responses, while females focused on more internal or personal activities. Females also seemed to be more interested in obtaining or enhancing proficiencies whereas males saw their volunteer experience as a means to extend and improve skills they already possess.

Mesch, Rooney, Steinberg, and Denton (2006)examined the effects of a host of demographic variables, including gender, across eight different survey methodologies on giving and volunteering behavior. The study authors were particularly interested in methodologies used in volunteer research because of their previous work. Steinberg, Rooney, and Chin (2002)found that the longer and more detailed questions asked, the more likely individuals responded that they had volunteered and reported volunteering more hours. Rooney, Mesch, Chin, and Steinberg (2005) found that the interaction effects between methods and gender and/or race suggested that women and minorities, especially female minorities, responded to the survey methodologies differently from men and whites, with specific reference to question "framing." In their 2006 work, Mesch and colleagues found no significant differences between gender or

race and research methodologies for giving but did find significant differences for gender and race and research methodologies for volunteering. Females were more likely to recall volunteering when using a long survey whereas minorities were less likely to recall their service using a medium survey. These findings support the findings of the 2005 work of Rooney and colleagues.

Two studies, using the data from the National Survey of Midlife in the United States (MIDUS) 1995- 1996(Brimm et al., 1996), explored other gender differences related to volunteering. In the first study, Taniguchi (2006) found that there was no difference in volunteering among men whether they were employed full time or part time whereas female part time workers were more likely to volunteer than their full time counterparts and the gender difference was statistically significant. Taniguchi (2006) also found that unemployment among men but not women significantly reduces their volunteering efforts. There was also a significant gender gap in caring for elderly relatives where, as expected, women provided most of the care. Taniguchi cautions the reader that the data is heavily skewed: the majority of the respondents did not spend any time volunteering.

In a second study using the MIDUS data, Einolf (2011) devises three categories of charitable giving and volunteering: motivation (empathy, religiosity, generative concern, moral obligation, prosocial role); resources (income, wealth, education, free time) and social capital (trust and social networks). Einolf (2011) hypothesized that women would score higher than men on measures of motivations that predict charitable giving and volunteering but men would score higher than women on measures of resources and social capital. Although women did score higher than men on measures of motivation that predict charitable giving, the hypotheses that men would score higher on resources and social capital was only partially supported. Einolf

(2011) discusses that based on these findings one might expect women to do significantly more formal helping work than men. This held true only for volunteering, not for religious and charitable giving.

This section has presented studies done on the role of gender and gender differences in volunteering. As the majority of nurses are female, findings of these studies are of importance for the present study. The findings of studies by Karniol and colleagues (2003) support that it is not only gender that influences volunteer behavior but gender orientation. The work of Ibrahim and Brannen (1997) assists in the understanding that nurses may volunteer for those activities that are seen as obtaining or enhancing their proficiencies. The findings of the work of Mesch and colleagues (2006) provide rationale for the development of the lengthy survey developed for the present study. Finally, the findings of the studies that used the data from MIDUS provide support to determine whether nurse volunteering is influenced by employment status and for the use of motivational factors of nurse volunteerism used in the present study (altruism, prosocialism and spirituality).

### **International**

This section will present the findings of research in two distinct areas of international volunteerism: volunteer tourism and volunteerism in other countries. In each area, findings and recommendations will be discussed and summarized as related to the present study.

### Volunteer Tourism

The work of Coghlan (2011) provides a succinct definition of volunteer tourism: "an alternative form of tourism that fosters positive social and environmental outcomes by providing tourists with an opportunity to 'put something back' into their host community" (p. 713).

Coghlan (2011) believes that volunteer tourists wish to be changed by their experience as much

as they give of their time, resources and skills and applies the concept of a transformative learning experience to volunteer tourism. Findings of this approach fall short of the entire tenstep process involved in transformative learning. Coghlan (2011) recommends that volunteer tourism be re-conceptualized to enable true transformative learning that will result in sustainable changes for both the volunteer and the work that has been accomplished.

Mostafanezhad (2013) conducted fifteen months of fieldwork at three nonprofit, nongovernment organizations (NGOs) that use volunteer tourism as a social and economic development strategy. Of note, seventy-four percent of volunteers that agreed to be interviewed were female and the majority was college students. Using grounded theory, Mostafanezhad (2013) developed a "Geography of Compassion":most volunteers wanted a "third world" country because, as consumers in this process, the volunteers believed this is where they would do the most good and where their help was needed the most. The geography was developed as places like Thailand, although in need, were considered by this group as being less in need of assistance than Africa, which this group considered as a homogenous area in most need. Mostafanezhad (2013) recommends the mainstreaming of the global justice agenda to recruit and support these volunteers in their work.

Through their research Coren and Gray (2012) address the critics of volunteer tourism who suggest that profit for volunteer tourist organizations, rather than the communities served and lack of respect for local environments and cultures are the real products of volunteer tourism. In their study, Coren and Gray (2012) utilize the construct of commodification, where volunteer tourism shares features of mass tourism and ecotourism and the environment, the economy and the culture may all be changed or "modified"negatively. Two cohorts of volunteers, mainly female, were compared, one in Vietnam and one in Thailand. Findings suggest that both

groupsto varying degrees were unable to avoid commodification. Recommendations include a warning that volunteer tourist organizations should take heed or otherwise be viewed as just another commercial adventure.

This preceding discussion of the findings and recommendations of research on volunteer tourism provides several sources of support for the present study. The re-conceptualization of volunteer tourism to enable true transformative learning, as recommended by Coghlan (2011), could be extended over local and national volunteering. This may increase satisfaction with volunteering and result in repeated experiences. Mostafanezhad (2013) recommendation to mainstream the global justice agenda could also be extended through other forms of volunteering to recruit and support volunteers in their work. As it appears difficult to avoid commodification, as reported in the Coren and Gray (2012) study, it would seem that this warning be heeded by volunteer tourist organizations and considered by local and national volunteer groups. Nurses who volunteer in activities that take them to foreign countries may also need to avoid commodification.

#### Volunteerism in other countries

The research of Lai, Ren, Wu, Hung, (2013) explored motivational factors of Chinese volunteers and the role of national identity. In their model of volunteerism in Chinese culture, Lai and colleagues (2013) identified motivation as a mediator between national identity and intention to volunteer. The volunteers and potential volunteers in this sample were typically young, single women who were better educated than their non-volunteer counterparts. Using the six functions served by volunteerism (Clary et al., 1998), Lai and colleagues (2013) determined that volunteers and potential volunteers had similar motivational levels and both scored higher than those of non-volunteers. Although no significant difference in national identity was

observed between volunteers and potential volunteers, the two groups scored higher than non-volunteers. A mediation analysis supported the hypothesis that volunteer motivation mediated the effects of national identity on intention to volunteer in the Chinese culture.

The work of Gau, Usher, Stewart, and Buettner, (2013) explored the burden experienced by community health volunteers in Taiwan, through a qualitative study, using interpretive descriptive design. The sample in this study was mainly females in their fifties who had varying degrees of education. The four themes identified as burdens for these volunteers were inadequate preparation and limited scope of practice; lack of support for the role and lack of resources; work overload; and expectations of the role that were either too high or too low. As these roles were developed to enhance community education and supplement professional community health workers, Gau and colleagues (2013) conclude that there is an urgent need to address this by government policy-makers.

Japan was the setting for two other studies about health promotion volunteers. The purpose of the first study conducted by Murayama, Taguchi, and Murashima (2012) was to determine whether similarity in educational level between health promotion volunteers and local residents affected activity involvement of the volunteers. The results indicate that not only does the educational level of health promotion volunteers affect their activity involvement but also similarity in educational level between the health promotion volunteers and the local residents plays a significant role in more active volunteer involvement. In their second study, Murayama, Taguchi, and Murashima (2013) explored the ideal combination of activity satisfaction and burden among health promotion volunteers, seeking to determine the relationship between activity satisfaction and burden among health promotion volunteers. Murayama and colleagues (2013) found that the ideal situation for health promotion volunteers is experiencing a high level

of satisfaction coupled with a low level of self-perceived burden when participating in an activity.

A Ugandan palliative care Community Volunteer Program and its volunteers were the subjects of two studies conducted by Jack and colleagues and reported in 2011. The aim of the first qualitative study (Jack, Kirton, Birakurataki, & Merriman, 2011a) was to evaluate the impact of the Community Volunteer Program through interviews and focus groups with patients, workers and teams. Several key themes emerged regarding the impact of these volunteers and included the positive impact on patients and their families and how they acted as "bridge to hospice." The aim of their second qualitative study (Jack, Kirton, Birakurataki, & Merriman, 2011b) was to evaluate the motivation for becoming a volunteer and the personal impact of being a palliative care Community Volunteer Worker in Uganda. Semi-structured interviews and focus groups were conducted with a volunteer sample and several team members. There was consensus on two key themes. The first theme was the motivation for becoming a volunteer and that was based on the wish to care for suffering in the villages where the volunteer had previous personal experience. The second theme was the personal impact of being a community volunteer worker. These community volunteers were very proud of their role and felt that the role gave them a certain status and respect in their community.

A review of the research on volunteerism provides further rationale for the present study. The majority of the sample of volunteers in both the work of Lai and colleagues (2013) and Gau and colleagues (2013) were females as will be the majority of the sample for the present study. The four themes identified as burdens for volunteers in the study by Gau and colleagues (2013), inadequate preparation and limited scope of practice, lack of support for the role and lack of

resources, work overload, and varying role expectations can be viewed as similar to challenges faced by nurses in practice.

Murayama and colleagues (2012) finding that similarities in education between the volunteer and the beneficiary of the service increases volunteer involvement may be a factor in the present study and the findings of their second study(Murayama et al., 2013) that the ideal situation for health promotion volunteers is experiencing a high level of satisfaction coupled with a low level of self-perceived burden when participating in an activity may be a factor when determining volunteer satisfaction in the present study.

Finally, the findings of Jack and colleagues (2011a) of the positive impact that volunteers had on patients and families, acting as a "bridge to hospice" and the motivation and feeling of pride of volunteers found in the second study by Jack and colleagues (2011b) are themes that will be explored in the present study.

## Research in other social disciplines

### Education

This section will present studies in education about volunteerism. Educational research about volunteerism has focused on the sustainability of volunteerism into adulthood and the long term effects of volunteerism in adolescence on philanthropy and civic engagement. The findings of these studies will be summarized and implications supporting the present study will be discussed.

The goal of the research of Marta and Pozzi (2008) was to provide a more complete understanding of long-term volunteer behavior in young people. Data were collected a year apart on the same sample with a response rate on the second sample of just over fifty percent.

Marta and Pozzi (2008) administered self-report measures of motivation to volunteer, integration

and satisfaction with organization, social support, merged effects due to voluntary service, volunteer identity and intention to volunteer. Using structural equation modeling, the model tested by Marta and Pozzi (2008) suggests that dispositional and organizational characteristics help determine long-term volunteerism in young people and their analysis confirms findings of other research that role identity is the best predictor of intention to volunteer. Marta and Pozzi (2008) tested the sustainability of this model over time and determined that their model was sustained over time and conclude that volunteer identity is crucial in the understanding of volunteerism of young people.

Using panel data from the Youth Development Study, a longitudinal study that began in 1988, for a nine-year period between late adolescence and early adulthood, Oesterle, Johnson, and Mortimer (2004) examined the volunteer work of young people during the transition to adulthood to determine whether educational, work or family roles promote volunteerism during late adolescence and early adulthood, as they do later in adulthood. The findings of Oesterle and colleagues (2004) indicate that the determinants of volunteerism are life-stage-specific. The demands of full-time work and family resulted in a reduction in time spent volunteering, especially if there were young children in the family. However, the authors of this study found that because postsecondary education promotes volunteerism, young adults who volunteered during their education were more likely to volunteer into their adult years. Oesterle and colleagues (2004) believe that the three types of resources that are tied to volunteerism (human, social and cultural capital) are promoted through education and, hence, further support the strong tie between education and volunteerism.

The purpose of the study by Olberding(2012) was to examine the long term effects of student philanthropy. Specifically the researcher wished to determine whether alumni of a

student philanthropy program were more likely to be aware of social problems and more engaged with the nonprofit sector and their communities through volunteering and philanthropy. The researchers noted that this was the first time that long-term effects of student philanthropy were being measured and they found that nearly two-thirds of respondents reported that student philanthropy had a positive effect on their donating money to charitable organizations, volunteering for nonprofit organizations, and working to solve community problems through someone or groups. The authors caution in their discussion that although the response rate for this survey was thirty percent, it resulted in a small sample (N=127) and the participants were from one student philanthropy program in one university.

In the study by Barber, Mueller, and Ogata (2013), the long-term predictors of continued community engagement were examined. Barber and colleagues (2013) explored the differences in those who continue community engagement despite developmental transition and those who chose to stop, leading the authors to conceptualize persistence as a sense of purpose. The study authors chose selected variables based on the framework of persistence as a sense of purposeand determined that an individual exposed to community activities as an adolescent will continue to be engaged with as a young adult. Using data from a US-based longitudinal study on adolescent health, Barber and colleagues (2013) selected a subset, 3,165 participants from 116 schools, of the 20,000 respondents to include only those who had reported community activities as an adolescent and responded to both Wave I of the study and Wave III, conducted seven years later. The authors found that demographic variables did not predict continued community engagement but both a sense of belonging and academic performance positively related to continued participation as an adult and one of the strongest predictor of continued involvement was the

combination of required and voluntary activities. Parental civic engagement and religious involvement were also predictive of young people's continued activity as young adults.

Using data from the National Longitudinal Survey (NLS) of Labor Market Experience (Parnes, 1975), Rotolo and Wilson (2004) tested the generation hypothesis that argue that the passing of the generation who lived through the Depression and the Second World War has resulted in a decline in civic behavior. Rotolo and Wilson (2004) compared the volunteer behavior of two succeeding cohorts of women. The older sample was first surveyed in 1967, consisting of women age 30-44, while the younger sample was first surveyed in 1968, consisting of women age 14-24. The sample was further limited to avoid overlapping ages and, therefore, the final numbers in each cohort were 3,141 observations from the older cohort and 3,196 observations from the younger cohort. The two dependent variables in this study were the number of weeks volunteered and the number of hours volunteered which were found to be only moderately correlated. The independent variables included age, cohort, level of education, paid employment, occupation, marital status, and parental status. As described in this study, Rotolo and Wilson (2004) state that a cohort is not the same as a generation. In fact, it is a time span devised for convenience to study differences in two groups. The study determined that there was no difference in the number of weeks or hours volunteered but there was a difference in the type of volunteering. The younger cohort participated in more civic and school-related activities whereas the volunteer patterns of the older cohort were church-related.

This section discussed studies in education about volunteerism whose findings are relevant to the present study. The findings of Marta and Pozzi (2008) reveal that volunteer identity is the best predictor of the intention to volunteer over time. Oesterle and colleagues (2004) determined that the three types of resources tied to volunteerism, which are human, social

and cultural capital, are promoted through education and further supported the strong tie between education and volunteerism. Olberding (2012) had nearly two-thirds of respondents reporting that student philanthropy had a long-term positive effect on donation, volunteering and civic engagement. The findings of Barber and colleagues (2013) supported their conceptualization that a sense of purpose was the motivation for those who continued their community engagement through developmental transition. Finally, the work of Rotolo and Wilson (2004) reveal that although generations of women may have changed their volunteer activities over time, the amount of time spent volunteering has not significantly changed.

# Psychology

Much of the research on the psychology of volunteering has been discussed elsewhere in this study. This section will discuss the results of two studies that focused on volunteer engagement. The same two investigators lead each study. The results will be summarized and implications for the present study will be presented.

The work of Vecina, Chacón, Sueiro, and Barrón(2012) sought to determine whether engagement predicts the degree of satisfaction among new volunteers and the commitment of those who have been active longer. Specifically, Vecina and colleagues (2012) analyzed within a sample of volunteers three variables felt relevant to volunteer work engagement: volunteer satisfaction, organizational commitment, and intention to remain. The purpose of the study was to explore work engagement and whether it is useful in explaining the desired results in the volunteer field. After a confirmatory factor analysis in study one, the authors conclude that volunteer work engagement is similar in structure to engagement in workers and students. The results of study two support the hypothesis that engagement significantly explains both satisfaction and organizational commitment. Higher levels of engagement are mediated by

satisfaction in the sample of new volunteers and by organizational commitment in the sample of veteran volunteers.

A second study by Vecina, Chacón, Marzana, and Marta (2013)was conducted to determine whether organizational commitment and work engagement are distinguishable constructs among volunteers in addressing what makes volunteers happy and remain within organizations. The participants in this study were 232 active volunteer members of one of 18 nonprofit organizations. The results indicated that the relationship between engagement and intention to remain is mediated by commitment and the relationship between commitment and psychological well-being is mediated by engagement. Regression analyses confirm that commitment predicts intention to remain and engagement predicts psychological well-being.

The results of these two studies underscore the importance of engagement and organizational commitment, satisfaction and psychological well-being, and intent to remain in volunteering. The results of these studies also indicate that these constructs that are used are similar in the paid work setting and in the volunteer work setting. This has implications for the present study. One of the intents of the present study is to determine whether those who participate in volunteer opportunities are also satisfied with their career choice.

# Sociology

This section will present three sociology studies on volunteerism. The first takes an interactionist perspective on dispositional and organizational influences on sustained volunteerism. The second study uses a person-environment fit approach to volunteerism to determine whether volunteer personality fit and culture fit are predictors of affective outcomes. The last study in this section discusses volunteerism among social work students during

Hurricanes Katrina and Rita. This section will end with a summary and implications for the present study.

Penner (2002) used data from an on-line survey to study the dispositional correlates of volunteerism. When compared to those who did not engage in volunteer activities, volunteers scored significantly higher on other-oriented empathy and helpfulness dimensions of prosocial personality. In addition, even when individuals who volunteered for religious organizations were excluded, those who belonged to an organized religion were more likely to be volunteers and those who reported strong religious beliefs worked for more organizations, had longer tenure as a volunteer and spent more time working as a volunteer. Penner (2002) also analyzed the intercorrelations among three aspects of volunteer activities: the number of organizations worked for, the length of service at the primary organization, and the amount of time spent as a volunteer. These aspects were found to be all highly correlated. Penner (2002) then looked at demographic correlates of volunteering and found age, education, and income to be positively correlated with the three aspects of volunteer activities. Penner(2002) further emphasizes that dispositional and organizational correlates of volunteerism are not independent of one another and, consistent with the interactionist perspective he purports, these correlates influence one another with a resulting impact on sustained prosocial actions. This work concludes with a conceptual model of sustained volunteerism, proposing that while social pressure may be a determinant of the decision to volunteer, the most potent direct causes of sustained volunteerism are the perceptions people have of themselves and the roles they occupy.

Van Vianen, Annelies, Nijstad, and Voskuijl(2008) studied the role of culture fit and personality fit with regard to volunteerism and hypothesized that the affective commitment of volunteers would be negatively related to turnover intention and the personality fit of volunteers

would be positively related to their affective commitment, satisfaction, and turnover intention. Van Vianen and colleagues (2008) chose to control for demographic variables that might be related to the independent and dependent variables in this study. Although satisfaction and affective commitment were negatively related to turnover intentions, personality fit was found not to be related to turnover intentions. The authors of this study found other factors that may contribute to volunteer turnover intentions including social pressure to continue and not let down their volunteer colleagues. Van Vianen and colleagues (2008) argue that this contradicts the work of Penner (2002), previously discussed, who found social pressure as a determinant to decide to volunteer.

The work of Plummer, Lemieu, Richardson, Day, Taylor and Kim(2008) examines the volunteer work of social work students in times of disaster. Specifically, Plummer and colleagues (2008) wished to identify the combination of factors that best predict social work students' heightened volunteerism by surveying those social work students who volunteered for Hurricanes Katrina and Rita. Unique to this study was that the majority of participants were also victims of one of the hurricanes. However, social work students responded in overwhelming numbers to the call for volunteers. This study found that previous volunteerism, altruism and faith were positively associated with hurricane-related volunteering and that the strongest predictors of volunteering in this group was altruism, increased commitment to social work values, and hurricane-related stressors.

This section discussed three studies on volunteerism from a sociological perspective. The study by Penner (2002) is a seminal work that concludes with a conceptual model of sustained volunteerism. Yet, the findings of Van Vianen and colleagues (2008) that social pressure to continue volunteering and not let down their volunteer colleagues seemingly

refutes the work of Penner (2002) who found social pressure as a determinant to decide to volunteer. The present study will seek to establish determinants of sustained nurse volunteerism. The study by Plummer and colleagues (2008) examined social work student volunteers in time of disaster and found that these volunteers shared some of the same predictors of volunteering as volunteers in normal times. The present study may include nurse volunteers in disaster relief and the findings by Plummer and colleagues (2008) supports this.

## Nursing

This section will discuss the nursing research on volunteerism, most of which center around the potential for and actual disaster. It begins with a study of the New York City nursing response to the influenza pandemic of 1918 that helped to establish a network of nursing and social organizations. Another study reports on the willingness of nursing students to respond during a contemporary pandemic. A third study explores the volunteer potential of inactive nurses for disaster preparedness. A fourth study describes nursing children after the earthquake in Haiti. The last study presented in this section compares the urban versus rural experiences of nurses volunteering to promote health in churches. An editorial that describes the benefits of volunteering on the volunteer completes the section. A summary of the findings and implications for the present study is described.

Using a social history framework, Keeling (2009) describes the response of the New York City nursing community to the influenza pandemic of 1918. Armed with little else but meticulous nursing care, these nurses were able to care for thousands of the suddenly and gravely ill, many of whom were young and previously healthy. Lillian Wald, director of the Henry Street Settlement, had previously established the Visiting Nurse Service to care for the poor. During the course of the influenza pandemic in New York City, these visiting nurses were able

to respond to this public health crisis in part because of the collaboration of many social organizations including the United States Public Health Service and the American Red Cross and also because of the many hours of uncompensated time provided by these nurses to care for the ill. Keeling (2009) concludes that similar agency cooperation among local, state and federal agencies would be necessary in the event of a similar event today.

Yonge, Rosychuk, Bailey, Lake, and Marrie (2010) surveyed students at a large university to determine their willingness to volunteer in the event of a pandemic influenza. Using a crosssectional design, the responses of nursing students who comprised a significant subgroup of the survey respondents were examined to determine the knowledge and concern of the students regarding pandemic influenza, how they would prioritize health resources, and whether they would be willing to volunteer during an outbreak. Many students indicated they had previous volunteer experience and about two-thirds of the respondents said they would volunteer in the event of an outbreak if they were healthy and able to do so. An almost identical number indicated they had the skills to fill a variety of hospital roles, including feeding patients. Over three-quarters of the respondents said that health care students should be encouraged to volunteer and nearly as many cited moral, ethical, and professional obligation to do so, although over eighty-two percent of respondents felt that students should not be penalized if they refuse to provide services, even if required by the government. A major limitation of this study was that it was limited to one site. The authors recommend that future studies of this kind use multiple sites and also address other health care students as well as other social science students.

Fothergill, Palumbo, Rambur, Reinier, and McIntosh (2005) used a mail survey to evaluate the feasibility of inactive nurses volunteering in the event of a national emergency.

Specifically, respondents were asked about their interest in volunteering in an emergency and the

training they would need to be able to carry out their work. While only twenty-seven percent of respondents were interested in this volunteer work, age was the major determining factor, predictably younger inactive nurses were more likely to be interested in volunteering. A related reason for not being interested in this type of volunteer work was health issues of the respondents. Other reasons offered for lack of willingness to volunteer included caregiving responsibilities and lack of current competency to perform nursing tasks. Conversely, aside from being significantly younger, the inactive nurse respondents in this study who were willing to volunteer still identify with their nursing role, are employed in other fields and are currently performing other volunteer work. While Fothergill and colleagues (2005) offer a blueprint for action, their findings lack generalizability. The study authors acknowledge that this was done in one, small mostly rural state (Vermont) which has very little diversity in the nursing population. In addition, there was only a 20 percent response rate. This study could be considered a pilot study for future research in this area.

Sloand, Ho, Klimmek, Pho, and Kub (2012)employ an exploratory descriptive qualitative design to focus on the experience of ten nurse volunteers caring for children in the aftermath of the January 2010 earthquake in Haiti. This study was unique in several ways. Sloand and colleagues (2012) chose to focus on pediatrics because anecdotal publications were the only information existing in the literature about the experience of nurse volunteers working with children during disasters. Additionally, according the study authors, an estimated thirty percent of those requiring medical attention after the earthquake were fourteen years of age or less. The purpose of this research was to describe the impact of the devastating earthquake on children and their caregivers through the experiences of the nurse volunteers. Four themes emerged:

- Although devastation was expected and most children were adversely affected, there
  were some unexpected examples of positive impact. For example, many children were
  now receiving access to primary care who never received it before.
- 2. The severe shortages of all resources were particularly acute for the nurses caring for children because of the age-specific needs. There was much creativity that ensued but there were also disturbing compromises that needed to be made with obvious impact on the nurses as well as their patients.
- 3. Translators were not always readily available and yet there were communications that transcended language, such as holding children, walking with them and playing with them. Sloand and colleagues (2012) describe this as the universality of children.
- 4. The emotional impact of the work of the nurses in this study encompassed the full spectrum. Despite the highs and lows experienced by the nurses, many reported leaving was one of the most difficult things they had ever done although they also reported this experience as a "life-changing experience for the better" (p. 244-251).

Among the recommendations made by Sloand and colleagues (2012) in their discussion of practice and research implications, the authors call for the formalization of preparation and training for nurses who volunteer in disasters.

In the last research study in this section, Chase-Ziolek and Striepe (1999) compare the experiences of urban nurses who volunteer to promote health in churches with their rural counterparts, utilizing program evaluation research. This research sought to determine the similarities and differences between the services provided by a rural parish nurse program and an urban parish program and the similarities and differences in the experience of being a nurse volunteer in each of the programs. Chase-Ziolek and Striepe (1999) found the differences

In the majority of the contacts that the urban nurses had with individuals took place at the church where the contacts the rural nurses had with individuals was distributed among church, home and phone. The responses that the nurses in this study provided when asked to describe the persons helped were placed in two categories: health promotion or disease prevention and reaching out to persons in need. The differences in responses between the urban and the rural nurses were influenced by the environment where the care was provided. Both the urban nurses and the rural nurses highly valued the opportunity to combine their faith and professional expertise through volunteering in their sponsoring organizations. One of the more intriguing findings of this study is that if nurses perceive a need and if they can learn from the experience, they are more willing to find time to volunteer, regardless of their employment status, regardless of whether it is an urban or rural program.

Alspach (2014) focuses her editorial on volunteering on the benefits to the volunteer. In the review of the literature for the editorial, she acknowledges the dearth of research in this area. she describes the career and social benefits of volunteering that are well documented in the literature but laments on the lack of literature promoting the health benefits of volunteering. In light of this, the purpose of the editorial is to encourage critical care nurses to consider where volunteering may be placed in the patient plan of care. Alspach (2014) ends the editorial by encouraging critical care nurses to determine whether volunteering could benefit their own health.

This section presented the state of nursing research of nurses who volunteer their professional expertise. Most of the studies involved nurses volunteering in emergent events.

Keeling (2009) provides a rich description of the nursing response of the influenza pandemic of

1918 in New York City, an example of a nurse-lead, successful pioneering collaboration among multiple agencies. In a study by Yonge and colleagues (2010) nursing students who responded to a questionnaire about their willingness to volunteer in the event of a pandemic influenza overwhelmingly responded that they would volunteer, citing a moral, ethical and professional obligation to do so. Inactive nurses were surveyed by Fothergill and colleagues (2005) to gauge their interest in volunteering their professional services in the event of a national emergency and found, predictably, a higher percentage of younger nurses were interested in this activity. Sloand and colleagues (2012) describe four themes that emerged in their study of the experience of nurse volunteers who cared for the January 2010 earthquake in Haiti and recommend further preparation and training for nurses who volunteer during disasters. The study by Chase-Ziok and Striepe (1999) was the only study that focused on planned volunteering of parish nurses in rural and urban settings. Chase-Ziok and Striepe (1999) determined predictable similarities and differences between the services provided and the experiences perceived by each group. Finally, the editorial by Alspach (2014) discusses the positive health impact of volunteering on the volunteer, acknowledging the infancy of this area of research. Alspach (2014) calls for critical care nurses to incorporate volunteering into the care plans for their patients as well as considering it for themselves. There is a paucity of nursing research in the area of nurses who volunteer their professional expertise and how these experiences affect themselves and those they care for in their work lives.

### **Summary of Review**

This chapter provided a review of the literature that supports the model that answers the research questions. It begins with a review of the theoretical framework used in this study, Watson's Human Caring Science (2012). It specifies that a selected Caritas Process, creative use

of self and the artistry of Caritas nursing and the transpersonal caring relationship as the focus of the review. It proposes that the nurse volunteer, unencumbered by the highly regulated healthcare system, is able to fully enter into a transpersonal relationship through volunteering. It further proposes that the transformative nature of that relationship has a positive impact in self-reported caring behaviors in the practice setting and satisfaction with career choice.

The literature review was then divided into six broad areas. The first group of research reviewed, trait-based research in volunteering, concluded that research on nurse volunteering should include measures of altruism and prosocialness as antecedents to volunteer behavior and functions served by volunteering for the individual volunteer should be considered. Both conclusions are included in the present study design.

The next group of research reviewed generational differences in volunteering, concluding with several implications for the present study. The transforming effects on younger volunteers may be similar to the transforming effects considered in the volunteer through Watson's theory. Older nurse volunteers may score high on value-expressive motives and, because nursing is overwhelmingly female, there is a significantly higher likelihood that nurses will volunteer.

A third group of research focused on gender differences in volunteering. If it is not only gender but gender orientation that influences volunteer behavior (Karniol, Grosz, & Schorr, 2003), then a proportionate number of males and female nurses may be found volunteering, assuming that male nurses may score higher than expected on female gender orientation. The work of Mesch and colleagues (2006) provides the support for the lengthy survey used in the present survey. Findings of this researchalso provide the support for determining in the present study whether nurse volunteering is influenced by employment status and other factors such as

altruism, prosocialism and spirituality and whether nurses will volunteer when opportunities are presented that obtain or enhance their proficiencies.

Research on international volunteerism was reviewed and divided into two distinct groups: volunteer tourism and volunteerism in other countries. Transformative learning of the volunteer tourist, as Coghlan (2011) recommends, may increase volunteer satisfaction and result in repeated volunteer interactions. The findings of research on volunteerism in other countries have several implications for the present study. Volunteer burdens in some countries may be similar to the challenges faced by nurses in practice. The studies by Murayama and colleagues (2012, 2013) showed that volunteer involvement is increased when the educational level of the volunteer and beneficiary are similar and when the volunteer perceives a low level of burden, both findings supportive of the present study design.

The fifth section of this review of the literature is research in other social disciplines. The findings of education research on volunteerism (Barber, Mueller, & Ogata, 2013; Marta & Pozzi, 2008; Oesterle, Johnson, & Mortimer, 2004; Olberding, 2012; Rotolo & Wilson, 2004) support determining whether volunteering as an undergraduate influences future volunteer activity and whether that volunteer activity changes over time. The review of the psychology research on volunteering focused on two studies by the same lead investigator (Vecina, Chacón, Sueiro, & Barrón, 2012; Vecina, Chacón, Marzana, & Marta, 2013). Engagement and organizational commitment, satisfaction and psychological well-being were also found to be interchangeable constructs in the work setting and the volunteer setting, an important finding as the present study determines whether volunteering influences satisfaction with career choice.

The sociology research on volunteering includes the seminal work by Penner (2002) who developed a conceptual model of sustained volunteerism. The present study seeks to establish

determinants of sustained nurse volunteerism. Sociology research on volunteering also includes the study by Plummer and colleagues (2008) who found that sociology students who volunteer during times of disaster share some of the same predictors for volunteering as volunteers in normal times. The present study may include a mix of nurses who volunteer during disasters as well as those who plan their volunteer experiences.

The final area for review was nursing research on volunteerism. Most nursing research on volunteerism has focused on nurses who volunteer their professional expertise in emergent events (Fothergill, et al., 2005; Keeling, 2009; Sloand, et al., 2012; Yonge, et al., 2010), finding significant interest in volunteering during times of disasters, for both practicing nurses and nursing students. One study by Chase-Ziolek and Striepe (1999) focused on planned volunteering, determining the predictable similarities and differences between rural parish nursing and urban parish nursing. An editorial by Alspach (2014) calls for critical care nurses to capitalize on the positive health impact on the volunteer by incorporating volunteering into the plan of care for their patients. Alspach (2014) acknowledges a dearth of research in this area and suggests that nurses avail themselves of the health benefits of volunteering.

## **Chapter 3: Methods**

### Introduction

This chapter describes the research design, study population, sampling procedure and the sample. Instrumentation used, data collection procedures, ethical considerations, and data preparation is also described. Operational definitions of the research variables and procedure used for answering research questions are provided.

## Research Design

This is a quantitative survey study with several open-ended questions. A survey was posted on an online survey collection site using Survey Monkey®, a well-known data collection tool for on-line survey research. Participant demographics and responses to thisweb-based questionnaire were completed by a sample of registered nurses, over a year after graduation, who responded to an initial survey from the National Nurses Students Association stating that they would participate in follow up surveys. A descriptive, correlational design was used to determine the effect of spirituality, altruism and prosocialness on nurse volunteerism and how volunteerism mediates (Baron & Kenny, 1986; Bennett, 2000) caring behavior and satisfaction with career choice in the new nurse.

The following hypotheses were tested:

### Demographics and Volunteerism

H<sub>0</sub>: Demographic characteristics are not related to volunteerism in the new nurse.

H<sub>1</sub>: Demographic characteristics are related to volunteerism in the new nurse.

### Internal Characteristics and Volunteerism

H<sub>0</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are not related to volunteerism in the new nurse.

H<sub>1</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are related to volunteerism in the new nurse.

# External Opportunities and Volunteerism

H<sub>0</sub>: External opportunities such as service learning or other pre-professional volunteering are not related to volunteerism in the new nurse.

H<sub>1</sub>: External opportunities such as service learning or other pre-professional volunteering are related to volunteerism in the new nurse.

# External Opportunities and Caring Behaviors

H<sub>0</sub>: External opportunities such as service learning or other pre-professional volunteering are not related to caring behaviors in the new nurse

H<sub>1</sub>: External opportunities such as service learning or other pre-professional volunteering are related to caring behaviors in the new nurse

## Volunteer Experience and Caring Behaviors

H<sub>0</sub>: Volunteer experience at the local, national or international level does not influence caring behaviors in the new nurse.

H<sub>1</sub>: Volunteer experience at the local, national or international level does influence caring behaviors in the new nurse.

# Volunteer Experience and Satisfaction with Career Choice

H<sub>0</sub>: Volunteer experience at the local, national or international level does not influence satisfaction with career choice in the new nurse.

H<sub>1</sub>: Volunteer experience at the local, national or international level does influence satisfaction with career choice in the new nurse.

## Demographics and Caring Behaviors:

H<sub>0</sub>: Demographic characteristics are not related to caring behaviors in the new nurse.

H<sub>1</sub>: Demographic characteristics are related to caring behaviors in the new nurse.

### *Internal Characteristics and Caring Behaviors:*

H<sub>0</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are not related to caring behaviors in the new nurse.

 $H_1$ : Internal characteristics such as spirituality, altruism, and prosocialness are related to caring behaviors in the new nurse.

# Internal Characteristics and Satisfaction with Career Choice

H<sub>0</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are not related to satisfaction with career choice in the new nurse.

H<sub>1</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are related to satisfaction with career choice in the new nurse.

### External Opportunities and Satisfaction with Career Choice

H<sub>0</sub>: External opportunities such as service learning or other pre-professional volunteering are not related to satisfaction with career choice

H<sub>1</sub>: External opportunities such as service learning or other pre-professional volunteering are related to satisfaction with career choice

Demographics, Internal Characteristics, External Opportunities, Volunteer Experience, Caring Behavior and Satisfaction with Career Choice

H<sub>0</sub>: Demographics, internal characteristics and external opportunities, combined with volunteer experience, are not predictive of caring behavior and satisfaction with career choice.

H<sub>1</sub>: Demographics, internal characteristics and external opportunities, combined with volunteer experience, are predictive of caring behavior and satisfaction with career choice.

# **Population of the Study**

The National Student Nurses' Association (NSNA) was establishedin 1952, (Mancino, 2002) and has representation from all fifty states plus the District of Columbia, Guam, Puerto Rico and the U.S. Virgin Islands. As of February 2013, NSNA had a membership of 59,480 out of a total number of 315,524, or 18.9% of enrolled nursing students (D. Mancino, personal communication, December 8, 2015). NSNA is a nonprofit organization for students enrolled in diploma, associate, baccalaureate, and generic graduate nursing programs (National Student Nurses' Association House of Delegates, 2013a). Membership in this organization is individual membership. Those schools that opt for school membership, referred to as "Total Membership Plan," are requested to have a mechanism for those students who do not wish to become members to opt out(National Student Nurses' Association House of Delegates, 2013b).

NSNA members enjoy many benefits belonging to an organization whose mission statement reads "To mentor nursing students preparing for initial licensure as registered nurses and to convey the standards, ethics, and skills that students will need as responsible and accountable leaders and members of the profession" (National Student Nurses' Association House of Delegates, 2013b). NSNA members may choose to participate in NSNA Leadership University where students may earn academic credit while learning about shared governance, attend the Annual Convention that attracts over 3,000 nursing students each year, or participate in the Midyear Career Planning Conference held each Fall. In addition, members receive *Imprint*, published five times each year.

Each of the past five years NSNA has surveyednew RN graduates, former NSNA members, in September (Mancino, 2013). The purpose of these surveys is to

identifyemployment trends, nationally and regionally; evaluate basic educational preparation and future plans; and elicit new RN perspectives on the nursing shortage. In September 2012, a convenience sample of NSNA members who indicated spring 2012 as their graduation date on their membership record were emailed a request to participate in this study which used Survey Monkey for its online questionnaire. After excluding opt-outs and bounced emails, 12,835 were sampled and 4,110 responded, a 32% response rate. Tables 1, 2 and 3 describe selected demographics of the respondents.

Table 1.New Graduates Who Entered Nursing School with Previous Degrees and Certifications

	Number	Percentage
Total Entering with Non-Nursing Degree	1,838	45%
Bachelor's Degree	1,059	58%
Associate's Degree	660	36%
Master's Degree	109	6%
Doctorate or Medical Doctorate	10	1%
Total Entering as Licensed Practical/ Vocational Nurses	179	5%
Total Entering as Former Pre-Medical Students	471	12%
Total Entering as Certified Nursing Assistants/ Home Care Aides	1,242	35%

**Table 2.Employment 4 Months Post-Graduation, by Nursing Program** 

Are you currently employed as an RN?	Yes	No	Total
Type of Program			
Associate Degree	61% (966)	39% (614)	1,580
Diploma (Hospital-Based School of Nursing)	70% (87)	30% (38)	125
BSN Pre-Licensure	72% (1,361)	28% (539)	1900
Accelerated BSN	58% (218)	42% (156)	374
Master's Degree (Pre-Licensure)	61% (27)	39% (17)	44
Clinical Nurse Leader Master's (Pre-Licensure)	50% (13)	50% (13)	26
RN to BSN (Post-Licensure)	76% (16)	24% (5)	21

Table 3.Percentage of New Graduates Employed 4 Months Post-Graduation (2009-2012), by Region

Year	South	West	Northeast	Central
2009	69%	41%	50%	60%
2010	64%	41%	50%	60%
2011	70%	55%	61%	72%
2012	74%	55%	60%	73%

The respondents of the 2012 Annual Survey graduated from all variety of RN programs: diploma (3%), associate (39%), baccalaureate (47%), accelerated BSN (9%) and other (2%) (Mancino, 2013). Sixty-six percent of respondents were employed as registered nurses (RNs). Seventy percent of diploma graduates, 61 percent of associate degree graduates, 72 percent of baccalaureate graduates, and 58 percent of accelerated BSN graduates were employed as RNs.

The educational preparation of the NSNA survey respondent group, the sample population of the present study, can be compared to the national registered nurse population using findings from the 2013 National Nursing Workforce Survey of Registered Nurses (NNWSRN)(Budden, Zhong, Moulton, & Cimiotti, 2013). This product was a joint effort between the National Council of State Boards of Nursing(NCSB) and the Forum of State Nursing Workforce Centers (FSNWC). Previously, this data was collected by the Health Resources and Services Administration (HRSA) through the National Sample Survey of Registered Nurses (NSSRN). The NSSRN survey was first conducted in 1977 and, beginning with the 1980 survey, had been conducted every four years (U.S. Department of Health and Human Services, Human Resources and Services Administration, 2010). The last survey was conducted in 2008. The NCSB and the FSNWC collaborated to develop the 2013 survey of nursing workforce to collect similar data.

The 2013 NNWSRN (Budden et al., 2013) findings on basic nursing education compares similarly with that of the findings of the 2012 NSNA Annual New Graduate Survey (Mancino,

2013). While nationally 36% of survey respondents indicated the baccalaureate degree as the credential that qualified the respondent for their first nursing license, 47% of respondents to the 2012 NSNA survey had initial education at the baccalaureate level and another 9% graduated from programs that conferred accelerated baccalaureate degrees. The findings of the 2013 NNWSRN also reveal that many registered nurses pursue additional degrees after completion of their initial education: 61% of respondents revealed that they had obtained a BSN or higher. With regard to baccalaureate educational preparation, although the findings of the 2013 NNWSRN reveal a lower baccalaureate rate of initial preparation for licensure (36%) than the 2012 NSNA findings (56%), there are more nurses in the 2013 NNWSRN who reported having attained baccalaureate degrees (61%). In both the 2013 NNWSRN study (Budden et al., 2013) and the 2012 NSNA study (Mancino, 2013), 39% of respondents indicated the associate degree as their initial nursing degree and 5% of respondents indicated they held a licensed practical nurse license prior to qualification for the first registered nursing license. However, there was a difference between the two surveys on the percentage of nurses reporting diploma as their initial credential or degree: the 2013 NNWSRN study (Budden et al., 2013) revealed 18% of respondents attained diplomas as their initial education whereas the diploma degree in nursing was attained as the initial education by only3% of the respondents in the 2012 NSNA study (Mancino, 2013). In conclusion, the 2012 NSNA study respondents can be considered representative of nurses who had licensed practical/vocational preparation prior to entry into nursing school, and those who have attained either associate or baccalaureate degrees but not nurses who graduated from diploma schools.

In 2012, 4,110 new RN graduates responded to the annual NSNA survey and 3,803 provided "a permanent email address and expressed a willingness to participate in a follow-up

survey" (Mancino, 2013). Dillman, Smyth, and Christian (2009) offer several perspectives on why people respond to surveys. The economic exchange view of survey response posits that response rates may increase substantially with a monetary reward. Additionally, Dillman and colleagues (2009) apply the social exchange theory to survey design in order to focus on appealing to potential respondents in multiple ways and propose that people who are provided an incentive in advance may feel obligated to reciprocate for the reward by responding to the survey. The leverage-saliency theory of survey response proposed by Groves, Singer, and Corning(2000) suggests that a single survey design attribute will have different leverages on the cooperation decision for different people and they demonstrated that the positive effect of an incentive is diminished when community involvement is a likely motivator for cooperation. For this study, respondents were asked submit their email address if they wish to participate in a drawing for a gift card as an incentive. However, it was proposed that the NSNA alumni will continue their interest in survey response as they participated in the first round, perhaps through a sense of community with other NSNA alumni and they willingly provided a permanent email address for a follow up survey.

## Sampling

The new RN graduates in the 2012 NSNA survey whoagreed to participate in a follow-up survey received an email invitation to participate in this study. The invitation explained the purpose of the study and included a web link to the survey. The researcher posted the survey tool using an online data collection site using Survey Monkey. Many of the guidelines for web survey implementation (Dillman et al., 2009) were followed to maximize participant response, including the following:

- Contacts were personalized without compromising the anonymity of the survey
  respondents and were distributed under the auspices of NSNA so as not to compromise
  the integrity of its mailing list.
- 2. A three-contact strategy was employed as suggested by Dillman and colleagues (2009).
  - a. The first contact introduced the survey and its importance.
  - b. The second thanked those who already completed the survey and served as a reminder for those who had yet to complete.
  - c. The third email emphasized the urgency of response as the deadline drew near.

    These three contacts were strategically timed and did not to interfere with any of the holidays in the given timeframe and were short and to the point.
- 3. A time line wasimplemented to periodically and methodically establish procedures to address bounced emails, respondent inquiries and a system for monitoring progress and evaluating early completes, as recommended by Dillman and colleagues (2009).
- 4. Respondents were asked at the completion of the survey to submit their email address if they wish to be eligible for one of several gift card incentives that will be offered.

# The Sample

The sample that was surveyed was 3,803 National Student Nurses' Association (NSNA) alumni who responded to the 2012 NSNA Annual Survey who answered that they would participate in a follow up survey and provided a permanent email address. The survey was distributed in January 2014. The sample consisted of new RNs who have mainly graduated in the spring and summer of 2012. Therefore, they were at least a year past graduation of their initial nursing education.

The estimated sample size needed for a test of the basic multiple regression null hypothesis is that  $R^2$  = .00 (Polit, 2010). To achieve a power of .80 with a significance criterion of .05 for 3 predictor variables, the estimated sample size for this study is at least 77 participants. This results in a moderate effect size,  $R^2$  = .13.An alternative approach to estimating sample size is to state that the sample size (N) should be greater than 50 + 8 times the number of predictors (Tabachnick &Fidell, 2012). For this study then, the sample size should be greater than  $50 + (8 \times 3)$  or 84. Given the potentially large sample, even with an adequate response rate between 33% (Nulty, 2008) and 52.7% (Baruch & Holtom, 2008), the potential return could be over 1,000, yielding more than adequate power for this analysis. A total of 1,097 responded to the survey, 1,023 provided usable data, yielding a 29% response rate. Actual power is calculated in the results.

# **Instrumentation and Operational Definitions of Research Variables**

A questionnaire or survey was developed that incorporated measures of each of the variables under study. Embedded in the survey was a combination of items from each of the measures of interest organized without labels delineating their origin. Dillman and colleagues (2009) recommend grouping questions in the way knowledge of the topics are likely to be organized, much like a conversation, and suggest beginning with questions that are likely to be relevant to most respondents. For this survey, demographic questions were placed last, preceded by questions to measure the independent variables spirituality, altruism and prosocialness; the mediating variable volunteerism; and the dependent variables caring behavior and satisfaction with career choice.

## **Independent Variables**

The antecedent, predictor or independent variables under study were spirituality, altruism and prosocialness. Each was measured with specific instruments. Spirituality was measured using the Spirituality Transcendence Index (STI)(Seidlitz, Abernethy, Duberstein, Evinger, Chang, & Lewis, 2002). The Self-Report Altruistic (SRA) Scale (Rushton, Chrisjohn, &Fekken, 1981) was used to measure altruism. The Prosocialness Scale for Adults (Caprara, Steca, Zelli, & Capanna, 2005) was used to measure prosocialness.

## **Spirituality**

Spirituality was measured using the Spiritual Transcendence Index (STI)(Seidlitz et al., 2002). Subjects were asked to respond on a 6-point scale from strongly disagree to strongly agree to each of the items by indicating the one number that most closely describes the extent to which they may agree or disagree with each of the statements. There is not a neutral response, forcing a choice, as per the original scale. Seidlitz and colleagues (2002)identified a need to focus on perceived psychological effects of one's spirituality rather than on specific behaviors or beliefs and a need to focus on a conceptual core of spirituality, deliberately omitting religion. The scale was developed over three studies.

In the first study, a construct of spiritual transcendence and a preliminary pool of items to measure it were developed and refined through various stages of the study, resulting in a 32-item penultimate version of the STI. There were two subscales, the God subscale and the Spiritual subscale, each consisting of 16 items. These items were spread across four domains: affective, cognitive, motivational, and transcendent.

The second study aimed to identify subsets of the best performing items evenly distributed across the two subsets and the four domains and tested the 32-item penultimate

version of the STI in three separate samples. Additionally, several other measures were included to examine the convergent and discriminant validity of the items selected for the final version of the STI. After the internal consistencies of each of the 32 items were examined in the three data sets, eight items were selected for inclusionin the final scale based on their distribution across the two subscales and four content domains, and their relatively higher corrected item total correlations and higher factor loadings across the three samples. The STI was associated with having a religious affiliation (M = 4.39, SD = 1.22 vs. M = 2.39, SD = 0.99), t(114) = 6.68, p < 0.001, supporting the validity of the STI. The final STI was correlated with the Duke Religion Index (DUREL) (Koenig, Parkerson, & Meador, 1997) and its components of organizational, nonorganizational, and intrinsic religiousness, p < 0.001.

Study 3 participants received a questionnaire that included the final version of the STI and several scales to test the convergent and discriminant validity, including the DUREL (Koenig et al., 1997), the PANAS-X (Watson & Clark, 1994) assessing spiritual or mystical experiences and the Self-Regulation Questionnaire—Religiousness (SRQ-R, short version)(Ryan, Rigby, & King, 1993), measuring two types of religious motivation labeled identification, which is an internalized and intrinsic form of motivation, and introjection, an extrinsic form of motivation. Two separate sample lists were used, one for older and one for younger subjects so that generalizability could be demonstrated in both the older and younger adults samples as well as the combined sample.

The psychometrics of the final 8-item scale was consistent with the findings of the earlier administrations. The reported Cronbach's alpha coefficient was 0.957 for the Spirit subscale and 0.966 on the God subscale. In addition, a single underlying factor explained 83 percent of the variance. Pearson Correlations of the STI with related measures were each significant, p<0.001,

demonstrating convergent and discriminant validity. The STI demonstrated convergent validity (r=0.87, p<0.001) with the Duke Religious Index (DUREL)(Koenig et al., 1997). The STI also demonstrated discriminant validity by its higher correlation with intrinsic religiousness than with organizational religiousness or non-organizational religiousness and its higher correlation with identified religious motivation than with introjected religious motivation, all at p<0.001. This will be a proxy for understanding this distinction.

Spirituality was operationally defined as an average score of greater than 3.5 on the Spiritual Transcendence Index (STI)(Seidlitz et al., 2002), the score that is considered the midpoint of the STI as the instructions suggest, although the midpoint for this study sample was calculated and assessed against the scale. The psychometric characteristics of the final STI indicated excellent factor loadings on all eight items, 0.862 to 0.931 and each of the two subscales had alphas of 0.966 (God subscale) and 0.9527 (Spirit subscale) (Seidlitz et al., 2002).

### **Altruism**

The Self-Report Altruistic (SRA) Scale, a 20-item scale that gauges the frequency that one engages in altruistic acts, primarily towards strangers(Rushton et al., 1981) was used to measure altruism. The SRA has a self-report format. Respondents are instructed to rate the frequency with which they have engaged in altruistic behavior using the categories "never," "once," "more than once," "often," and "very often."

The SRA demonstrated psychometric stability on initial analysis of data collected from two different samples of students, yielding comparable means (52.01 vs. 55.34), and standard deviations (10.12 vs. 10.46), and high internal consistency (0.84 vs. 0.83). Additionally, the correlation between the SRA and a measure of social desirability (r = 0.05) from an omnibus personality inventoryindicated that the SRA is not merely measuring the tendency to answer in a

socially desirable fashion. Three more studies were conducted by Rushton and colleagues (1981) to test the predictive validity of the SRA.

Since the SRA-scale is self-report, Rushton and colleagues (1981) tested the correlations of SRA-scale scores with peer ratings of altruism. After a sample of students completed the SRA, self-selected peers were given peer rating forms, eight for each student. The peer rating form was divided into two sections. One section asked the peers to assess the student using the SRA and another section asked the peers to rate the student, on a 7-point scale, on four global ratings of altruism: caring, helpfulness, considerate of others' feelings, and willingness to make sacrifice. Findings suggest reliability and some degree of consensus among peers in their ratings of the students on both the peer-rated-SRA-scale altruism scores (r(78) = +0.51) and the peerrated-global-altruism measures (r(78) = +0.39), p = 0.001. The validity of the SRA-scale was assessed by correlating it with the peer ratings and then recomputing to correct for attenuation due to unreliability of the measurement. Spearman's correction formula was then used and coefficient alpha was substituted as the reliability of the SRA-scale and the interrater reliabilities were substituted as reliabilities for the peer ratings. The correlations of the SRA-scale with peerrated SRA-scale altruism was r (78) = 0.56 and with the peer-rated-global-altruism was r (78) = 0.33.

In another study, Rushton and colleagues (1981) sought to provide further evidence for the consistency of altruism by demonstrating that the SRA-scale would be related to other measures of altruism. The SRA-scale was correlated with eight "altruistic" responses: volunteering to read to blind persons in response to telephone solicitation; volunteering to participate in experiments for a needy experimenter; whether they have ever taken a first aid course; whether they completed an organ donation card; a questionnaire measuring "sensitive"

attitudes; a nurturance scale; measures of helping in emergency "scenarios;" and having helping interests. The SRA-scale was found to be positively and significantly correlated to four measures: completion of an organ donation card (p<0.05), sensitive attitude (p<0.01), nurturance (p<0.01), and simulation scenarios (p<0.01).

For the third study, Rushton and colleagues (1981) tested the SRA-scale for convergent validity by examining the relationship between the SRA-scale and eight different existing tools that measured social responsibility, empathy, moral judgment, and prosocial values. The SRA-scale correlated positively with these measures (p<0.001 to p<0.05) and also predicted an aggregated composite measures of prosocial value at r(135) = +0.44 (p<0.001).

Altruism was operationally defined as an average score of greater than 3 on the Self-Report Altruism (SRA) Scale (Rushton et al., 1981). A score of 3 on the scale indicates that the participant has engaged in the activity more than once. For the purposes of this study, participants need to have, on the average, engaged in activities listed on the SRA-scale more than once to be considered altruistic.

#### **Prosocialness**

The Prosocialness Scale for Adults (Caprara et al., 2005), a sixteen-item scale, was used to measure prosocialness. Respondents were instructed to carefully read each phrase and mark the answer that reflects their first reaction as there is no "right" or "wrong" answers. For each prosocialness item, respondents indicated, on a five-point Likert scale whether the statement is never/almost never true (coded as 1), occasionally true (coded as 2), sometimes true (coded as 3), often true (coded as 4), and almost always/always true (coded as 5).

Developmental psychology researchon prosocialness indicates prosocial behavioral development stabilizes during late childhood and early adolescence, rising from developmental

and psychological processes of attention and evaluation, moral reasoning, social competence, and self-regulatory capacities (Caprara & Pastorelli, 1993; Eisenberg, Carlo, Murphy, & van Court, 1995). In a longitudinal study of prosocial development in early adulthood (up to age 26), Eisenberg and colleagues (2002) found that there was inter-individual consistency in prosocial behavior and prosocial disposition in early adulthood related to empathy/sympathy at much younger ages.

Less is known about the psychological meaning of prosocialness for personal well-being later in life. It is in adulthood that prosocial behavior may have a particular importance and meaning such as in the work place and with increasing age and age-related declines in ability. It is also in adulthood that the relation between gender and prosocialness may find its fullest meaning. Belansky and Boggiano (1994), for example, found that women were more likely than men to help and women helped in a more nurturing way than men, where men did not differ in their helping behaviors. The body of research on gender differences in prosocial responding comes primarily from studies on adolescents. In light of these considerations, it becomes vital to assess and measure prosocialness in adults (Caprara, et al., 2005).

The tool was developed using the principles and methods of item response theory (IRT), where participant response can be predicted by latent traits and the relationship between the participant's item performance and latent trait can be plotted to illustrate an item characteristic curve, ICC (Waltz, Strickland, & Lenz, 2010). The instrument was developed based on a five-point response scale. For an IRT method of analysis for polytomous items, Caprara and colleagues (2005) chose Generalized Partial Credit Model (G-PCM) because the responses were conceptualized as ordered categories.

Classical test theory (CTT) statistics were obtained for the sixteen prosocialness items. The Cronbach's alpha for the entire set of items was .91. The mean corrected item-total correlation was .59. Caprara, et al. (2005) found that CTT could not address measurement precision of single items, nor was CTT sensitive to estimating differing latent traits. Item response Theory (IRT) was employed to address these shortcomings.

To assess unidimensionality of the prosocialness scale, the percentage of the variance explained by the first two unrotated components were compared and the ratio was found to be 5:1, supporting the unidimensionality of the scale. The IRT parameters of slope, category and location were similar to CTT statistics. However, nine of the items were sensitive enough to detect slight differences in prosocial behavior. The mean information value for the entire scale is 8.54, with greater information concentrated at the lower and middle levels, indicating that the prosocialness scale discriminates very well among relatively moderately prosocial individuals. The mean standard of error is .43 and is greatest at the relatively higher levels, indicating that the scale does not discriminate as well among the highly prosocial individuals. Finally, an IRT analysis was performed to determine how well the items functioned across gender groups. The sixteen items were found to have equal capacity to discriminate among male and female adults and when item parameters were freely estimated for males and females, there was a substantial improvement in the model, p < 0.001 (Caprara et al., 2005).

Prosocial behavior was operationally defined as an average score of 3 or greater on the Prosocialness Scale for Adults (Caprara et al., 2005). On this scale, the participant chose 3 if the statement is sometimes true. For the purposes of this study, a participant needed to agree with statements of prosocial behavior that are on average sometimes true to be considered prosocial.

## **Mediating Variable: Volunteerism**

In their work on distinguishing moderators and mediators in social psychological research, Baron and Kenny (1986) outline three conditions for a variable to meet in order to function as mediator. First, variations in levels of the independent variable significantly account for variations in the mediator. In the present study, it is hypothesized that variations in levels of spirituality, altruism and prosocialness will significantly account for variations in the level of volunteerism engaged in by the research participants. Second, according to Baron and Kenny (1986), variations in the mediator significantly account for variations in the dependent variable. In the present study, it is hypothesized that variations in the level of volunteerism engaged in by the research participants will significantly account for variations in the level of caring behaviors reported and satisfaction with career choice.

Third, according to Baron and Kenny (1986)when both the first and second paths described above are controlled, a previously significant relation between the independent and dependent variables is no longer significant, with the strongest demonstration of mediation occurring when this last path is found to be zero. In the present study, then, the independent variables spirituality, altruism and prosocialness are hypothesized to have less significant correlation to the dependent variables caring behaviors and satisfaction with career choice when volunteerism is removed from the model. As Holmbeck (1997) describes, there first has to be a relationship between the independent variables and the dependent variables otherwise there is no relationship to mediate. If the relationship between the independent variables and dependent variables is strong then a mediator may explain how or why the mediator predicts the outcome (Bennett, 2000).

The survey included questions about the nature of the volunteerism participated in by the research participants and the qualitative data derived will be dummy-coded for entry into the regression equations. This procedure determined whether the nature of the volunteerism affects the mediation of the model.

## **Dependent Variables**

The criterion, outcome or dependent variables under study was caring behaviors and satisfaction with career choice. The Nyberg Assessment Scale (Nyberg, 1990) was used to measure caring behaviors. Satisfaction with career choice was measured as response to survey questions constructed to elicit a response on a Likert-like scale.

### **Caring Behaviors**

The Nyberg Assessment Scale (Nyberg, 1990) was used to assess human caring. In her 1990 study, Nyberg addressed how nurses continue to advocate for human caring in a cost-cutting economic environment. Randomly selected staff nurses in seven hospitals received questionnaires that explored nurses' reactions to recent economic changes. The hospitals ranged from profit to non-profit, private to public, urban to suburban, teaching to non-teaching, 125-bed to 400-bed. A total of 50 surveys per hospital were sent and 135 were returned, a 38.57% response rate. Additionally, the nurse executives of each facility was interviewed and asked to define their impressions about human care and economics. The nurse executives agreed that human care was the goal of nursing but economics could not be ignored and, in fact, these two concepts were interdependent.

The questionnaire developed by Nyberg(1990) identified a number of caring attributes from previous studies, including Watson (2012), and included "deep respect for the needs of others," "expresses positive and negative feelings," "believes that others have a potential to be

achieved," and "remains committed to a continuing relationship." A series of questions were asked that focused on the attributes as an ideal scale (how important are the attributes?), an actual scale (how often are the attributes used in daily practice?), a supervisor scale (how often does your supervisor use the scale?), and a five-year scale (how have the attributes changed in the past five years?). The Care-Q tool (Larson, 1984) was also used. Caring behaviors focused on in this tool are "checks on patient frequently," "suggests questions for the patient to ask his/her doctor," "sits down with the patient," and "knows how to give shots, IVs, etc."

Nyberg (1990) piloted the twenty-item questionnaire, using graduate nursing students. Reliability for the subscales of the tool (ideal, actual, supervisor, and five-year) was established that ranged from 0.87 to 0.98 using Cronbach's alpha coefficient. Reliability for the questionnaire for the study population ranged from 0.85 to 0.97.

The mean scores and standard deviations in this study (Nyberg, 1990) indicated that nurses view caring as very important (4.1 out of 5), they use these attributes often (3.9) and practice about the same as five years ago (3.4). The high standard deviation score on the supervisor scale indicated extreme scores where some supervisors scored very high and some very low. A two-factor analysis of variance determined that there were significant differences between the ideal, actual, five-year and Care-Q subscales of the questionnaire and significant differences between hospitals only in the five-year scale and supervisor scale. Lastly, the correlation between caring scores and economic indicators were calculated, adjusting nursing hours per patient day by case mix index to control for patient acuity. The correlation coefficient was .73, p = 0.004, indicating that hospitals with higher hours per patient day exhibited higher actual caring scores.

This survey has been subsequently used to measure the results of nursing practice changes, although results of the studies have not been provided(Watson, 2009). The present study will incorporate the survey as part of the larger questionnaire that research participants will complete.

Caring was operationally defined as an average score of 4 on the Nyberg Caring

Assessment Scale (Nyberg, 1990). The scale, as administered in this study, resulted in scores
that indicate whether participants view caring as very important and whether they use these
attributes often in their daily practice. The results of this study indicated that nurses view caring
as "very important" (score of 4.1 out of 5) and that nurses use these attributes "often" (score of
3.9 out of 5). Actual raw mean scores were used as interval data as the scale used is considered
to have equal intervals measured from an arbitrary point and no meaningful zero value (Cohen,
Cohen, West, & Aiken, 2003). Also referred to as continuous variables, they are measured on a
scale that changes values smoothly rather than in steps where the size of the number reflects the
size of the variable (Tabachnick & Fidell, 2012).

### **Satisfaction with Career Choice**

Satisfaction with career choice was operationally defined as response to survey questions constructed to elicit a response on a Likert-like scale. The three questions were developed using questions that Kovner and colleagues (2007) employed in their study on the characteristics, work attitudes, and intentions to work of newly licensed RNs as a guide. There were three questions about job satisfaction. The words in the questions that relate to job satisfaction were replaced with satisfaction with career choice. The choices were on scale similar to the other scales used in the survey, where the lower numbers indicate lesser satisfaction and the higher numbers indicate

higher satisfaction. A midpoint was determined by the responses received and this dependent variable yielded interval data, with relative satisfaction measured above and below this midpoint.

#### **Data Collection**

Two thousand seven hundred and one of 4,110 (66%) new graduates provided a permanent email address in responding to the 2012 National Student Nurses' Association's 2012 survey, agreeing to participate in a follow up survey (Mancino, 2013). This is a convenience sample (Polit & Beck, 2012). Conclusions drawn from participant response may be limited in generalization to this population. If the ratio of observations to independent variables falls below five, there is a risk of making the results too specific to the sample, "overfitting," thus lacking generalizability (Barlett, Kotrlik, & Higgins, 2001).

### **Ethical Considerations**

## **Category of Review**

A research proposal was submitted to the Molloy Institutional Review Board (Appendix A). A request for an exempt status was granted. The survey methodology of data collection proposed involves no apparent risk to participants (Polit & Beck, 2012). This proposal meets the exempt category requirement that responses are essentially anonymous, other than the email list used to distribute it on the Internet which will not be accessible to the researcher.

#### Consent

Participants were invited by email and the study was described stating that their completion is their informed consent. The invitation letter with information about the study (Appendix B) includeshow the participants were chosen, the title and purpose of the study, and how the findings may benefit others. The risks and benefits to participating in the study are outlined and the participants are informed that they are able to withdraw from participation

simply by not completing the online survey. The time necessary for completion of the survey are also included. Confidentiality related to their email contact is explained. Procedures for contacting the researcher for questions are provided. The use of the results of the study in publications and conferences is described.

## **Data Preparation**

Survey Monkey exports data into SPSS format for analysis with labels and codes embedded. Additional coding and data calculations per the measurement plan were done on the SPSS data set. The Likert-like scales used in each of these instruments have responses that range from +1 to +5, with the exception of the second scale, Spirituality, that has a Likert-like scale of +1 to +6. The choices on all scales indicate that the lower numbers are least agreement and the higher numbers are higher level of agreement. There were not any questions worded negatively, therefore, reverse coding was not necessary. Categorical data in the questionnaire, such as gender, was dummy-coded.

The demographic data (Appendix C) was exported as part of the web survey exports.

The entire questionnaire included both components as it is important for the demographic questionnaire each participant be coupled with their corresponding scores on each of the four instruments.

### **Planned Analysis**

The SPSS data set was coded and cleaned and assumptions for linear regression were met as determined through assessment of normality, linearity, and homoscedasticity (Tabachnick & Fidell, 2012). "Examination of residuals scatterplots provides a test of assumptions of normality, linearity and homoscedasticity between predicted DV scores and errors of prediction" (p.125). The planned analysis then proceeded. Pearson Correlation Coefficients estimated

relationships between the predictor variables and the outcome variables. Regression was used to assess the degree with whicheach of the predictor variables of spirituality, altruism and prosocial behavior and selected demographics influence volunteerism. Regression was also used to assess the degree that volunteerism predicts caring behaviors measured with The Nyberg Caring Assessment Scale and the degree that the participant is satisfied with their career choice.

## **Procedure for Answering Research Questions**

Participant responses were coded and loaded into SPSS 22. Descriptive statistics and a correlation matrix were run on the study demographics and variables, prior to regression. These procedures answered the study questions. The null hypotheses are specified in the following section.

## Demographics and Volunteerism

- H<sub>0</sub>: Demographic characteristics are not related to volunteerism in the new nurse.
- H<sub>1</sub>: Demographic characteristics are related to volunteerism in the new nurse.

Demographic characteristics were displayed in a frequency distribution and a correlational matrix was computed. Based on data type the matrix displayed either the Phi Coefficient, Spearman's rho, Point Biserial or Rank Biserialthat estimates the relationship between each demographic characteristic and volunteerism in the new nurse.

## Internal Characteristics and Volunteerism

- H<sub>0</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are not related to volunteerism in the new nurse.
- H<sub>1</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are related to volunteerism in the new nurse.

Mean scores and sum scores for caring, spirituality, altruism and prosocialness werecomputed. These results were correlated and displayed in a correlation matrix. Pearson Correlation Coefficients estimate the relationship between the independent variables in this study, spirituality, altruism, and prosocialness and volunteerism in the new nurse. Linear regression analysis was used to assess the degree to which spirituality, altruism and prosocialness predict volunteerism.

## External Opportunities and Volunteerism

- H<sub>0</sub>: External opportunities such as service learning or other pre-professional volunteering are not related to volunteerism in the new nurse.
- H<sub>1</sub>: External opportunities such as service learning or other pre-professional volunteering are related to volunteerism in the new nurse.

A correlational matrix was computed and displayed the Pearson Correlation Coefficients that estimatethe relationship between external opportunities and volunteerism in the new nurse. Linear regression analysis was used to assess the degree to which survey questions related to preprofessional volunteering predict volunteerism in the new nurse.

## Volunteer Experience and Caring Behaviors

- H<sub>0</sub>: Volunteer experience at the local, national or international level does not influence caring behaviors in the new nurse.
- H<sub>1</sub>: Volunteer experience at the local, national or international level does influence caring behaviors in the new nurse.

A correlational matrix was computed and displayed the Pearson Correlation Coefficients that estimate the relationship between volunteer experience at the local, national or international level and caring behaviors in the new nurse.

Volunteer Experience and Satisfaction with Career Choice

- H<sub>0</sub>: Volunteer experience at the local, national or international level does not influence satisfaction with career choice in the new nurse.
- H<sub>1</sub>: Volunteer experience at the local, national or international level does influence satisfaction with career choice in the new nurse.

A correlational matrix was computed and displayed the Pearson Correlation Coefficients that estimate the relationship between volunteer experience at the local, national or international level and career choice in the new nurse.

Demographics and Caring Behaviors:

- H<sub>0</sub>: Demographic characteristics are not related to caring behaviors in the new nurse.
- H<sub>1</sub>: Demographic characteristics are related to caring behaviors in the new nurse.

Demographic characteristics were displayed in a frequency distribution and a correlational matrix was computed. Based on data type the matrix displayed either the Phi Coefficient, Spearman's rho, Point Biserial or Rank Biserial that estimates the relationship between each demographic characteristic and caring behaviors in the new nurse.

Internal Characteristics and Caring Behaviors:

- H<sub>0</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are not related to caring behaviors in the new nurse.
- H<sub>1</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are related to caring behaviors in the new nurse.

Mean scores and sum scores for caring, spirituality, altruism and prosocialness were computed. A correlational matrix was computed and displayed the Pearson Correlation Coefficients that estimate the relationship between spirituality, altruism, and prosocialness and

caring behaviors in the new nurse. Linear regression analysis was used to assess the degree to which spirituality, altruism, and prosocialness predict caring behaviors in the new nurse.

Internal Characteristics and Satisfaction with Career Choice

- H<sub>0</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are not related to satisfaction with career choice in the new nurse.
- H<sub>1</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are related to satisfaction with career choice in the new nurse.

Mean scores and sum scores for caring, spirituality, altruism and prosocialness were computed. A correlational matrix was computed and displayed the Pearson Correlation Coefficients that estimate the relationship between spirituality, altruism, and prosocialness and satisfaction with career choice in the new nurse. Linear regression analysis was used to assess the degree to which spirituality, altruism, and prosocialness predict satisfaction with career choice in the new nurse.

External Opportunities and Satisfaction with Career Choice

- H<sub>0</sub>: External opportunities such as service learning or other pre-professional volunteering are not related to satisfaction with career choice
- H<sub>1</sub>: External opportunities such as service learning or other pre-professional volunteering are related to satisfaction with career choice

A correlational matrix was computed and displayed the Pearson Correlation Coefficients that estimate the relationship between external opportunities such as service learning and other pre-professional volunteering and satisfaction with career choice in the new nurse. Linear regression analysis was used to assess the degree to which external opportunities such as service

learning and other pre-professional volunteering predict satisfaction with career choice in the new nurse.

Demographics, Internal Characteristics, External Opportunities, Volunteer Experience, Caring Behavior and Satisfaction with Career Choice

- H<sub>0</sub>: Demographics, internal characteristics and external opportunities, combined with volunteer experience, are not predictive of caring behavior and satisfaction with career choice.
- H<sub>1</sub>: Demographics, internal characteristics and external opportunities, combined with volunteer experience, are predictive of caring behavior and satisfaction with career choice.

The initial plan was to test this relationship through statistical tests for a mediator effect (Baron & Kenny, 1986), using three regression equations. First, the mediator (volunteerism) was regressed on each of the independent variables (spirituality, altruism and prosocialness). Then, each of the dependent variables (caring behaviors and satisfaction with career choice) was regressed on each of the independent variables (spirituality, altruism and prosocialness). Finally, each of the dependent variables (caring behaviors and satisfaction with career choice) was regressed on both the independent variables (spirituality, altruism and prosocialness) and on the mediator (volunteerism).

To establish mediation (Baron & Kenny, 1986), the following conditions must hold:

1. Each of the independent variables (spirituality, altruism and prosocialness) must affect the mediator (volunteerism) in the first equation.

- 2. The independent variables (spirituality, altruism and prosocialness) must be shown to affect the dependent variables (caring behavior and satisfaction with career choice) in the second equation.
- 3. The mediator (volunteerism) must affect the dependent variables (caring behaviors and satisfaction with career choice) in the third equation.

If these conditions all hold in the predicted direction, then the effect of the independent variables (spirituality, altruism and prosocialness) on the dependent variables (caring behaviors and satisfaction with career choice) must be less in the third equation than in the second equation.

Perfect mediation occurs when the independent variables have no effect when the moderator is controlled (Baron & Kenny, 1986).

This widely used approach to determining mediator effects was found to have "Type I error rates that are too low in all the simulation conditions and have very low power, unless the effect or sample size is large" (MacKinnon, Lockwood, Hoffman, West, & Sheets, 2002).

Instead, more recent approaches that include moderator variables in a path analysis are more powerful and provide more accurate Type I error rates (Edwards & Lambert, 2007; MacKinnon, Fairchild, & and Fritz, 2007)

Path analysis comprises the estimation of mediating effects as well as estimation of a complete prediction model of direct and indirect effects of complex relationships. A path analysis will be conducted to estimate mediating effects of the hypothesized variables. The mediator in this study is nurse volunteerism that is measured several different ways and is calculated in correlation and regression equations.

## **Chapter 4: Results**

### Introduction

This was a quantitative survey study with several open-ended questions, posted on an online survey collection site using Survey Monkey, a well-known data collection tool for on-line survey research. Atotal of 3769 surveys were sent to sample of registered nurses, over a year after graduation, who responded to an initial survey from the National Nurses Students Association stating that they would participate in follow up surveys. There were 56 surveys that bounced, presumably due to unusable email addresses, 10 who chose to opt out and 74 incomplete surveys deemed unusable (see Appendix J). The total number of respondents was 1,097, a twenty-nine percent response rate. Of the 1,023 cases in the final data set, 10 to 13 percent of respondents did not respond at random for any given survey question requiring a response.

## **General Description of Data**

## **Sample Characteristics**

The genders of participants in this study approximate the gender dispersion of the nursing workforce: 90.2% female (n=822), 9.8% male (n=89). The ages of participants are skewed towards a younger group, almost half are between 20 and 29 years of age (48.9%, n= 450), representing a sample of nurses that are one year post graduation. Almost half of the participants (44.6%, n=399) reported being the first born in their families, while 32% (n=286) reported being the second born and 23.4% (n=210) reported being the third born or greater. More than three quarters of participants (78.9%, n=719) were White, non-Hispanic, the next largest represented race were those who identified themselves as Hispanic (6.5%, n=59), followed closely by Asians (6.1%, n=56), then Black or African American (3.8%, n=35). Those identifying as Other,

including American Indian or Alaska Native and Native Hawaiian or Other Pacific Islander completed the group (4.7%, n= 43).

A majority of participants (65.3%, n=599) earned Bachelor degrees or higher as their basic Registered Nurse (RN) education. Trailing behind this number were those reporting Associate Degrees as their basic RN education (31.9%, n=293) and Diploma graduates (2.8%, n=26). Three quarters of participants (75%, n=679) are not presently enrolled in school. Of the remaining participants (25%, n=226) who are enrolled, the majority (64.7%, n=141) are enrolled in RN to BSN programs, with remainder enrolled in Master's in Nursing programs (35.3%, n=77). For this sample, almost half (44.2%, n=319) of the graduates without Bachelor degrees are enrolled in RN to BSN programs, while only 12.8% (n=77) Baccalaureate graduates are enrolled in Master's programs. Regardless of program, there are slightly more participants enrolled part time in school (54.1%, n=131) than full time (45.9%, n=111).

Nearly half of the participants are married or report being in a domestic partnership (48%, n= 439), while slightly less (44.1%, n=403) report being single, never married. The remaining participants are widowed (0.1%, n=1), divorced (6.7%, n=61), or separated (1.1%, n=10).

Slightly more participants (54.4%, n=493) have caretaking responsibilities than those who report that they do not (45.6%, n=413) have caretaking responsibilities. The overwhelming majority of respondents (94%, n=862) are employed in nursing and of that subgroup, the large majority (88.4%, n=761), are employed full time. A fraction of participants (2.1%, n=19) work but not in nursing.

The majority of participants are fairly evenly divided among four religion reporting groups: Protestant (21.8%, n=200), Roman Catholic (22.8%, n=209), Non-affiliated (23.3%,

n=238), and other (23%, n=235). The remaining fraction are Buddhists (2.1%, n=20), Jewish (1.4%, n=13) and Muslim (0.3%, n=1). When asked whether they considered themselves to be actively practicing their religion, slightly more participants reported they were (53.5%, n=477) than those that reported that they were not actively practicing their religion (46.5%, n=414).

The majority of participants (61.5%, n=563) were part of a National Student Nurses' Association (NSNA) Total School Program while 38.5% (n=352) were either not part of a total school program or could not recall.

Nearly two thirds of participants (65.7%, n=621) report having volunteered and participated in unpaid activity where they provided healthcare for underserved or underprivileged clients, while just over one third (34.3%, n=324) report not participating in the volunteer activity as described. Of those who did participate in the volunteer activity as described, over two thirds (69%, n=398), participated in school as required for course credit, over three quarters (78.1%, n=439) participated in school as a voluntary activity, and just under three quarters (71.1%, n=377) participated in not school-related, voluntary activity. Of those who did participate in the voluntary activity as described, the overwhelming majority of volunteer activity as described is reported as taking place at the local level (87.5%, n=489), followed by international volunteer activity (22.8%, n=105), and then national volunteer activity (14.9%, n=68). Many participants report having volunteered or continue to volunteer across multiple settings. A little more than a third of participants (34.1%, n=349) report participating in volunteer activity as described now and of those, 57.8% (n=218) participate once per week to five times per year and 42.2% (n=159) participate annually. Descriptive study characteristics are presented in Table 4.

**Table 4. Sample Characteristics** 

	Frequency = N		Percentage	
Gend	ler			
	Male	89	8.7%	
	Female	822	80.4%	
	Missing Values	112	10.9%	
Age				
	20 - 29	450	44.0%	
	30 - 39	272	26.6%	
	40 or older	198	19.4%	
	Missing Values	103	10.1%	
Birth	Order			
	First Born	399	39.0%	
	Second Born	286	28.0%	
	Third Born or greater	210	20.5%	
	Missing Values	128	12.5%	
Race				
	White, Non-Hispanic (N-H)	719	70.3%	
	Black or African American, (N-H)	35	3.4%	
	Hispanic	59	5.8%	
	Asian	56	5.5%	
	Other	43	4.2%	
	Missing Values	111	10.9%	
Basic	c Registered Nurse (RN) Education			
	Diploma	26	2.5%	
	Associate Degree	293	28.6%	
	Bachelor Degree or Higher	599	58.6%	
	Missing Values	105	10.3%	
Curre	ently enrolled in school			
	Yes	226	22.1%	
	No	679	66.4%	
	Missing Values	118	11.5%	

Currently enrolled, program that applies		
RN to BSN	141	13.8%
RN to MSN	16	1.6%
Master's in Nursing	61	6.0%
Missing Values	805	78.7%
Currently enrolled, status that applies		
Full time	111	10.9%
Part time	131	12.8%
Missing Values	781	76.3%
Marital Status		
Married or domestic partnership	439	42.9%
Widowed	1	0.1%
Divorced	61	6.0%
Separated	10	1.0%
Single, never married	403	39.4%
Missing Values	109	10.7%
Caretaking Responsibilities		
Yes	413	40.4%
No	493	48.2%
Missing Values	117	11.4%
Employment Status		
Full time in nursing	761	74.4%
Part time in nursing	78	7.6%
Per diem in nursing	23	2.2%
Work, not in nursing	19	1.9%
Does not work outside the home	13	1.3%
None Apply	23	2.2%
Missing Values	106	12.5%
Religion		
Buddhist	20	2.0%
Jewish	13	1.3%
Muslim	3	0.3%
Protestant	200	19.6%
Roman Catholic	209	20.4%
Non-affiliated	238	23.3%
Other	235	23.0%
Missing Values	105	10.1%

Actively practicing religion		
Yes	477	46.6%
No	414	40.5%
Missing Values	132	12.9%
National Student Nurses' Associa	ation (NSNA) Total School Prog	gram (TSP)
Yes	563	55.0%
No	352	34.4%
Missing Values	108	10.6%
Ever volunteer in an unpaid activ	ity, providing healthcare to the	underserved, underprivileged
Yes	621	60.7%
No	324	31.7%
Missing Values	78	7.6%
If yes, school-related, required for	or course credit	
Yes	398	69.0%
No	179	31.0%
If yes, school-related, voluntary		
Yes	439	78.1%
No	123	21.9%
If yes, not school-related, volunta	ary	
Yes	377	71.1%
No	153	28.9%
If yes, local volunteer activity		
Yes	489	87.5%
No	70	12.5%
If yes, national volunteer activity		
Yes	68	14.9%
No	456	85.1%
If yes, international volunteer act	ivity	
Yes	105	22.8%
No	355	77.2%
Volunteer now		
Yes	349	34.1%
No	596	58.3%
Missing Values	78	7.6%

If	now.	fred	uency
11	110 ,	1100	uciicy

218	21.3%
159	15.5%
378	37.0%
268	26.2%
	159 378

The preceding section described the characteristics of the participants of the present study. The next section will discuss the reliability of the measurement tools used to study the sample of participants whose characteristics were just described.

## **Reliability of the Measurement Instruments**

Tools, scales or instruments used to measure latent constructs in research must be evaluated for internal consistency reliability (Polit, 2010) to determine the quality of the tool. The most widely used estimate of reliability is Cronbach's alpha, a computed index with a normal range of values between .00 and +1.00. According to Polit (2010), "For group level comparisons, coefficients in the vicinity of .70 to .75 may be adequate...but coefficients of .80 or greater are highly desirable (p.355)."

In Table 5, the Cronbach's alpha values computed for the tools used in this study are compared to the Cronbach alpha values obtained in previously published studies that used the same tools. This ensures the internal consistency reliability of the measurement tools used in this study sample.

**Table 5. Reliability of the Measurement Instruments** 

	Cronbach's alpha in	
Instrument	Published Studies	Current Study
Self-Report Altruistic (SRA) Scale	.89	.886
Prosocialness Scale for Adults	.91	.929
Spiritual Transcendence Index (STI)	.862931	.976
Spirit Subscale	.957	.962
God Subscale	.966	.979
Nyberg Caring Assessment Scale	.8798	.926
Kovner's tool to measure characteristics, work attitudes and intentions to work of newly licensed RNs (derived):		
Satisfaction with Career Choice	>.7- >.8	.123

All of the instruments used in this study, with the notable exception of the derived tool used to determine satisfaction with career choice, demonstrated internal consistencies in scales and subscales with alpha values at or above those values reported in previous studies.

## **Descriptive Correlational Study (Descriptive Questions)**

This section describes the descriptive results of the variables under study: altruism, prosocialness, spirituality, caring behavior and satisfaction with career choice among a sample of nurses, a year after graduation, who also report on their volunteer activities.

## Self-Report Altruistic (SRA) Scale

The average score of the Self-Report Altruistic (SRA) Scale was 2.96 (SD= .60, range 1-5). The average score of the study participants indicates that there was only a slightly higher than average self-report of altruistic behaviors. The standard deviation of the study participants indicates little variability in their responses. There is difficulty in comparing these results to the studies used to develop the SRA Scale that reported combined means, range 52.01-57.11, and

standard deviation, range 8.89-11.70, for five samples of SRA-scale respondents (Rushon et al., 1981).

#### **Prosocialness Scale for Adults**

The average score of the Prosocialness Scale for Adults was 3.95 (SD= .62, range 1-5). The average score of study participants indicates a higher than average report of prosocial behaviors. The standard deviation of the study participants indicates little variability in their responses. These results are comparable to the findings of the studies that developed the Prosocialness Scale for Adults. Caprara and colleagues (2005) reported an overall mean of 3.52 and a standard deviation of .64.

## **Spiritual Transcendence Index (STI)**

The average score of the Spiritual Transcendence Index (STI) was 4.47 (SD= 1.45, range 1-6). The average score of the study participants indicates a higher than average report of spirituality and the standard deviation indicates some variation in the responses. The Spirit subscale had an average score of 4.56 (SD= 1.37, range 1-6) and the God subscale had an average score of 4.38 (SD= 1.59, range 1-6), indicating similar scores and variability in the subscales and the overall STI. These findings are comparable to the findings of the studies that developed the STI. Seidlitz and colleagues (2002) reported an overall mean of 4.55 and standard deviation of 1.35.

## **Nyberg Caring Assessment Scale**

The average score of the Nyberg Caring Assessment Scale was 4.19 (SD= .51, range 1-5). The average score of the study participants indicates a higher than average report of caring behavior and the standard deviation indicates little variability in their responses. There is difficulty comparing these results with the results of the study that Nyberg (1990) used to

develop the tool. Although there is mention of mean scores and standard deviations of the subscales of the questionnaires, they are not reported in a usable fashion for comparative analysis. Instead, the average scores for undesignated subscales are reported as "…nurses view caring as 'very important' (score of 4.1 out of 5), that they use the attributes 'often' (score of 3.9), that they practice the attributes 'about the same' as five years ago (score of 3), and that supervisors scored lower than the nurses themselves (score of 3.4)" (Nyberg, 1990, pp. 14-15). The standard deviation for the Nyberg Caring Assessment scale was only reported as being the highest for the supervisor scale. There was no actual value given nor was the supervisor subscale delineated.

### **Satisfaction with Career Choice (derived)**

The average score for the derived scale of Satisfaction with Career Choice was 5.8 (SD= 1.43, range 1-7). The average score of the study participants indicates a higher than average report of satisfaction with career choice. The items for the scale used in the present study were derived from the study by Kovner and colleagues (2007) on the characteristics, work attitudes and intentions to work. For each of the three items that they used to assess job satisfaction, the words "job satisfaction" as replaced with career choice. In the study by Kovner and colleagues (2007), the average score for Job Satisfaction was 5.2 (SD= 1.55, range 1-7). This compares favorably with the results of the present study, using the tool as a measure of satisfaction with career choice. Descriptive statistics for study measurement tools are presented in Table 6.

**Table 6. Descriptive Statistics for Measurement Instruments** 

Instruments	Mean	SD	Items/Range
Self-Report Altruistic (SRA) Scale	2.96	.60	20/1-5
Prosocialness Scale for Adults	3.95	.62	16/1-5
Spiritual Transcendence Index (STI)	4.47	1.45	8/1-6
Spirit Subscale	4.56	1.37	4/1-6
God Subscale	4.38	1.59	4/1-6
Nyberg Caring Assessment Scale Kovner's tool to measure characteristics, work attitudes and intentions to work of newly licensed RNs (derived)	4.19	.51	20/1-5
Satisfaction with Career Choice	5.8	1.43	3/1-7

## **Answering the Research Questions**

This study sought to describe how volunteerism results from characteristics of the new nurse and influences subsequent caring behaviors and satisfaction with career choice. This section will present each of the research questions, the hypotheses tested to determine the answers and the results of the hypotheses testing.

### What are the influencing characteristics of new nurses who volunteer?

This question determined whether demographic characteristics, internal characteristics or external opportunities were influencing characteristics of volunteerism in the new nurse. Three hypotheses were tested

The first hypothesis tested was:

H<sub>0</sub>: Demographic characteristics are not related to volunteerism in the new nurse.

H<sub>1</sub>: Demographic characteristics are related to volunteerism in the new nurse.

The single question that was used to determine whether demographic characteristics are related to the new nurse was: have you ever volunteered and participated in unpaid activity where you provided healthcare or underserved or underprivileged clients? Genderand agewere found to

have statistically non-significant correlations with having ever volunteered. Birth order was found to have a non-significant negative correlation with having ever volunteered. Table 7 displays the correlation between having ever volunteered and the demographic variables gender, age and birth order.

Table 7. Correlation Coefficients between the Variables: Ever Volunteer, Gender, Age and Birth Order

Variable	Ever Volunteer	Gender (Phi Coefficient)	Age (Point Biserial)	Birth Order (Rank Biserial)
Ever Volunteer	1.00	.008	.028	011

It was determined in this sample that having ever volunteered was significantly correlated with the level of BSN as basic nursing education (r= .095, p< .01). A significant negative correlation was determined to exist at the ADN level of basic nursing education (r= .086, p< .01). The negative correlation between Diploma education as basic nursing education and having ever volunteered was not determined to be statistically significant. Table 8 displays the correlations.

Table 8.Correlation Coefficients between the Variables: Ever Volunteer, Level of Basic Nursing Education

Variable	Ever Volunteer	Diploma (Phi Coefficient)	ADN (Point Biserial)	BSN (Point Biserial)
Ever Volunteer	1.00	030	086**	.095**

<sup>\*\*</sup>p<.01, two-tailed

Of those presently enrolled in school (n= 218), there was significant correlation between having ever volunteered and present enrollment in a Master's program (r= .188, p< .01). However, there was a non-significant negative correlation between having ever volunteered and

present enrollment in either a BSN program (r= -.118) or a MSN program (r=-.108) as displayed in Table 9.

Table 9. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer,
Present Enrollment in School by Program

Variable Master's	Ever Volunteer	Enrolled BSN	Enrolled MSN	Enrolled
Ever Volunteer	1	188	108	188**

<sup>\*\*</sup>p<.01, two-tailed

There were no significant correlations between having ever volunteered and school enrollment on a part time or full time basis (School: Part Time or Full Time). There was also no significant correlation between having ever volunteered and having caretaking responsibilities as displayed in Table 10.

Table 10. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer, School: Part Time or Full Time, Caretaking Responsibilities

Variable	Ever Volunteer	School: Part Time or Full Time	neCaretaking Responsibilities
Ever Volunte	er 1	0.51	.027

There were no significant correlations observed between ever volunteering and marital status as displayed in Table 11.

Table 11. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer and Marital Status

Variable	Ever Volunteer	Married or Domestic Partnership	Widowed, Divorced or Separated	Single, Never Married
Ever Volunteer	1	0.18	014	011

Only one significant correlation was found between ever volunteering, religious affiliation and the actively practicing religion in the study sample. Those participants who identified as Protestant were positively correlated as ever volunteering(r= .069, p< .05) as shown in Tables 12 and 13.

Table 12. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer, Buddhist, Jewish, Muslim, Protestant

Variable	Ever Volunteer	Buddhist	Jewish Musli	m	Protestant
Ever voluntee:	r 1	.029	030	.001	.069*

<sup>\*</sup>p<.05, two-tailed

Table 13. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer, Roman Catholic, Non-Affiliated, Other, Multiple, Actively Practicing

Variable	Ever Volunteer	Roman Catholic	Non-Affiliated	Other	Multiple	Actively Practicing
Ever Volunteer	r 1	039	.003 .0	)18	.004	.053

There was one significant correlation found between having ever volunteered and the race of the study participants. Having ever volunteered is positively correlated with study participants who reported their race as Asian (r= .067, p< .05) as seen in Table 14.

Table 14. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer and Race

Variable	Ever Volunteer	White	Black	Hispanic	Asian Other
Ever Volunteer	1	063	.058	.009	.067*016

<sup>\*</sup>p<.05, two-tailed

Finally, there was significant negative correlation found between having ever volunteered and full time employment in nursing (r=-.079, p<.05) and a negative correlation betweenhaving ever volunteered and being employed, other than nursing (r=-.074, p<.05). There was a significant correlation found between having ever volunteered and not being employed outside the home (r=.066, p<.05). These results are displayed in Tables 15.

Table 15. Correlation Coefficients (Phi Coefficients) between the Variables: Ever Volunteer and Employment Status

Variable	Ever V	Volunteer	Full	Time	Part	Time	Per Diem	Non-nursing work	Not working
Ever Volunte	er1	079*.	053	.056	<b>ó</b>	.074*	.066*		

<sup>\*</sup>p<.05, two-tailed

Summary of Hypothesis Testing: Demographic Characteristics and Volunteerism

Age and gender were found have statistically non-significant correlations with having ever volunteered. Non-significant negative correlation was found between birth order and having ever volunteered. It was determined in this sample that having ever volunteered was significantly correlated with the level of BSN as basic nursing education (r= .095, p<.01). A significant negative correlation was determined to exist at the ADN level of basic nursing education (r= -.086, p<.01). Of those presently enrolled in school (n= 218), there was significant correlation between having ever volunteered and present enrollment in a Master's program (r= .188, p<.01). There were no significant correlations between having ever volunteered and school

enrollment on a part time or full time basis. There was also no significant correlation between having ever volunteered and having caretaking responsibilities. There were no significant correlations observed between ever volunteering and marital status. Only one significant correlation was found between ever volunteering, religious affiliation and the actively practicing religion in the study sample. Those participants who identified as Protestant were positively correlated as ever volunteering (r= .069, p<.05). One significant correlation was found between having ever volunteered and the race of the study participants: those study participants who identified as Asians (r= .067, p<.05). There was significant negative correlation found between having ever volunteered and full time employment in nursing (r= -.079, p<.05) and a negative correlation between having ever volunteered and being employed, other than nursing (r= -.074, p<.05). There was a significant correlation found between having ever volunteered and not being employed outside the home (r= .066, p<.05).

Based on these findings, the null hypothesis, demographic characteristics are not related to volunteerism is rejected for significant but weak correlations for several demographic characteristics of the study sample. Significant positive correlations exist for having ever volunteered and the BSN level of nursing education, present enrollment in a Master's Program, Protestant, Asian, and not employed outside the home. Significant negative correlations were found for having ever volunteered and the ADN level of nursing education and full time employment.

There were few significant correlations and those that were found were weak. Therefore, a determination was made to create a variable that would better capture volunteerism in the study sample. This was done by review of all of the data collected with questions about volunteerism. The new variable, dubbed "longevity volunteer," is a dichotomous variable where longevity is

the sum of if the study participant has ever volunteered and volunteers now. If either criterion is not met, the participant would not be scored as positive for this longevity variable. The remaining hypotheses are tested against the longevity volunteer variable when volunteerism is the identified variable.

The second hypothesis tested was:

H<sub>0</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are not related to volunteerism in the new nurse.

H<sub>1</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are related to volunteerism in the new nurse.

The Longevity Volunteer variable was used to determine whether internal characteristics such as spirituality, altruism, and prosocialness are related to volunteerism in the new nurse. The Longevity Volunteer variable was found to be significantly correlated with spirituality, Spiritual Transcendence Index (STI) (r=.099, p< .01), altruism, Self-Report Altruism Scale (SRA) (r= .285, p< .01), and prosocialness, Prosocialness Scale for Adults (r=.200, p< .01). These scales were also significantly correlated with each other. Spirituality was significantly correlated with altruism (r= .285, p< .01), and prosocialness (r= .200, p< .01). Altruism was significantly correlated with spirituality (r= .110, p< .01) and prosocialness (r= .493, p< .01). Prosocialness was significantly correlated with spirituality (r= .214, p< .01). These correlations are displayed in Table 16.

Table 16. Pearson's Correlation Coefficients between the Variables: Longevity Volunteer, Spirituality, Altruism, Prosocialness

Variable Longe	vity Volunteer	Spirituality (STI)	Altruism (SRA)	Prosocialness
Longevity Volunteer	1	.099**	.285**	.200**
Spirituality (STI)	.099**	1	.110**	.214**
Altruism (SRA)	.285**	.110**	1	.493**
Prosocialness	.200**	.214**	.493**	1

<sup>\*\*</sup>p<.01, two-tailed

Summary of Hypothesis Testing:Internal Characteristics and Volunteerism

Based on the significant correlations found between the internal characteristics of spirituality, altruism, prosocialness and the longevity volunteer variable, the null hypothesis is rejected; internal characteristics such as spirituality, altruism and prosocialness are related to volunteerism in the new nurse. It was also determined that the measurement tools used in this study are significantly correlated with each other.

The third hypothesis tested was:

H<sub>0</sub>: External opportunities such as service learning or other pre-professional volunteering are not related to volunteerism in the new nurse.

H<sub>1</sub>: External opportunities such as service learning or other pre-professional volunteering are related to volunteerism in the new nurse.

The Longevity Volunteer variable was used to determine whether external opportunities such as service learning or other pre-professional volunteering is related to volunteerism in the new nurse. A significant negative correlation was determined to exist between school-related/ required for course credit volunteer activity and volunteerism in the new nurse (r= -.140, p<.01).

A significant correlation was found between not school-related/voluntary activity and volunteerism in the new nurse (= .302, p<.01). These findings are displayed in Table 17.

Table 17. Correlation Coefficients (Phi Coefficients) between the Variables: Longevity Volunteer, School-related/Course-Required, School-related/Voluntary, Not School-related/Voluntary

Variable	Longevity	S-R/	S-R/	Not S-R/
	Volunteer	Course Req.	Voluntary	Voluntary
Longevity Volunteer	1	140**	.002	.302**

<sup>\*\*</sup>p<.01, two-tailed

Summary of Hypothesis Testing: External Opportunities and Volunteerism

The null hypothesis is rejected; external opportunities or other pre-professional volunteering were found to be related to volunteerism in this study sample. School-related/course-required opportunities had significant negative correlation with volunteering (r= -.140, p<.01) while not school-related/voluntary opportunities had significant positive correlation with volunteering (r= .302, p<.01). No significant correlations were found between school related/voluntary opportunities and volunteering.

## What are the influencing characteristics of new nurses who volunteer? Summary of findings

Three hypotheses were tested to determine the influencing characteristics of new nurses who volunteer. In the first hypothesis, having ever volunteered was correlated with each of the demographic variables captured by the study survey. Significant correlations were found between having ever volunteered and BSN as basic nursing education (r= .095, p<.01), presently enrolled in a Master's program (r= .188, p<.01), Protestant religion (r=.069, p<.05), Asian (r= .067, p<.05) and not working outside the home (r= .066, p<.05). Significant negative

correlations were found between having ever volunteered and ADN as basic nursing education (r= -.086, p<.01), full time employment (r= -.079, p<.05), and working, not in nursing (r= -.074, p.05). As a result, the null hypothesis is rejected; demographic characteristics are not related to volunteerism in the new nurse. All of the positive and negative correlations found were weak. A more inclusive way to measure volunteerism in the study sample was sought. A variable, assigned "Longevity Variable," was created at this point through data review and by combining several of the survey questions. Further hypothesis testing uses the Longevity Volunteer variable as a latent construct for volunteerism in the study sample.

In the second hypothesis, volunteerism in the new nurse, using the Longevity Volunteer variable, was correlated with the internal characteristics of spirituality, altruism, and prosocialness. Significant correlations were found between volunteerism in the new nurse and spirituality (STI) (r= .099, p<.01), altruism (SRA) (r= .285, p<.01), and prosocialness (Prosocialness Scale for Adults) (r= .200, p<.01). As a result, the null hypothesis is rejected; internal characteristics are not related to volunteerism in the new nurse.

The last hypothesis correlated volunteerism in the new nurse, using the Longevity Volunteer variable, with external opportunities, such as service learning or other pre-professional volunteering. Significant negative correlation was found between volunteerism in the new nurse and school-related/ course required volunteer activity (r= -.140,p<.01). A non-significant correlation was found between volunteerism in the new nurse and school-related/ voluntary volunteer activity. Significant correlation was found between volunteerism in the new nurse and non-school-related/ voluntary activity (r= .302, p<.01).

In the study sample, the influencing characteristics of new nurses who volunteer can be viewed in three categories. In the first, some select demographic characteristics are negative

influences of new nurses who volunteer and some demographic characteristics are positive influences of new nurses who volunteer. The negative influencing demographic characteristics are birth order, ADN as basic nursing education, full time employment in nursing, and employed but not in nursing. The positive influencing demographic characteristics are BSN as basic nursing education, presently enrolled in a Master's program, Protestant religion, Asian race and not working outside the home. In the second category, internal influences are all positive. There is significant positive correlation between new nurses who volunteer and measures of spirituality, altruism, and prosocialness. In the last category, some external opportunities such as service learning or other pre-professional volunteering were found to be influencing characteristics of new nurses who volunteer. A negative influencing external opportunity in this sample was school-related/ course required volunteering. A positively influencing external opportunity was non-school-related/ voluntary volunteering.

How do volunteer experiences in school and professionally influence the new nurse's caring behaviors in practice, at least one year post graduation?

This research question determined whether volunteer experiences in school and professionally influence the caring behaviors of new nurses in practice, at least one year post graduation. Two hypotheses were tested.

The first hypothesis tested was:

H<sub>0</sub>: External opportunities such as service learning or other pre-professional volunteering are not related to caring behaviors in the new nurse.

H<sub>1</sub>: External opportunities such as service learning or other pre-professional volunteering are related to caring behaviors in the new nurse.

In this study sample, it was determined that caring behaviors in the new nurse, as measured by the Nyberg Caring Assessment Scale, are significantly correlated with voluntary, not school-related volunteer activities (r= .152, p<.01). Non-significant negative correlations

were found between caring behaviors in the new nurse and school-related, required volunteer activities as displayed in Table 18.

Table 18. Correlation Coefficients (Point Biserial) between the Variables: Nyberg Caring Assessment Scale (NCAS), School-Related/Required (SR/R), School-Related/Voluntary (SR/V), Not School-Related/Voluntary (NSR/V)

Variable	NCAS	SR/R	SR/V	NSR/V
NCAS	1	025	012	.152**

<sup>\*\*</sup>p<.01, two-tailed

Summary of Hypothesis Testing: External Opportunities and Caring Behaviors

Although school related, required and voluntary volunteer activities have non-significant negative correlations with caring behaviors in the new nurse, not-school related, voluntary volunteer activities was found to be correlated with caring behavior. Therefore, the null hypothesisis rejected as external opportunities such as not-school related voluntary volunteer activities was found to be related to caring behaviors in this study sample.

The second hypothesis tested to determine whether volunteer experiences in school and professionally influence the caring behaviors of new nurses in practice, at least one year post graduation was:

H<sub>0</sub>: Volunteer experience at the local, national or international level does not influence caring behaviors in the new nurse.

H<sub>1</sub>: Volunteer experience at the local, national or international level does influence caring behaviors in the new nurse.

In this study sample, it was determined that caring behaviors in the new nurse, as measured by the Nyberg Caring Assessment Scale, are significantly correlated with participation in local volunteer activities (r= .151, p<.01). Table 19 displays this finding.

Table 19. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Local Volunteering, National Volunteering, International Volunteering

Variable	NCAS	Local	National	International
NCAS	1	.151**	.036	023

<sup>\*\*</sup>p<.01, two-tailed

Summary of Hypothesis Testing: Volunteer Experience and Caring Behaviors

Volunteer activities at the local level were found to be significantly correlated with caring behaviors in the new nurse, as measured by the Nyberg Caring Assessment Scale in this study sample. The null hypothesis is rejected. Although volunteer activities at the national and international levels were not significantly correlated with caring behavior, significance was determined between the volunteer activity at the local level and caring behaviors.

How do volunteer experiences in school and professionally influence the new nurse's caring behaviors in practice, at least one year post graduation? Summary of findings

Two hypotheses were tested to determine how volunteer experiences in school and professionally influence the new nurse's caring behaviors in practice, at least one year post graduation. In the first hypothesis, caring behaviors in the new nurse were found to be significantly correlated with voluntary, not school-related volunteer activities (r= .152, p<.01). The null hypothesis is rejected. Caring behaviors in the practice of the new nurse are influenced by select volunteer activities in school.

The second hypothesis tested found significant correlation between caring behaviors in the new nurse and participation in local volunteer activity (r= .151, p<.01). The null hypothesis

is rejected. Caring behaviors in the practice of the new nurse are influenced by select professional volunteer activities.

Does volunteer experience in school and professionally influence the new nurse's self-report of satisfaction with career choice, at least one year post graduation?

This research question determined whether volunteer experiences in school and professionally influence the new nurse's self-report of satisfaction with career choice. Two hypotheses were tested.

The first hypothesis tested was:

H<sub>0</sub>: External opportunities such as service learning or other pre-professional volunteering are not related to satisfaction with career choice.

H<sub>1</sub>: External opportunities such as service learning or other pre-professional volunteering are related to satisfaction with career choice.

In this study sample, satisfaction with career choice was significantly correlated with not-school related, voluntary volunteer activities in the new nurse (r= .127, p<.01). Table 20 displays this correlation.

Table 20. Point Biserial Correlation Coefficients between the Variables: Satisfaction with Career Choice (SCC), School-Related/Required (SR/R), School-Related/Voluntary (SR/V), Not School-Related/Voluntary (NSR/V)

Variable	SCC	SR/R	SR/V	NSR/V
SCC	1	.014	.020	.127**

<sup>\*\*</sup>p<.01, two-tailed

Summary of Hypothesis Testing: External Opportunities and Satisfaction with Career Choice Satisfaction with career choice in the study sample of new nurses is significantly correlated with not-school related, voluntary volunteer activity (r= .127). Non- significant

correlation was determined between satisfaction with career choice and school related, required volunteer activity and also between satisfaction with career choice and school related, not required volunteer activity.

The second hypothesis determined whether professional exposure to volunteer activity was related to satisfaction with career choice in the new nurse.

H<sub>0</sub>: Volunteer experience at the local, national or international level does not influence satisfaction with career choice in the new nurse.

H<sub>1</sub>: Volunteer experience at the local, national or international level does influence satisfaction with career choice in the new nurse.

There were no significant correlations found between satisfaction with career choice and professional volunteering on the local, national or international level. Other correlations were previously discussed. Table 21 displays the correlations.

Table 21. Point Biserial Correlation Coefficients between the Variables: Satisfaction with Career Choice (SCC), Local Volunteering, National Volunteering, International Volunteering

Variable	SCC	Local	National	International
SCC	1	.010	.004	.055

Summary of Hypothesis Testing: Volunteer Experience and Satisfaction with Career Choice

In the first hypothesis, significant correlation was determined to exist between satisfaction with career choice and not-school related, voluntary volunteer activity (r= .127, p<.01). The null hypothesis is rejected. External opportunities such as service learning and other pre-professional volunteering are related to satisfaction with career choice in the new nurse.

In the second hypothesis, no significant correlations were determined to exist between satisfaction with career choice and any of the variables representing professional volunteering: local, national and international volunteer activities. The null hypothesis is retained. Volunteer experience at the local, national, and international level does not influence satisfaction with career choice in the new nurse.

Does volunteer experience in school and professionally influence the new nurse's self-report of satisfaction with career choice, at least one year post graduation? A summary of findings

Two hypotheses were tested to determine whether volunteer experience in school and professionally influence the new nurse's self-report of satisfaction with career choice, at least one year post graduation.

In the first hypothesis, it was determined that school not-related, voluntary volunteer activity was significantly correlated with satisfaction with career choice (r= .127, p<.01)). Each of the school related volunteer activities, required and not required, had no significant correlation with satisfaction with career choice in the new graduate. In the second hypothesis, no significant correlations were determined between satisfaction with career choice and professional volunteer activity at the local, national, or international levels.

Based on the results of each of the hypothesis tested, it is determined that the only significant correlation between satisfaction with career choice in the new nurse and volunteering is volunteer activity that has been experienced as non-school related, voluntary. All other volunteer activity is not significantly correlated with satisfaction with career choice in the new nurse in the study sample.

# What are the determinants of caring behavior in the new nurse, at least one year post graduation?

This question determined whether demographic characteristics or internal characteristics were determining caring behaviors in the new nurse, one year post graduation. Two hypotheses were tested.

The first hypothesis tested was:

H<sub>0</sub>: Demographic characteristics are not related to caring behavior in the new nurse.

H<sub>1</sub>: Demographic characteristics are related to caring behavior in the new nurse.

Age was found to have non-significant negative correlation with caring behaviors in the new nurse, as measured by the Nyberg Caring Assessment Scale (NCAS) while birth order was found to have non-significant correlation with caring behavior. Significant correlation was found between caring behavior and female gender (r= .068). These findings are displayed in Table 22.

Table 22. Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Gender, Age and Birth Order

Variable	NCAS	Gender	Age	Birth Order
	(Point	(Point	(Pearson	(Spearman's
	Biserial)	Biserial)	Correlation)	Rho)
NCAS	1	.068*	039	.022

<sup>\*</sup>p<.05, two-tailed

The level of basic nursing education was not significantly correlated with caring behavior as measured by the Nyberg Caring Assessment Scale (NCAS) in this sample of new nurses, one year post graduation, as seen in Table 23.

Table 23. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Level of Basic Nursing Education

Variable	NCAS	Diploma	ADN	BSN
NCAS	1	.006	.019	021

There were no significant correlations found between caring behaviors as measured by the Nyberg Caring Assessment Scale (NCAS) and present enrollment in school (n= 218), regardless of program as displayed in Table 24.

Table 24. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Present Enrollment in School by Program

Variable	NCAS	Enrolled BSN	Enrolled MSN	Enrolled Master's
NCAS	1	039	.040	.019

There were no significant correlations between caring behavior as measured by the Nyberg Caring Assessment Scale (NCAS) and school enrollment on a part time or full time basis (School: Part Time or Full Time). There was also no significant correlation between caring behavior and having caretaking responsibilities as displayed in Table 25.

Table 25. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), School: Part Time or Full Time, Caretaking Responsibilities

Variable	NCAS	School: Part time or Full Time	Caretaking Responsibilities
NCAS	1	050	.039

There were no significant correlations found between caring behavior as measured by the Nyberg Caring Assessment Scale (NCAS) and marital status as displayed in Table 26.

Table 26. Point Biserial Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS) and Marital Status

Variable	NCAS	Married or Domestic Partnership	Widowed, Divorced or Separated	Single, Never Married
NCAS	1	0.26	021	.038

There were no correlations found between reported caring behavior as measured by the Nyberg Caring Assessment Scale (NCAS) and reported religious affiliation. One significant correlation was determined between caring behavior and those study participants who identified as actively practicing their religion (r= .091, p<.01), as displayed in Tables 27 and 28.

Table 27. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Buddhist, Jewish, Muslim, Protestant

Variable	NCAS	Buddhist	Jewish	Muslim	Protestant
NCAS	1	.009	.004	.039	059

Table 28. Point Biserial Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Roman Catholic, Non-Affiliated, Other, Multiple, Actively Practicing

Variable	NCAS	Roman Catholic	Non-Affiliated	Other	Multiple	Actively Practicing
NCAS	1	.009	010	015	030 .091*	*

<sup>\*\*</sup>p<.01, two-tailed

No significant correlations were found between caring behavior as measured by the Nyberg Caring Assessment Scale (NCAS) and the race of the study participants as displayed in Table 29.

Table 29. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS) and Race

Variable	NCAS	White	Black	Hi	spanic	Asian	Other
NCAS	1	038	.030	.053	.032053		

There was significant correlation found between caring behavior as measured by the Nyberg Caring Assessment Scale (NCAS) and working per diem in nursing (r= .074, p<.05). Significant negative correlation was determined between caring behavior and those who reported working but not in nursing (r= -.104, p<.01). Findings are displayed in Table 30.

Table 30. Point Biserial Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS) and Employment Status

Variable	NCAS	Full Time	Part Time	Per Diem	Non-nursing	work	Not working
NCAS	1	.014	.000	.07	74* -	.104**	020

<sup>\*</sup>p<.05, two-tailed

Summary of Hypothesis Testing: Demographic Characteristics and Caring Behaviors

Age was found to have non-significant negative correlation with caring behavior while birth order was found to have non-significant correlation with caring behavior. Significant correlation was found between caring behavior and gender (r= .068, p<.05). The level of basic nursing education was not significantly correlated with caring behavior in this sample of new nurses, one year post graduation. There were no significant correlations found between caring behaviors and present enrollment in school (n= 218), regardless of program. There were no significant correlations between caring behavior and school enrollment on a part time or full time basis (School: Part Time or Full Time). There was also no significant correlation between caring behavior and having caretaking responsibilities. There were no significant correlations found

<sup>\*\*</sup>p<.01, two-tailed

between caring behavior and marital status. There were no correlations found between reported caring behavior and reported religious affiliation. One significant correlation was determined between caring behavior and those study participants who identified as actively practicing their religion (r= .091, p<.01). No significant correlations were found between caring behavior and the race of the study participants. There was significant correlation found between caring behavior and working per diem in nursing (r= .074, p<.05). Significant negative correlation was determined between caring behavior and those who reported working but not in nursing (r= .104, p<.01).

Based on these findings, the null hypothesis, demographic characteristics are not related to caring behaviors is rejected for significant correlations with a few demographic characteristics of the study sample. Caring behavior was found to be significantly correlated with gender, active practice of religion, and working per diem status in nursing. Caring behavior was found to be negatively correlated with working but not in nursing.

The second hypothesis tested under determinants of caring behaviors in the new nurse, one year post graduation was:

H<sub>0</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are not related to caring behavior in the new nurse.

H<sub>1</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are related to caring behavior in the new nurse.

Caring behavior as measured by the Nyberg Caring Assessment Scale was used to determine whether internal characteristics such as spirituality, altruism, and prosocialness are related to caring behavior in the new nurse. Caring behavior was found to be significantly correlated with spirituality, Spiritual Transcendence Index (STI) (r= .224, p<.01), altruism, Self-Report Altruism Scale (SRA) (r= .300, p<.01), and prosocialness, Prosocialness Scale for Adults (r=.619, p<.01). These correlations are displayed in Table 31.

Table 31. Pearson's Correlation Coefficients between the Variables: Nyberg Caring Assessment Scale (NCAS), Spirituality, Altruism, Prosocialness

Variable	NCAS	Spirituality (STI)	Altruism (SRA)	Prosocialness
NCAS	1	.224**	.300**	.619**
Spirituality (STI)	.224**	1	.110**	.214**
Altruism (SRA)	.300**	.110**	1	.493**
Prosocialness	.619**	.214**	.493**	1

<sup>\*\*</sup>p<.01, two-tailed

Summary of Hypothesis Testing: Internal Characteristics and Caring Behavior

Based on the significant correlations found between the internal characteristics of spirituality, altruism, prosocialness and caring behavior, the null hypothesis is rejected; internal characteristics such as spirituality, altruism and prosocialness are related to caring behavior in the new nurse.

# What are the determinants of caring behavior in the new nurse, at least one year post graduation? A summary of findings

Two hypotheses were tested to identify the determinants of caring behavior in the new nurse, at least one year post graduation. In the first hypothesis, caring behavior was correlated with each of the demographic variables captured by the study survey. Significant correlation was found between caring behavior and gender (r= .068, p<.05). One significant correlation was determined between caring behavior and those study participants who identified as actively practicing their religion (r= .091, p<.01). There was significant correlation found between caring behavior and working per diem in nursing (r= .074, p<.05). Significant negative correlation was

determined between caring behavior and those who reported working but not in nursing (r= -.104, p<.01). These were statistically significant but showed weak relationships.

The second hypothesis tested to assist in identifying the determinants of caring behavior in the new nurse correlated caring behavior with the internal characteristics of spirituality, altruism, and prosocialness. Caring behavior was found to be significantly correlated with spirituality: Spiritual Transcendence Index (STI) (r= .224, p<.01); altruism: Self-Report Altruism Scale (SRA) (r= .300, p<.01); and prosocialness: Prosocialness Scale for Adults (r=.619, p<.01).

In this study sample of new nurses, one year post graduation, positive determinants of caring behavior include gender, actively practicing religion and working in nursing on a per diem status. Working but not in nursing was found to be a negative determinant of caring behavior. Internal characteristics such as spirituality, altruism, and prosocialness were also positive determinants of caring behavior in this study sample.

Do internal characteristics such as spirituality, altruism or prosocialness predict satisfaction with career choice in the new nurse, at least one year post graduation?

This research question determined whether internal characteristics such as spirituality, altruism, or prosocialness predict satisfaction with career choice. The hypothesis tested was:

H<sub>0</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are not related to career choice in the new nurse.

H<sub>1</sub>: Internal characteristics such as spirituality, altruism, and prosocialness are related to career choice in the new nurse.

Satisfaction with career choice (SCC) as measured by a variable derived from the work of Kovnerand colleagues (2007) on job satisfaction in the new nurse was used to determine whether internal characteristics such as spirituality, altruism, and prosocialness are related to satisfaction with career choice. Satisfaction with career choice was found to be significantly correlated with spirituality: Spiritual Transcendence Index (STI) (r= .093); altruism: Self-Report Altruism Scale

(SRA) (r= .143); and prosocialness: Prosocialness Scale for Adults (r=.183). These correlations are displayed in Table 32.

Table 32. Pearson's Correlation Coefficients between the Variables: Satisfaction with Career Choice (SCC), Spirituality, Altruism, Prosocialness

Variable	SCC	Spirituality (STI)	Altruism (SRA)	Prosocialness
SCC	1	.093**	.143**	.183**

<sup>\*\*</sup>p<.01, two-tailed

Summary of Hypothesis Testing: Internal Characteristics and Caring Behavior

Satisfaction with career choice was found to be significantly correlated with spirituality, Spiritual Transcendence Index (STI) (r= .093), altruism, Self-Report Altruism Scale (SRA) (r= .143), and prosocialness, Prosocialness Scale for Adults (r=.183). The null hypothesis is rejected. Satisfaction with career choice is related to internal characteristics such as spirituality, altruism, and caring behaviors in the new nurse.

Do internal characteristics such as spirituality, altruism or prosocialness predict satisfaction with career choice in the new nurse, at least one year post graduation? A summary of findings

Based on the results of the hypothesis tested, internal characteristics such as spirituality, altruism and caring behaviors are significantly correlated with satisfaction with career choice in the new nurse, at least one year post graduation.

Are internal characteristics such as spirituality, altruism or prosocialness and select demographic variables, combined with volunteering experience, predictive of caring behaviors and satisfaction with career choice in the new nurse, at least one year post graduation?

To determine whether internal characteristics such as spirituality, altruism or prosocialness and select demographic variables, combined with volunteering experience are predictive of caring behaviors and satisfaction with career choice in the new nurse, at least one year post graduation, the following hypothesis was tested:

H<sub>0</sub>: Demographics, internal characteristics and external opportunities, combined with volunteer experience, are not predictive of caring behaviors and satisfaction with career choice.

H<sub>1</sub>: Demographics, internal characteristics and external opportunities, combined with volunteer experience, are predictive of caring behaviors and satisfaction with career choice.

#### Caring Behaviors

To investigate whether volunteerism mediates the relationship between internal characteristics and caring behavior, a path model was tested using IBM SPSS Version 22.

The independent variables altruism, prosocialness and spirituality, as internal characteristics and volunteerism, as the mediating variable, were entered into a regression equation to determine their effects on caring behavior as the dependent variable. Prosocialness( $\beta$ = .601, p<.001) and spirituality ( $\beta$ = .095, p<.001) were found to have significant direct effectson caring behavior, altruism was determined to have a negative non-significant effect on caring behavior. Volunteerism was not found to have a significant effect on caring behavior. These finding are displayed in Table 35.

Table 35. Regression Coefficients for Internal Characteristics and Their Effects on Caring Behavior

			20	1101		
Model		Unstandardized		Standardized	t	Sig.
		Coefficients		Coefficients		
		В	Std. Error	Beta		
1	(Constant)	.000	.265		.000	1.000
	Altruism	010	.026	011	375	.708
	Prosocial	.619	.031	.601	19.685	$.000^{***}$
	Spiritual	.083	.023	.095	3.555	.000***
	Volunteer	.376	.616	.017	.611	.542

<sup>\*\*\*\*</sup>p<.001

The independent variables altruism, prosocialness and spirituality, as internal characteristics, were entered into a regression equation to determine their effects on volunteerism as the dependent variable. Altruism ( $\beta$ = .246, p<.001) was found to have a significant direct effect on volunteer activity, prosocialness and spirituality were determined to have non-significant direct effects on volunteer activity, as displayed in Table 34.

Table 34. Regression Coefficients for Internal Characteristics and Their Effects on Volunteer Activity

			, oranic	oci riculvity			
Mode	el	Unstandardiz	zed	Standardized	t	Sig.	
		Coefficients		Coefficients			
1	Comptont	В	Std. Error	Beta	000	1 000	
1	Constant	.000	.014		.000	1.000	
	Altruism	.009	.001	.246	6.710	$.000^{***}$	
	Prosocial	.003	.002	.066	1.781	.075	
	Spiritual	.002	.001	.058	1.769	.077	

<sup>\*\*\*\*</sup>p<.001

Using the results displayed in Tables 33 and 34, a Path Model Diagram was developed, see Figure B. Results indicated that, although prosocialness ( $\beta$ = .601, p<.001) and spirituality ( $\beta$ = .095, p<.001) predicted caring behaviors, volunteerism was not significantly related to caring behaviors ( $\beta$  = .017, ns). Additionally, prosocialness ( $\beta$  = .066, ns) and spirituality ( $\beta$  = .058, ns) were not significantly related to volunteerism. As would be expected from these results, the

indirect effect tested was also small to non-existent ( $\beta$  = .017,). Standard errors and significance values were not calculated as the estimated value of  $\beta$  was approximately 0.

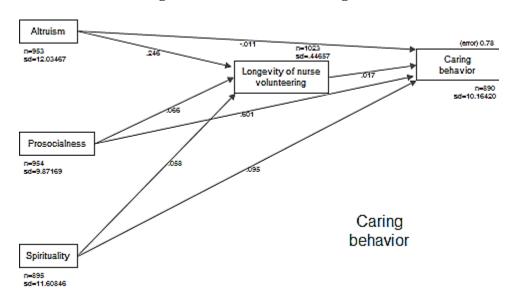


Figure B. Path Model: Caring Behaviors

Table 35. Direct and Indirect Effects of Altruism, Prosocialness and Spirituality on Volunteerism and Caring Behavior

Path	Direct effect on caring behavior	Direct effect on volunteering	Indirect effect volunteeringon caring behavior	Direct effect controlling for indirect effect
Altruism	011	.246***	.004	015
Prosocialness	.601***	.066	.001	.600
Spirituality	.095***	.058	.001	.094
Volunteering	.017	n/a	n/a	n/a

Note. The indirect effect of volunteerism on caring behavior is calculated by multiplying the direct effect on volunteering by direct effect of volunteering on caring behavior. The direct effect of volunteerism on caring behavior when the indirect effect is controlled is calculated by subtracting the indirect effect on caring behavior from the direct effect on caring behavior.

\*\*\*\*p<.001

### Satisfaction with Career Choice

To investigate whether volunteerism mediates the relation between internal characteristics and satisfaction with career choice, a path model was tested using IBM SPSS Version 22.

The independent variables altruism, prosocialness and spirituality, as internal characteristics, were entered into a regression equation where satisfaction with career choice was held as the dependent variable. Prosocialness ( $\beta$ = .132, p<.01) was found to have a significant direct effect on satisfaction with career choice, altruism and spirituality were determined to have non-significant effects on satisfaction with career choice. Volunteerism was not found to have significant effects on satisfaction with career choice. These finding are displayed in Table 36.

Table 36. Regression Coefficients for Internal Characteristics and Their Effects on Satisfaction with Career Choice

Mo	del		lardized icients	Standardized Coefficients	t	Sig.
		В	Std. Error	Beta		
1	Constant	.000	.139		.000	1.000
	Altruism	.019	.014	.053	1.387	.166
	Prosocial	.057	.017	.132	3.459	$.001^{**}$
	Spiritual	.019	.012	.052	1.562	.119
	Volunteer	.618	.325	.065	1.901	.058

<sup>\*\*</sup>p<.01

Using the results displayed in Tables 34 and 36, a Path Model Diagram was developed, see Figure C. Results indicated that, although prosocialness significantly predicted satisfaction with career choice ( $\beta$ = .132, p<.01), volunteerism was not significantly related to satisfaction with career choice ( $\beta$ = .065, ns).

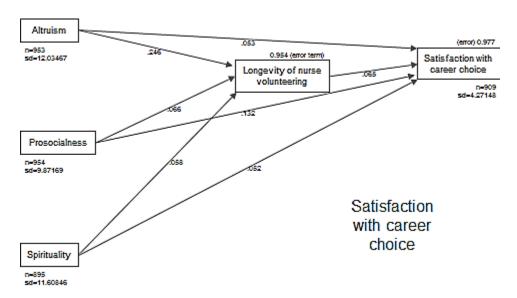


Figure C. Path Model: Satisfaction with Career Choice

Table 37. Direct and Indirect Effects of Altruism, Prosocialness and Spirituality on Volunteerism and Satisfaction with Career Choice

Path	Direct effect on satisfaction with career choice	Direct effect on volunteering	Indirect effect-volunteerism on satisfaction with career choice	Direct effect controlling for indirect effect
Altruism	.053	.246***	.016	.037
Prosocialness	.132**	.066	.004	.128
Spirituality	.052	.058	.004	.048
Volunteering	.065	n/a	n/a	n/a

Note. The indirect effect of volunteerism on satisfaction with career choice is calculated by multiplying the direct effect on volunteering by direct effect of volunteering on satisfaction with career choice. The direct effect of volunteerism on satisfaction with career choice when the indirect effect is controlled is calculated by subtracting the indirect effect on satisfaction with career choice from the direct effect on satisfaction with career choice.

Summary: Internal Characteristics, Volunteerism, Caring Behavior and Satisfaction with Career Choice

Prosocialness ( $\beta$ = .601, p<.001) and spirituality ( $\beta$ = .095, p<.001) were found to have a significant direct effects on caring behavior. Prosocialness ( $\beta$ = .132, p<.01) was found to have a significant direct effect on satisfaction with career choice. When held constant, volunteerism

<sup>\*\*\*</sup>p< .001, \*\*p< .01

was not found to have a significant effect on caring behavior or satisfaction with career choice. Therefore, volunteerism in nursing does not mediate the relationship between the internal characteristics of altruism, prosocialness, and spirituality and either caring behavior or satisfaction with career choice.

Demographics: Caring Behavior Model

To determine the effects of selected demographics on the caring behavior model, those demographics that were significantly correlated with caring behavior were placed into the regression model. Results revealed that while 39.5% of the variance (adjusted  $R^2$ = .395, p< .001) in caring behavior is explained by the model, the percentage increases to 42.1% (adjusted  $R^2$ = .421, p< .001) when the demographic variables female gender (r= .068, p< .05), actively practicing religion (r= .091, p< .01), and working per diem in nursing (r= .074, p< .05) are added to the model, as displayed in Table 38.

Table 38. Effects of Selected Demographics on the Caring Behavior Model

Table 38. Effects of Selected Demographics on the Caring Benavior Model					
Variables	R	$\mathbb{R}^2$	Adjusted R <sup>2</sup>	Significant F	
Entered				Change	
Volunteer,	.631	.398	.395	< .001	
Spiritual,					
Prosocial,					
Altruism					
<b>Employed per</b>	.653	.426	.421	< .001	
diem in					
nursing, Do you					
consider					
yourself to be					
actively					
practicing your					
religion?,					
Female					

Dependent Variable: Caring behavior

Demographics: Satisfaction with Career Choice

To answer the research question and associated hypotheses, demographic variables were only correlated with volunteerism in the new nurse and caring behavior. Therefore, demographic variables cannot be regressed in the satisfaction with career choice model.

External Opportunities: Caring Behavior Model

To determine the effects of external opportunities on the caring behavior model, those external opportunities that were significantly correlated with caring behavior were placed into the regression model. Results revealed that while 39.5% of the variance (adjusted  $R^2$ = .395, p< .001) in caring behavior is explained by the model, the percentage drops to 38.7% (adjusted  $R^2$ = .387, p< .001) when the external opportunity variables not school-related/voluntary volunteer activity (r= .152, p< .01), and volunteer activity at the local level (r= 151, p< .01) are added to the model, as displayed in Table 39.

Table 39. Effects of Selected External Opportunities on the Caring Behavior Model

Variables Entered	R	$\mathbb{R}^2$	Adjusted R <sup>2</sup>	Significant F Change
Volunteer, Spiritual,	.631	.398	.395	< .001
Prosocial, Altruism	(29	204	207	. 001
Not school- related/voluntary, Spiritual,	.628	.394	.387	< .001
Prosocial, Volunteer, Altruism				

Dependent Variable: Caring behavior

External Opportunities: Satisfaction with Career Choice

To determine the effects of external opportunities on the satisfaction with career choice model, those external opportunities that were significantly correlated with satisfaction with career choice were placed into the regression model. Results revealed that while 4.2% of the variance (adjusted  $R^2$ = .042, p< .001) in satisfaction with career choice is explained by the model, the percentage increases to 5.3% (adjusted  $R^2$ = .053, p< .001) when the external opportunity variable not school-related/voluntary volunteer activity (r= .127, p< .01) added to the model, as displayed in Table 40.

Table 40. Effects of Selected External Opportunities on the Satisfaction with Career Choice Model

Variables Entered	R	$\mathbb{R}^2$	Adjusted R <sup>2</sup>	Significant F Change
Volunteer,	.216	.047	.042	< .001
Spiritual,				
Prosocial,				
Altruism				
Not school- related/voluntary	.252	.064	.053	<.001
Spiritual,				
Prosocial,				
Volunteer,				
Altruism				

Dependent Variable: Satisfaction with Career Choice

Summary: Effects of Demographics and External Opportunities on Caring Behavior and Satisfaction with Career Choice

Demographic variables that were significantly correlated with caring behavior also significantly added to the Caring Behavior Model. The Caring Behavior Model accounted for 39.5% of the variance (adjusted  $R^2$ = .395). When the demographic variables female gender (r= .068, p< .05), actively practicing religion (r= .091, p< .01), and working per diem in nursing (r= .074, p< .05) are added to the model, the percentage increases to 42.1% (adjusted  $R^2$ = .421, p< .001).

The external opportunity variable not school-related/voluntary volunteer activity was significantly correlated to both caring behavior (r= .152, p< .01) and satisfaction with career

choice (r= .127, p< .01). When placed into the Caring Behavior Model, the external opportunity variable not school-related/voluntary volunteer activity decreases the percentage of variance explained by the model from 39.5% of the variance (adjusted  $R^2$ = .395, p< .001) to 38.7% of the variance (adjusted  $R^2$ = .387, p< .001). When placed into the Satisfaction with Career Choice Model, the external opportunity variable not school-related/voluntary volunteer activity increases the percentage of variance explained by the model from 4.2% of the variance (adjusted  $R^2$ = .042, p< .001) to 5.3% (adjusted  $R^2$ = .053, p< .001) of the variance.

## **Summary of Findings**

## Sample Characteristics

This quantitative survey study yielded a final data set of 1023 cases. The participants are mainly female (90.2%), relatively young (49.9% are between the ages of 20 and 29), with almost that amount (48.9%) reporting being the first born in their families. This sample is overwhelmingly White, non-Hispanic (78.9%) and over half of the sample (65.3%) have attained Bachelor degrees or higher as their basic nursing education. While only a quarter of the respondents are presently in school, the majority (64.7%) of those are enrolled in RN to BSN programs while the remaining (35.3%) enrolled in MSN programs.

Over half of the study participants (55.9%) are either presently married or in a domestic partnership or have been widowed, divorced or separated and over half of the study participants (54.4%) have caretaking responsibilities. The overwhelming majority of respondents (94%) are employed in nursing and most of them (88.4%) are working full time.

The participants are fairly evenly divided among the four religion reporting groups: Protestant (21.8%), Roman Catholic (22.8%), Non-affiliated (23.3%), and other (23%). More respondents indicated they were actively practicing their religion (53.5%) than not (46.5%). The

majority of the sample (61.5%) reported that their school was part of the National Student Nurses' Association (NSA) total school program.

Of the nearly two thirds of participants (65.7%) who reported having volunteered, over two thirds of them (69%) participated in school as a required course for course credit, over three quarters (78.1%) participated in school as a voluntary activity and nearly three quarters (71.1%) participated in not school-related voluntary activity. The overwhelming majority of volunteer activity (87.5%) is reported as taking place at the local level with many participants reporting volunteer activity across multiple settings. Of the sample, a little more than a third (34.1%) report presently participating in volunteer activity.

Reliability of the Instruments and Descriptive Results of the Variables

All of the instruments used in this study, with the notable exception of the derived tool used to determine satisfaction with career choice (published studies:  $\alpha$ = >.7->.8; current study:  $\alpha$ = .123), demonstrate internal consistencies in scales and subscales with Cronbach's alpha values at or above those values reported in previous studies. Descriptive results of the variables under study reveal findings comparable to the findings of the studies used to develop the tool except the Self-Report Altruistic Scale (SRA) because the original studies reported on combined means and the Nyberg Caring Assessment Scale because standard deviation was not reported. Answering the Research Questions

What are the influencing characteristics of new nurses who volunteer?

There are negative demographic influencing characteristics of new nurses who volunteer such as birth order, ADN as basic nursing education, full time employment in nursing and employed but not in nursing. There are positive demographic influencing characteristics of new nurses who volunteer including BSN as basic nursing education, presently enrolled in a Master's

program, Protestant religion, Asian race, and not working outside the home. Internal characteristics identified as influencing new nurses who volunteer are measures of spirituality, altruism and prosocialness. Finally, there were external opportunities of service leaning or other pre-professional volunteering identified as influencing characteristics of new nurses who volunteer. The positive influencing characteristic determined was volunteering that was voluntary, not school-related. The negative influencing characteristic was volunteering that was school related, course required.

How do volunteer experiences in school and professionally influence the new nurse's caring behavior in practice, at least one year post graduation?

Caring behavior in the practice of the new nurse was determined to be influenced by two categories of volunteer experience. Caring behavior was positively influenced by voluntary, not school-related volunteer activities. Caring behavior was also positively by participation in local volunteer activity.

Does volunteer experience in school and professionally influence the new nurse's self-report of satisfaction with career choice, at least one year post graduation?

Volunteer activity that was not school-related volunteer activity positively influenced the new nurse's self-report of satisfaction with career choice. No other volunteer activity was determined to influence the new nurse's self-report of satisfaction with career choice.

What are the determinants of caring behavior in the new nurse, at least one year post graduation?

Caring behavior in the new nurse was determined to be influenced by gender, active practice of religion, and working per diem status in nursing. Caring behavior was negatively influenced by working but not in nursing. The internal characteristics of spirituality, altruism, and prosocialness were also determinants of caring behavior in the new nurse.

Do internal characteristics such as spirituality, altruism or prosocialness predict satisfaction with career choice in the new nurse, at least one year post graduation?

Each of the internal characteristics of spirituality, altruism and prosocialness was positively correlated with satisfaction with career choice in the new nurse.

Are internal characteristics such as spirituality, altruism or prosocialness and select demographic variables, combined with volunteering experience, predictive of caring behaviors and satisfaction with career choice in the new nurse, at least one year post graduation?

While the internal characteristics of prosocialness and spirituality were found to have significant direct effects on caring behavior, only prosocialness was determined to have significant direct effects on satisfaction with career choice. When held constant, volunteerism was not found to have a significant effect on either caring behavior or satisfaction with career choice. Therefore, volunteerism in nursing was found not to mediate the relationship between the internal characteristics of spirituality, altruism, and prosocialness and either caring behavior or satisfaction with career choice.

Demographic variables that were significantly correlated with caring behavior female gender, actively practicing religion and working per diem in nursing also significantly added to the Caring Behavior Model.

The external opportunity variable not school-related/voluntary volunteer activity was significantly correlated to both caring behavior and satisfaction with career choice. However, when placed into the Caring Behavior Model, the external opportunity variable not-school-related/voluntary volunteer activity slightly but significantly decreases the percentage of variance explained by the model. Then, when placed into the Satisfaction with Career Choice Model, the external opportunity variable not-school-related/voluntary volunteer activity slightly but significantly increases the percentage of variance explained by the model.

## **Chapter 5: Discussion**

### Introduction

The study sought to describe the characteristics of nurses who volunteer early in their nursing career or during their education and determine the influence of volunteering and associated nurse characteristics on the self-reported caring behaviors of novice nurses (one year following graduation) and their satisfaction with career choice. While a number of internal characteristics and external opportunities were found to correlate with volunteerism and caring behavior as well as satisfaction with career choice, volunteerism was not found to mediate either caring behavior or satisfaction with career choice in this sample of new nurses, one year after graduation.

A wide range of internal and external characteristics of novice nurses were studied to determine their relationship to nurse volunteerism and their relationship to caring behavior and satisfaction with career choice. This chapter will discuss all of the findings, provide a careful examination of alternative explanations, and explore the limitations of survey based research. Each research question resulted in significant and nonsignificant findings that contribute to the science of nurse volunteerism research. These findings will be discussed and a set of recommendations will be offered for nursing education, nursing administration and future nursing volunteerism research.

### **Discussion of Findings**

The discussion section will begin by comparing key demographic characteristics of the study participants to the national nursing workforce to support the generalizability of the study findings. The research questions and the measurement instruments used to answer their associated hypotheses will be discussed to determine the strength of the instruments as valid

constructs of the research variables. The significant and nonsignificant findings will be presented, study limitations will be discussed, and implications for education, practice and research will be explored. The contribution that the findings of the study may make to Watson's (2012) Transpersonal Caring Relationship will be considered.

Sample

The overwhelming majority of the participants in this study of new nurses, one year after graduation were White, non-Hispanic females who attained baccalaureate degrees or higher as their basic nursing education and were employed in nursing, full time. Using the findings from the 2013 National Nursing Workforce Survey of Registered Nurses (NNWSRN) (Budden et al., 2013) the only difference found is in primary educational preparation where the 2013 NNWSRN results showed only a slight edge to the baccalaureate as the primary educational preparation. Other key demographic characteristics include age: predictably, this study was skewed toward a younger group of practicing nurses whereas the 2013 NNWSRN results show a fairly even distribution of age groups. There were no other demographic findings that had comparable metrics on the 2013 NNWSRN. The respondent demographics of the present study are comparable to the demographics of the 2012NSNA Annual New Graduate Survey (Mancino, 2013). The findings of this study may be generalizable to the new nurse, one year post graduation.

**Research Questions** 

What are the influencing characteristics of new nurses who volunteer?

Measurement instruments

To determine the answer to this research question, several highly reliable and valid

instruments were used, including the Spiritual Transcendence Index (STI) (Seidlitz et al., 2002), the Self-Report Altruistic Scale (Rushton et al., 1981) and the Prosocialness Scale for Adults (Caprara et al., 2005). The volunteer variable proved to be a more difficult latent construct to measure.

There were three survey questions that addressed volunteering. However, two had six additional options and one question had two additional options if the respondent indicated yes to volunteering. This resulted in various permutations that were not usable as a latent construct. While the development of the new dichotomous variable, longevity volunteer, was necessary for the analysis, it did limit the ability to make statistical comparisons between past and present volunteer activity and the frequency of volunteer activity because of statistically small numbers of respondents.

## **Findings**

## **Demographics**

Non-significant demographic findings include gender, age and birth order. Having ever volunteered was significantly correlated with the level of BSN as basic nursing education, while a significant negative correlation was found to exist at the ADN level of basic nursing education and no significant findings were associated with Diploma education as basic nursing education. Service Learning opportunities are part of the baccalaureate curriculum, therefore that finding was predictable. Negative correlation with ADN level of basic education and having ever volunteered was a surprising finding that needs further exploration. Some factors may include opportunity and time. Also, if volunteering is not an academic expectation, a dialogue about volunteering needs to develop.

Significant correlations were determined to exist between being presently enrolled in a Master's program and having ever volunteered. No significant correlations exist between present enrollments in BSN or MSN programs and no significant correlations were determined between present enrollment in school part time or full time, having caretaking responsibilities, or marital status and having ever volunteered. There were two choices for the respondent regarding enrollment in graduate education. One choice asked about enrollment in a Master's program and the other choice asked about enrollment in an MSN program of study. It is difficult to discern how respondents may have differentiated enrollment in a Master's Program and enrollment in an MSN program in responding to the questions, therefore making it difficult to interpret this finding. It is apparent however thatthose responsibilities such as enrollment in school and caretaking do not influence volunteer activity.

The only religious affiliation with significant correlation to having ever volunteered was with those participants who identified as Protestant and the only race of the study participants with significant correlation to having ever volunteering is Asian. Whereas none of the research reviewed for the present study determined religious affiliation or race as a factor in volunteering, these findings are worthy of further exploration.

Significant negative correlations and significant correlations were found between employment status and nurse volunteering. Significant negative correlation was found between having ever volunteered and full time employment in nursing and also between having ever volunteered and being employed, other than nursing. This may indicate a lack of time for study participants who work full time to participate in volunteer activities, regardless of the employment setting. This interpretation may be supported by the significant finding regarding

nurse volunteering and employment status: significant correlation was found between having ever volunteered and not being employed outside the home.

### Internal Characteristics

Nurse volunteering was found to be significantly correlated with the internal characteristics of spirituality, altruism, and prosocialness. The instruments used to measure spirituality, altruism, and prosocialness were also found be significantly correlated with each other. These findings on nurse volunteering are supported in the literature on volunteering (Carlo & Randall, 2001; Weinstein & Ryan, 2010; Ji, Pendergraft, & Perry, 2006).

# External Opportunities

The present study defines external opportunities for volunteering as service learning or other pre-professional volunteering. While a significant negative correlation was determined to exist between school-related/required for course credit and volunteerism in the new nurse, a significant correlation was found between not school-related/voluntary activity and volunteerism in the new nurse. This finding supports making service learning and other pre-professional volunteering voluntary and not requiring participation for course credit.

### Implications for Education

Based on the finding that there was significant negative correlation between school-related/required for course credit and volunteerism in the new nurse, there needs to be dialogue about the requirement of service learning in baccalaureate education. Consideration needs to be given to encouraging, rather than requiring, service learning. Encouragement may take the form of having those students who have had positive volunteer experience share those experiences in forums where fellow students can ask questions. Consideration should also be given to

exploring whether applicants for nursing programs have volunteer experience and how that experience has or has not influenced their decision to apply for the program.

# Implications for Practice

Novice nurses are laying the foundation for their nursing practice during the first years after school. Health care agencies provide community outreach and may provide national and international venues for volunteers. Based on the finding that significant correlation was found between not school-related/voluntary activity and volunteerism in the new nurse, employers would do well to seek out those novice nurses who have volunteered in the past, consider hiring them, and engage them in these activities to enhance their practice. These novice nurses who have engaged in this type of volunteer activity would be more prosocial and exhibit caring behaviors that would improve patient care practices.

# Implications for Research

The correlations found in answering the first research question establish the basis for further inquiry. It should be determined whether baccalaureate graduates who were required to participate in service learning volunteered after graduation. Health care agencies have numerous opportunities for their employees to participate in volunteer activities. It should be determined if any increase in activity is seen in employees who work less than full time and, if so, whether there is a negative correlation between the time spent at work and the time spent in volunteer activities. There needs to be an effort to determine what the obstacles are to nurses participating in volunteer activity and, if mitigated whether a significant rise in volunteer activity is seen.

How do volunteer experiences in school and professionally influence the new nurses caring behaviors in practice, at least one year post graduation?

What are the determinants of caring behavior in the new nurse, at least one year post graduation?

#### Measurement Instruments

The Nyberg Caring Assessment Scale (NCAS) (Nyberg, 1990) was administered to determine how volunteer experiences influence caring behaviors and to illuminate the determinants of caring behaviors in new nurses who volunteer. The Cronbach's alpha obtained in this study was similar to those of published studies.

## **Findings**

# **External Opportunities**

In this study, it was determined that caring behavior in the new nurse is significantly correlated with voluntary, not school-related activity. It was also found that caring behaviors in the new nurse are significantly correlated with participation in local volunteer activities. This finding supports the work of Ibrahim and Brannen (1997) who found that while the motivation to volunteer may differ between male and female volunteers, both are interested in enhancing and improving their skills through their volunteer efforts. When considered within Watson's Caritas Processes (Watson 2008), this behavior becomes a caring one, rather than self-serving one.

### **Demographics**

Significant correlation was found between caring behavior and gender. This finding supports the work of Karniol and colleagues (2003) who determined that gender role orientation, rather than gender is a better predictor of the adoption of an ethic of care and those with higher caring scores volunteered for more hours.

No correlations were determined between caring behavior and age, birth order, level of basic nursing education, present enrollment in school (full time or part time), caretaking responsibilities, and marital status.

Although no correlation was found between caring behavior and religion or race, significant correlation was determined between caring behavior and those study participants who identified as actively practicing their religion. This finding indicates that regardless of the religion, it is the active practice of the religion that correlates with caring behavior.

Significant correlation was found between caring behavior and working per diem in nursing. Working per diem in nursing allows the nurse to control his or her own schedule. This may allow for the practice of caring behavior. The control over scheduling may create a better balance between home and work responsibilities, allowing for greater satisfaction in both areas.

Significant negative correlation was determined between caring behavior and working but not in nursing. Nurses who score low in caring behavior may self-select out of nursing as a profession. Other possibilities include whether nursing was a bad fit to begin with for this group, whether difficulties obtaining a job created dissatisfaction and disgruntlement, or there was a combination that may include disillusionment. This population subset would be worthy of further exploration.

### Implications for Education

The finding that caring behavior in the new nurse is significantly correlated with voluntary, not school-related volunteer activity provides more support that service learning should be a voluntary and not a required activity. Volunteer activity of this type may serve to nurture and guide the caring person to select a career such as nursing. The negative correlation found between caring behavior and those who report working, but not in nursing, supports the

idea caring behavior needs to be developed before the nurse graduates or the student should be counseled to seek alternative career options.

## Implications for Practice

The finding that significantly correlates caring behavior with working per diem in nursing has implications for the practice setting. Having control over your work schedule, inherent in the per diem position, may allow the nurse to feel empowered. Empowerment may be more conducive to caring behavior. Conversely, the nurse who scores higher on caring behavior may be a more empowered individual. And, this feeling of empowerment may be related to having control that allows for a healthier work and life balance that leaves time for self-care, reducing burnout and making caring for others easier. Health care agencies should determine how shared governance empowers nurses to have more control over their work schedule and foster caring behavior.

# Implications for Research

A study should be conducted that determines whether there is a critical number of volunteer hours and/or frequency of volunteering and a volunteer setting that most influences caring behavior in nurses.

The significant correlation that was determined between caring behavior and those study participants who identified as actively practicing their religion warrants further exploration. It should be determined whether the active practice of a specific religion or several religions correlated with caring behavior. While religion differs from spirituality, it should be determined whether any interaction exists between actively practicing a specific religion, spirituality, and caring behavior. It may also be postulated that people who actively practice their religion derive benefits from interacting with others with a shared vision and as a cultural group, Asians are

group –oriented, rather than individual-oriented. Whether volunteer work reinforces these factors should be explored.

Does volunteer experience in school and professionally influence the new nurse's self-report of satisfaction with career choice, at least one year post graduation?

Do internal characteristics such as spirituality, altruism or prosocialness predict satisfaction with career choice in the new nurse, at least one year post graduation?

### Measurement Instruments

The measurement instrument selected to measure satisfaction with career choice was derived from a measurement instrument developed by Kovner and colleagues (2007) to determine newly licensed RNs attitudes toward work. The research reported by Kovner and colleagues (2007) included a subscale of three questions that determined job satisfaction. For the present study, the term job satisfaction was replaced with the term satisfaction with career choice. These three questions were chosen to represent satisfaction with career choice because it was thought that it would be a reliable representation of satisfaction with career choice and by having the participant respond to three questions would decrease the burden on the respondents as other survey instruments were lengthy. The results indicated a very low measure of internal consistency and reliability of this measure of satisfaction with career choice for this study. A recommendation for future study would include the development and use of an instrument to reliably measure satisfaction with career choice that would not place undue burden on the study participant.

### **Findings**

Satisfaction with career choice was significantly correlated with not school-related, voluntary volunteer activities. There were no significant correlations determined between

satisfaction with career choice and any other independent variable tested, including volunteering at the local, national and international level. Not school-related voluntary volunteer activities is once again a predictor variable, in this case for satisfaction with career choice.

## Implications for Education

Once again the findings of this study do not support the Service Learning requirement of baccalaureate education. If the value of service learning in baccalaureate education is so transformative for the learner and therefore needs to remain an integral part of the baccalaureate curriculum, nursing educators will need to determine how to make it less onerous on the learner. Prospective students should be queried about their community engagement in the high school setting. This previous exposure may influence satisfaction with service learning requirements.

## Implications for Practice

Nursing position applicants should be asked about their volunteer experiences during interview. Employers should pay careful attention to the experiences the applicant describes and the attitudes towards continuing to be engaged in community outreach. Although job satisfaction does not equate to satisfaction with career choice, employers should support those activities that continue to nurture the development of professional knowledge, skills and attitudes.

### Implications for Research

Satisfaction with career choice is one of many factors that retain nurses working in health care. Research on the contributing factors to that satisfaction would have implications for education and practice. First there needs to be research on how best to encourage service learning so that the student has a consistently positive, transformative experience and does not perceive the requirement as onerous. Then, in practice, employers should determine the ideal

amount of time volunteering, the frequency of volunteering and the volunteer venue that best supports the enhancement of satisfaction with career choice.

Are internal characteristics such as spirituality, altruism, or prosocialness and select demographic variables, combined with volunteering experience, predictive of caring behaviors and satisfaction with career choice in the new nurse, at least one year post graduation?

#### Measurement Instruments

A path model was tested to determine whether volunteerism mediates the relationship between internal characteristics and caring behavior and a separate path model was tested to determine whether volunteerism mediates the relationship between internal characteristics and satisfaction with career choice. Volunteerism did not mediate the relationships with internal characteristics and either caring behavior or satisfaction with career choice.

Other sources of mediation for caring behavior may be considered in this model for future study. The present study found significant correlation between caring behavior and voluntary, not school-related volunteer activities. This type of volunteer behavior may mediate the relationship between internal characteristics and caring behavior. Other sources of mediation for satisfaction with career choice may also be considered in this model for future study. The present study found significant correlation between satisfaction with career choice and voluntary, not school-related volunteer activities.

### **Findings**

When caring behavior was held as the dependent variable, prosocialness and spirituality were found to have significant direct effects on caring behavior while altruism did not. This was an unexpected finding that may be explained when volunteerism was held as the dependent

variable as altruism was determined to have significant direct effects on volunteering while prosocialness and spirituality did not. Volunteerism was not found to have a significant effect on caring behavior. Using these results, a Path Model was developed that indicated that although prosocialness and spirituality predicted caring behavior, volunteerism was not significantly related to caring behavior. It also indicated that prosocialness and spirituality were not significantly related to volunteerism.

When satisfaction with career choice was held as the independent variable, prosocialness was found to have a direct effect on satisfaction with career choice, while altruism and spirituality did not. Volunteerism was not found to have a significant effect on satisfaction with career choice. Using these results, a Path Model was developed that indicated that, although prosocialness significantly predicted satisfaction with career choice, volunteerism was not significantly related to satisfaction with career choice. It also indicated that altruism and spirituality were not related to satisfaction with career choice.

When the effects of selected demographics that were significantly correlated with caring behavior were placed into the regression model, there was a significant increase in the amount of the variance explained by the model. However, when external opportunities that were significantly correlated with the caring behavior were placed in the model, there was a significant decrease in the amount of variance explained by the model, an unexpected finding.

The regression model developed for the effects of external opportunities on satisfaction with career choice had a very small, although significant, amount of variance that was explained by the model. When external opportunities that were significantly correlated with satisfaction with career choice were placed in the model, the amount of variance explained by the model increased significantly and, proportionately, it was a very large increase.

# Implications for Education

Prosocialness had a large, significant effect on caring behavior. In addition to exploring how caring behavior may be developed and nurtured, prosocial behavior needs to be addressed. It may be possible to develop and nurture prosocialness concomitantly. The model developed in the present study shows that as prosocialness increases, caring behavior increases. Ways to develop and nurture prosocialness and caring concomitantly should be studied and further explored, including ways that classroom structure and learning may be influenced.

## Implications for Practice

An unexpected finding was that external opportunities decreased the amount of variance explained by the caring behavior model, yet selected demographics increased the amount of variance explained by the caring behavior model. It would be in the best interest of the employers to develop and nurture caring behavior. They should offer a wide range of external opportunities for volunteering and community outreach and carefully choose those who are offered the opportunity to volunteer, with attention to the demographic profile that increases caring behavior.

### Implications for Research

A valid and reliable measurement tool for satisfaction with career choice in nursing should be developed. A more suitable measurement tool for measuring volunteerism in nursing should also be developed. The tool should include the amount of time at each volunteer encounter, the frequency of the encounters, the variety of the encounters and the venues for volunteering. This study could be replicated using the two newly developed tools.

There should be further exploration of the finding that while prosocialness and spirituality was found to have significant direct effects on caring behavior, altruism did not.

And, yet altruism was determined to have significant direct effects on volunteering, prosocialness and spirituality did not. This study showed that, although the measurement tools are measuring different constructs, prosocialness, spirituality and altruism were all correlated with each other.

# Watson's Transpersonal Caring Relationship

Watson (2012) describes the transpersonal caring relationship as one that pushes the boundaries of the nurse-client relationship. Traditional views of the nurse-client relationship support well-defined boundaries and discourage the development of anything other than a well-circumscribed, professional nurse-client relationship. Watson (2012) challenges these views and defines caring in nursing as "... the moral ideal... where there is the utmost concern for human dignity and preservation of humanity" (p. 75). While Watson (2012) ideally envisions each nurse-client interaction in this way, the findings of the present study supports the notion that the nurse who participates in volunteering in a non-school related, voluntary manner may experience the nurse-client interaction described in the transpersonal caring relationship (Watson 2012).

Nurses who provide unpaid, voluntary professional services to the underserved in a variety of settings may have more satisfying volunteer experiences if they allow themselves to bring into the relationship what Watson (2012) believes are the necessities to establish a transpersonal relationship: their collective past and previous experience. Non-school related, voluntary volunteer experiences may allow for the most unencumbered nurse-client relationship. This may give rise to increased caring behaviors that also impact patient care in the paid setting, where nurses practice. By encouraging nurses to go "beyond ego-self and connecting with something greater," (p.77), Watson (2012) provides the nurse who provides his or her

professional talent unpaid, to serve the underserved a goal to attain and an ideal to strive for in the professional practice setting.

The discussion section began with comparing key demographic characteristics of the study participants to the national nursing workforce to support the generalizability of the study findings. The research questions and the measurement instruments used to answer their associated hypotheses were discussed to determine the strength of the instruments as valid constructs of the research variables. The contribution that the findings of the study make to Watson's (2012) Transpersonal Caring Relationship was explored.

### Conclusions

There are a number of conclusions that can be drawn from the results of this study. They will be categorized as study findings, measurement tools, and contribution to the science.

# **Study Findings**

There are both positive demographic influences on nurse volunteering such as BSN as basic nursing education, present enrollment in a Master's Program, Protestant religion, Asian race and not working outside the home and there are negative demographic influences on nurse volunteering such as basic nursing education, full time employment in nursing and employed but not in nursing. The internal characteristics of spirituality, altruism and prosocialness also influence nurse volunteering. Positively influencing nurse volunteering is volunteering that was voluntary, not school-related and negatively influencing nurse volunteering was volunteering that was school-related, course required.

Caring behavior in the novice nurse was positively influenced by participation in voluntary, not school-related activities and participation in local volunteer activity. Volunteer activity that was not school-related also positively influenced the new nurse's self-report of

satisfaction with career choice. Caring behavior in the novice nurse was also positively influenced by gender, active practice of religion, and working per diem in nursing as well as spirituality, altruism and prosocialness. Each of these external characteristics of spirituality, altruism and prosocialness were also positively correlated with satisfaction with career choice in the novice nurse.

The internal characteristics of prosocialness and spirituality were found to have direct effects on caring behavior and prosocialness was also found to have direct effects on satisfaction with career choice. Volunteerism was not found to mediate either relationship in the Path Models.

There were a number of significant findings in the logistic models. Female gender, actively practicing religion and working per diem in nursing significantly added percentage of the variance explained by the Caring Behavior Model. Although the external opportunity variable not school-related/voluntary volunteer activity was significantly correlated with both caring behavior and satisfaction with career choice, adding to the logistic models of each outcome variable gave different effects. When added to the Caring Behavior Model, the percentage of the variance explained by the model decreased but when added to the Satisfaction with Career Choice Model the percentage of the variance explained by the model increased.

#### **Tools**

All of the measurement tools used in this study had high validity and reliability with the exception of the derived measurement tool used to determine satisfaction with career choice. In addition, the use of the created dichotomous variable Longevity Variable was limiting because of the inability to quantify the volunteer experience.

#### Contribution to the Science

Non-school related, voluntary volunteer experiences influenced both caring behavior and satisfaction with career choice in this sample of novice nurses. That setting may be where the nurse feels most as one with his or her client and can allow for the blurring of the lines, as Watson (2012) suggests in her Theory of Transpersonal Caring. The sixth Caritas Process of Watson's theory requires the creative use of self. In the non-school related, voluntary volunteer environment, the nurse may feel unencumbered because he or she freely chose the experience and has no concern for a grade or other academic requirement. This freedom may allow the nurse in this setting to use her creative self because he or she is free from those constraints and this may allow for a transformative experience. Additionally, volunteer work reinforces a caring self-concept and fulfills an individual's need for skill development.

#### Recommendations

The study population was novice nurses. This study should be replicated using a study population of experienced nurses that is stratified by level and of practice: academic, staff nurse, advance practice nurse, and nurse administrator.

The instrument used to measure satisfaction with career choice proved to be less than an adequate latent construct. A study to develop a tool to measure satisfaction with career choice in nursing would be of use to replicate this study and to look at satisfaction with career choice in nursing in other studies.

This study has a number of implications for education, practice and research that can be summarized as follows:

### Education

Service learning that is required for course credit in baccalaureate programs needs to be revisited. While the necessity for learning in the service learning environment is an essential part of the curriculum, the approach should be reviewed. The results of this study indicate that requiring service learning without regard to student input results in the opposite of the intended effect.

### **Practice**

Employers should be querying upon interview all prospective RN job applicants about their volunteer experiences. Most health care agencies have community outreach opportunities for their employees. These opportunities should be made more accessible and supported by the employer. Consideration should be given to employer support for organizing groups that volunteer on the national and international level.

#### Research

There is a dearth of research on volunteerism in nursing. Although this study focused on caring behavior and satisfaction with career choice as outcome variables, there are a number of other outcome variables to consider such a job satisfaction, career mobility and mentoring.

Future research should consider the effects of volunteering on these variables.

Organizational volunteering should also be studied. Nurses volunteer for professional organizations. Determining the effects of their work in these organizations on their practice should be explored.

#### Limitations

The statistical test employed for the first research question regarding the influences of new nurses who volunteer was correlation, resulting in causal inferences (Polit & Beck, 2012)

that may oversimplify relationships. In addition, this was self-reported, survey based research with inherent biases. These findings may be used to provide a description of the typical novice nurse who participates in volunteering.

There were survey questions that attempted to quantify the frequency of volunteering. The small number of respondents to the questions did not allow for statistical analysis. Caring behavior was a self-report measurement tool which may lead to participant bias. Other caring measurement tools exist. However, those tools are two-part, with the second part requiring concomitant responses from either a supervisor or patients. Neither of these were an option for the present study and study design.

The instruments selected for this study each had previously been used and resulted in high internal consistency and reliability for each of the latent constructs. The limitations of the findings of the present study include the low internal consistency and reliability of the instrument tool used to measure the latent construct satisfaction with career choice. Job satisfaction does not necessarily correlate with career satisfaction and, therefore, a more nuanced tool would enhance the measurement of the construct. Rather than use a derived tool as was used in this study, a recommendation for future study would be to identify and use a more reliable tool to measure satisfaction with career choice.

Another limitation would be the myriad of other things that could contribute to a person's satisfaction with career choice that were not measured in the present study. A future study could look at how volunteering contributes together with a host of variables that correlate with satisfaction with career choice.

While the Regression Models and Path Models that were developed had significant effects as reported, the effect sizes were small, with the exception of the effect of prosocialness

on caring behavior. The research question did not include the effect of selected demographics on satisfaction with career choice that limits the ability to see whether not school-related voluntary volunteer activities would have added to the variance in the model that would be developed. The low internal consistency and reliability of the measurement tool for satisfaction with career choice may have affected any of the models that were developed.

Initial findings upon hypotheses testing on the multiple volunteering questions indicated few, weak significant correlations. As a result, a review of the data was undertaken to develop a variable that would more accurately capture volunteerism in the study sample. The longevity volunteer variable was created as a dichotomous variable where the criterion for a positive score was whether the study participant ever volunteered or volunteers now. While this was necessary, the decision also took away the ability to determine whether differences existed if the participant volunteered before but not presently and whether the frequency of volunteering influenced either of the dependent variables.

# **Summary**

This was a quantitative study of new nurses, over a year after graduation, who responded to an initial survey from the National Nurses Students Association stating that they would participate in follow up surveys. There was a 29% response rate to the online survey collection site.

The genders of the participants of the study approximated the dispersion of the national workforce but were skewed toward a younger group and were overwhelmingly White and employed in nursing, with the majority having earned BSNs or greater as their basic RN education. Twenty-five percent of respondents were presently in school and nearly half were married or in a domestic partnership. While slightly more than half of the participants reported

that they were actively practicing their religion, nearly half of the participants were either non-affiliated or other. The majority of participants were part of the National Student Nurses

Association (NSNA) Total School Program. Nearly two-thirds reported having volunteered.

All of the measurement instruments used in this study, with the exception of the measurement tool used to measure satisfaction with career choice, demonstrated internal consistencies in scales and subscales with Cronbach's alpha values at or above those values reported in previous studies.

Demographic influencing characteristics of nurses who volunteer fell into two categories: positive and negative. The positive influences are BSN as basic nursing education, presently enrolled in a Master's Program, Protestant religion, Asian race, and not working outside the home. The negative influences are ADN as basic education, full time employment in nursing and employed but not in nursing.

Caring behavior was found to be influenced by two categories of volunteer experience: voluntary, not school-related volunteer activities and participation in local volunteer activity.

Caring behavior was also influenced by gender, active practice of religion, and working per diem status in nursing. Caring behavior was negatively influenced by working but not in nursing.

Caring behavior was also determined by the internal characteristic of spirituality, altruism and prosocialness.

Volunteer activity that was not school-related also positively influenced satisfaction with career choice, although no other volunteer activity was associated with satisfaction with career choice. The internal characteristics of spirituality, altruism and prosocialness were positively correlated with satisfaction with career choice.

Volunteerism was found not to mediate the relationship between internal characteristics or demographics in both Path Models of Caring Behavior and Satisfaction with Career Choice. Prosocialness and spirituality were found to have direct effects on caring behavior.

Prosocialness was found to have direct effects on satisfaction with career choice.

In the Caring Behavior Model, being female, actively practicing religion and working per diem in nursing which all significantly correlated with caring behavior significantly added to the percentage of variance explained by the model.

In the Caring Behavior Model not school-related, voluntary volunteer activity significantly decreased the percentage of variance explained by the model but when placed in the Satisfaction with Career Choice Model, not school-related, voluntary volunteer activity significantly increased the variance explained by the model.

Implications for education, practice and research were presented, conclusions were provided and recommendations for future research were discussed.

### References

- Allison, L. D., Okun, M. A., & Dutridge, K. S. (2002). Assessing volunteer motives: A comparison of an open-ended probe and likert rating scales. *Journal of Community & Applied Social Psychology*, 12(4), 243-255. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=mnh&AN=EPTOC11820165&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=mnh&AN=EPTOC11820165&site=ehost-live</a>
- Alspach, J. G. (2014). Harnessing the therapeutic power of volunteering. *Critical Care Nurse*, 34(6), 11-14; 4p. doi:10.4037/ccn2014239
- Bang, H., Ross, S., Reio, T.G. (2013). From motivation to organizational commitment of volunteers in non-profit sport organizations. the role of job satisfaction. *Journal of Management Development*, 32(1), May 26, 2013-96-112. doi:10.1108/02621711311287044
- Barber, C., Mueller, C. T., & Ogata, S. (2013). Volunteerism as purpose: Examining the long-term predictors of continued community engagement. *Educational Psychology (Dorchester-on-Thames)*, 33(3), 314; 314-333; 333.
- Barlett, J. E., Kotrlik, J. W., & Higgins, C. C. (2001). Organizational research: Determining appropriate sample size in survey research. *Information Technology, Learning, and Performance Journal*, *19*(1), 43-50. Retrieved from <a href="http://search.proquest.com.molloy.idm.oclc.org/docview/219816871?accountid=28076">http://search.proquest.com.molloy.idm.oclc.org/docview/219816871?accountid=28076</a>
- Baron, R. M., & Kenny, D. A. (1986). The moderator–mediator variable distinction in social psychological research: Conceptual, strategic, and statistical considerations. *Journal of Personality and Social Psychology*, *51*(6), 1173-1182. doi:10.1037/0022-3514.51.6.1173

- Baruch, Y., & Holtom, B. C. (2008). Survey response rate levels and trends in organizational research. *Human Relations*, *61*(8), October 5, 2013-139. doi:10.1177/0018726708094863
- Belansky, E. S., & Boggiano, A. K. (1994). Predicting helping behaviors: The role of gender and instrumental/expressive self-schemata. *Sex Roles*, *30*(9), 647-661. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=sih&AN=9501304330&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=sih&AN=9501304330&site=ehost-live</a>
- Bem, S. L., & Lewis, S. A. (1975). Sex role adaptability: One consequence of psychological androgyny. *Journal of Personality and Social Psychology*, *31*(4), 634-643. doi:10.1037/h0077098
- Bennett, J. A. (2000). Focus on research methods. mediator and moderator variables in nursing research: Conceptual and statistical differences. *Research in Nursing & Health*, 23(5), 415-420. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2001004992&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2001004992&site=ehost-live</a>
- Brim, O., Baltes, P., Bumpass, L., Cleary, P., Featherman, D., Hazzard, W., Kessler, R., Lachman, M., Markus, H., Marmot, M., Rossi, A., Ryff, C., &Shweder, R. National Survey of Midlife Development in the United States (MIDUS), 1995-1996. ICPSR02760-v8. Ann Arbor, MI: Inter-university Consortium for Political and Social Research [distributor], 2011-10-25. http://doi.org/10.3886/ICPSR02760.v8
- Budden, J. S., Zhong, E. H., Moulton, P., & Cimiotti, J. P. (2013). The 2013 national nursing workforce survey of registered nurses. *Journal of Nursing Regulation*, , S3-S72 1p.

Retrieved from

http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=107960119&site=ehost-live

- Bureau of Labor Statistics. (2014). *Volunteering in the united states- 2013*. (News Release No. USDL-14-0314). Washington, DC: United States Department of Labor.
- Caprara, G. V., & Pastorelli, C. (1993). Early emotional instability, prosocial behaviour, and aggression: Some methodological aspects. *European Journal of Personality*, 7(1), 19-36.

  Retrieved from

  <a href="http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=12203682&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=12203682&site=ehost-live</a>
- Caprara, G. V., Steca, P., Zelli, A., & Capanna, C. (2005). A new scale for measuring adults' prosocialness. *European Journal of Psychological Assessment: Official Organ of the European Association of Psychological Assessment*, 21(2), 77; 77-89; 89.
- Carlo, G., Okun, M. A., Knight, G. P., & de Guzman, M. R. T. (2005). The interplay of traits and motives on volunteering: Agreeableness, extraversion and prosocial value motivation.
  Personality and Individual Differences, 38(6), 1293-1305. doi:DOI:
  10.1016/j.paid.2004.08.012
- Carlo, G., & Randall, B. A. (2001). Are all prosocial behaviors equal? A socioecological developmental conception of prosocial behavior. In F. Columbus (Ed.), (pp. 151-170).Hauppauge, NY US: Nova Science Publishers. Retrieved from

- http://search.ebscohost.com/login.aspx?direct=true&db=psyh&AN=2001-01576-007&site=ehost-live
- Chally, P., PhD, RN, Hernke, D. A., & Scaz, L., PhD, RN. (2010). Perspectives of nurse executives: Lessons learned in haiti. *The Journal of Nursing Administration*, 40(6), 283.
- Chase-Ziolek, M., & Striepe, J. (1999). A comparison of urban versus rural experiences of nurses volunteering to promote health in churches. *Public Health Nursing*, *16*(4), 270-279.

  Retrieved from

  <a href="http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2000005546&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2000005546&site=ehost-live</a>
- Clary, E. G., Snyder, M., Ridge, R. D., Copeland, J., Stukas, A. A., Haugen, J., & Miene, P. (1998). Understanding and assessing the motivations of volunteers: A functional approach. *Journal of Personality and Social Psychology*, 74(6), 1516-1530. doi:10.1037/0022-3514.74.6.1516
- Cocca-Bates, K. C., & Neal-Boylan, L. (2011). Retired RNs: Perceptions of volunteering.

  Geriatric Nursing, 32(2), 96-105.

  doi:http://dx.doi.org.molloy.idm.oclc.org/10.1016/j.gerinurse.2010.11.003
- Coghlan, A. (2011). Applying a transformative learning framework to volunteer tourism. *Journal of Sustainable Tourism*, 19(6), 713; 713-728; 728. doi:10.1080/09669582.2010.542246
- Cohen, J., Cohen, P., West, S. G., & Aiken, L. S. (2003). *Applied multiple regression/correlation analysis for the behavioral sciences* (3rd ed. ed.). New York, NY: Taylor & Francis Group.

- Coren, N., Gray, T. (2012). Comodification of volunteer tourism. A comparative study of volunteer tourists in vietnam and in thailand. *International Journal of Tourism Research*, 14, 222-234. doi:10.1002/jtr.848
- Cowlishaw, S., Evans, L., & McLennan, J. (2010). Balance between volunteer work and family roles: Testing a theoretical model of work-family conflict in the volunteer emergency services. *Australian Journal of Psychology*, 62(3), 169-178. doi:10.1080/00049530903510765
- Dalton, M. (2014). Red Cross recognizes nurses' contributions during National Nurses Week.

  \*American Red Cross: Nursing Matters Past and Present, (Fourteenth Edition, Spring 2014).

  Retrieved from

  http://www.redcross.org/images/MEDIA\_CustomProductCatalog/m32340094\_Nursing\_Matters\_PastPresent\_Spring14.pdf
- Dillman, D. A., Smyth, J. D., & Christian, L. M. (2009). *Internet, mail, and mixed-mode surveys:*The tailored design method (Third ed.). Hoboken, NJ: John Wiley and Sons, Inc.
- Edwards, J. R., & Lambert, L. S. (2007). Methods for integrating moderation and mediation: A general analytical framework using moderated path analysis. *Psychological Methods*, *12*(1), 1-22. doi:10.1037/1082-989X.12.1.1
- Einolf, C., J. (2011). Gender differences in the correlates of volunteering and charitable giving.

  Nonprofit and Voluntary Sector Quarterly, 40(6), 1092-1112.

  doi:10.1177/0899764010385949

- Eisenberg, N., Carlo, G., Murphy, B. C., & van Court, P. (1995). Prosocial development in late adolescence: A longitudinal study. *Child Development*, 66(4), September 7, 2013-1179. doi: .0009-3920/95/6604-0014
- Eisenberg, N., Guthrie, I. K., Cumberland, A., Murphy, B. C., Shepard, S. A., Zhou, Q., & Carlo, G. (2002). Prosocial development in early adulthood: A longitudinal study. *Journal of Personality and Social Psychology*, 82(6), 993-1006. doi:10.1037/0022-3514.82.6.993
- Engleberg, T., Zakus, D. H., Skinner, J. L., Campbell, A. (2012). Defining and measuring dimensionality and targets of the commitment of sports volunteers. *Journal of Sports Management*, 26, 192-205.
- Erez, A., Mikulincer, M., van Ijzendoorn, M. H., & Kroonenberg, P. M. (2008). Attachment, personality, and volunteering: Placing volunteerism in an attachment-theoretical framework.

  \*Personality and Individual Differences, 44(1), 64-74. doi:DOI: 10.1016/j.paid.2007.07.021
- Erlinghagen, M., & Hank, K. (2006). The participation of older europeans in volunteer work. *Ageing and Society*, 26, 567-584. doi:10.1017/S0144686X06004818
- Finkelstein, M. A. (2009). Intrinsic vs. extrinsic motivational orientations and the volunteer process. *Personality and Individual Differences*, 46(5-6), 653-658. doi:DOI: 10.1016/j.paid.2009.01.010
- Foster, R., L. (2011). International nursing: Culture in context, part II. *Journal for Specialists in Pediatric Nursing*, 16(1), 5-5. doi:10.1111/j.1744-6155.2010.00275

- Fothergill, A., Palumbo, M. V., Rambur, B., Reinier, K., & McIntosh, B. (2005). The volunteer potential of inactive nurses for disaster preparedness. *Public Health Nursing*, 22(5), 414-421. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2009067081&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2009067081&site=ehost-live</a>
- Gau, Y-M., Usher, K., Stewart, L., Buettner, P. (2013). Burden experienced by community health volunteers in taiwan. A qualitative study. *International Journal of Nursing Practice*, 19, 74-80. doi:doi:10.1111/ijn.12024
- Gilligan, C. (1988). Two moral orientations: Gender differences an similarities. *Merrill-Palmer Quarterly* (1960), 34, 223.
- Groves, R. M., Singer, E., & Corning, A. (2000). Leverage-saliency theory of survey participation. *Public Opinion Quarterly*, 64(3), 299-308. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=ufh&AN=4042411&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=ufh&AN=4042411&site=ehost-live</a>
- Holmbeck, G. N. (1997). Toward terminological, conceptual, and statistical clarity in the study of mediators and moderators: Examples from the child-clinical and pediatric psychology literatures. *Journal of Consulting and Clinical Psychology*, 65(4), 599-610. doi:10.1037/0022-006X.65.4.599
- Huynh, J. Y., Xanthopoulou, D., & Winefield, A. H. (2013). Social support moderates the impact of demands on burnout and organizational connectedness: A two-wave study of volunteer firefighters. *Journal of Occupational Health Psychology*, 18(1), 9-15. doi:10.1037/a0030804

- Ibrahim, N. A., & and Brannen, D. E. (1997). Implications of gender differences on the motivation to volunteer in hospitals. *Journal of Social Service Research*, 22(4), 1-18. doi:10.1300/J079v22n04 01
- International Volunteer Opportunities. (n.d.) Retrieved from http://www.nursingsociety.org/connect-engage/volunteer-connect/volunteer-opportunities/international-volunteer-opportunities
- Jack, B.A., Kirton, J.A., Birakurataki, J., Merriman, A. (2011a). 'A bridge to hospice'. the impact of a community volunteer programme in uganda. *Palliative Medicine*, 25(7), May 26, 2013-706-715. doi:DOI: 10.1177/0269216310397566
- Jack, B.A., Kirton, J.A., Birakurataki, J., Merriman, A. (2011b). The personal value of being a palliative care community volunteer worker. A qualitative study. *Palliative Medicine*, 26(5), May 26, 2013-753-759. doi:10.1177/0269216311413628
- Ji, C. C., Pendergraft, L., & Perry, M. (2006). Religiosity, altruism, and altruistic hypocrisy:

  Evidence from protestant adolescents. *Review of Religious Research*, 48(2), 156-178.

  Retrieved from

  <a href="http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=23492502&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=23492502&site=ehost-live</a>
- Jones, A. (2005). Assessing international youth service programmes in two low income countries. Voluntary Action: The Journal of the Institute for Volunteering Research, 7(2), July 7, 2013-87-100.

- Karniol, R., Grosz, E., & Schorr, I. (2003). Caring, gender role orientation, and volunteering. *Sex Roles*, 49(1/2), 11-11+. Retrieved from <a href="http://search.proquest.com.molloy.idm.oclc.org/docview/225368828?accountid=28076">http://search.proquest.com.molloy.idm.oclc.org/docview/225368828?accountid=28076</a>
- Keeling, A. W. (2009). 'When the city is a great field hospital': The influenza pandemic of 1918 and the new york city nursing response. *Journal of Clinical Nursing*, 18(19), 2732-2738. doi:10.1111/j.1365-2702.2009.02893.x
- Koenig, H., Parkerson GR Jr, & Meador, K. G. (1997). Religion index for psychiatric research [letter]. *The American Journal of Psychiatry*, *154*(6), 885-6. Retrieved from http://search.proquest.com.molloy.idm.oclc.org/docview/220469523?accountid=28076
- Kovner, C. T., Brewer, C. S., Fairchild, S., Poornima, S., Kim, H., & Djukic, M. (2007). Newly licensed RNs' characteristics, work attitudes, and intentions to work. *American Journal of Nursing*, 107(9), 58. doi:10.1097/01.NAJ.0000287512.31006.66
- Lai, M.H., Ren, M.Y., Wu, A.M., Hung, E.P. (2013). Motivation as mediator between national identity and intention to volunteer. *Journal of Community and Applied Social Psychology*, 23, May 26, 2013-128-142. doi:10.1002/casp.2108
- Larson, P. (1984). Important nurse caring behaviors perceived by patients with cancer. *Oncology Nursing Forum*, 11(6), 46.
- Law, B., & Shek, D. (2009). Family influence on volunteering intention and behavior among chinese adolescents in hong kong. *Adolescence*, 44(175), 665. Retrieved from

- http://proquest.umi.com/pqdweb?did=1905671491&Fmt=7&clientId=18094&RQT=309&V
  Name=PQD
- Lipford, J. W., & Yandle, B. (2009). The determinants of purposeful voluntarism. *Journal of Socio-Economics*, 38(1), 72-79. doi:DOI: 10.1016/j.socec.2008.10.012
- Lough, B. J., McBride, A. M., & Sherraden, M. S. (2009). *Perceived effects of international volunteering: Reports from alumni*. (No. CSD 09-10). St. Louis: Washington University in St. Louis.
- Luping, W. (2011). Motivations for youth volunteer participation. types and structure-- an analysis of interviews with twenty-four young volunteers. [Zhiyuan zhe de canyu dongji: Leixing, jiegou-dui 24 ming qingnian zhiyuan zhe de fangtan fenxi] *Chinese Education and Society*, 44(2-3), May 26, 2013-176-192. doi:10.2753/CED1061-1932440215
- MacKinnon, D. P., Lockwood, C. M., Hoffman, J. M., West, S. G., & Sheets, V. (2002). A comparison of methods to test mediation and other intervening variable effects.
  Psychological Methods, 7(1), 83-104. doi:10.1037/1082-989X.7.1.83
- Mancino, D. J. (2002). 50 years of the national student nurses' association. Brooklyn, NY: National Student Nurses' Association, Inc.
- Mancino, D. J. (2013). Recalculating: The "nursing shortage" needs new direction. *Dean's Notes*, 34(3), 1-3. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2012062027&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2012062027&site=ehost-live</a>

- Mankamyer, C. (2010). Medical volunteerism: Tips from a nurse returned from haiti.[article].

  Nursing, 40(11), 48. doi:10.1097/01.NURSE.0000388315.60522.cc
- Manning, L. (2010). Gender and religious differences associated with volunteering in later life.

  \*\*Journal of Women & Aging, 22(2), 125. Retrieved from 

  http://proquest.umi.com/pqdweb?did=2022162701&Fmt=7&clientId=18094&RQT=309&V

  Name=PQD
- Marta, E., & Pozzi, M. (2008). Young people and volunteerism: A model of sustained volunteerism during the transition to adulthood. *Journal of Adult Development*, 15(1), 35-46. doi:10.1007/s10804-007-9033-4
- McBride, A. M., Greenfield, J. C., Morrow-Howell, N., Lee, Y. S., McCrary, S. (2012).

  Engaging adult volunteers in national service. *Social Work Research*, *32*(2), 101-112.

  doi:10.1093/swr/svs0l7
- Mellor, D., Hayashi, Y., Firth, L., Stokes, M., Chambers, S., & Cummins, R. (2008).

  Volunteering and well-being: Do self-esteem, optimism, and perceived control mediate the relationship? *Journal of Social Service Research*, *34*(4), 61-70. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=sih&AN=34945958&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=sih&AN=34945958&site=ehost-live</a>
- Mesch, D. J., Rooney, P. M., Steinberg, K. S., & Denton, B. (2006). The effects of race, gender, and marital status on giving and volunteering in indiana. *Nonprofit and Voluntary Sector Quarterly*, 35, 565-587. doi:10.1177/0899764006288288

- Mikulincer, M., Shaver, P. R., Gillath, O., & Nitzberg, R. A. (2005). Attachment, caregiving, and altruism: Boosting attachment security increases compassion and helping. *Journal of Personality and Social Psychology*, 89(5), 817-839. doi:DOI: 10.1037/0022-3514.89.5.817
- Miller, D. H. (2010). Haiti revisited: The more things change, the more they stay the same.

  \*Pediatric Nursing, 36(5), 264-267. Retrieved from

  http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2010827655&site=ehost-live
- Moore, S. (2010). We'll do whatever we can. *Oncology Nursing Forum*, *37*(2), 117-117. doi:10.1188/10.ONF.117
- Mostafanezhad, M. (2013). The geography of compassion in volunteer tourism. *Toursism Geographies: An International Journal of Tourism Space, Place, and Environment, 15*(2), May 29, 2013-318-337. doi:10.1080/14616688.2012.675579
- Mowen, J. C., & Sujan, H. (2005). Volunteer behavior: A hierarchical model approach for investigating its trait and functional motive antecedents. *Journal of Consumer Psychology*, 15(2), 170-182. doi:DOI: 10.1207/s15327663jcp1502\_9
- Murayama, H., Taguchi, A., & Murashima, S. (2012). Does similarity in educational level between health promotion volunteers and local residents affect activity involvement of the volunteers? *Public Health Nursing*, 29(1), 36-43. doi:10.1111/j.1525-1446.2011.00965.x

- Murayama, H., Taguchi, A., Murashima, S. (2013). Exploring the ideal combination of activity satisfaction and burden among health promotion volunteers. A cross-sectional study in japan. *BMC Public Health*, *13*, May 26, 2013-205. doi:10.1186/1471-2458-13-205
- Narushima, M. (2005). 'Payback time': Community volunteering among older adults as a transformative mechanism. *Ageing and Society*, 25(4), 567-584. doi:http://dx.doi.org.molloy.idm.oclc.org/10.1017/S0144686X05003661

National Student Nurses' Association House of Delegates. (2013a). NSNA fact sheet

National Student Nurses' Association House of Delegates. (2013b). Total membership plan

- Nulty, D. D. (2008). The adequacy of response rates to online and paper surveys: What can be done? *Assessment & Evaluation in Higher Education*, 33(3), 301-314. doi:10.1080/02602930701293231
- Nyberg, J. (1990). The effects of care and economics on nursing practice. *The Journal of Nursing Administration*, 20(5), 13-18.
- Oesterle, S., Johnson, M. K., & Mortimer, J. T. (2004). Volunteerism during the transition to adulthood: A life course perspective. *Social Forces*, 82(3), 1123-1149. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=13070236&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=13070236&site=ehost-live</a>
- Okun, M. A., & Eisenberg, N. (1992). Motives and intent to continue organizational volunteering among residents of a retirement community area. *Journal of Community Psychology*, 20, 183-187.

- Olberding, J. C. (2012). Does student philanthropy work? A study of long-term effects of the 'learning by giving' approach. *Innovative Higher Education*, *37*(2), 71-87. doi:10.1007/s10755-011-9189-5
- Omoto, A. M., & Snyder, M. (1995). Sustained helping without obligation: Motivation, longevity of service, and perceived attitude change among AIDS volunteers. *Journal of Personality and Social Psychology*, 68(4), 671-686. doi:10.1037/0022-3514.68.4.671
- Parnell, A. R. (2010). The relationship between volunteering and undergraduate academic achievement at florida state university (PhD).
- Parnes, H. S.. (1975). The National Longitudinal Surveys: New Vistas for Labor Market Research. *The American Economic Review*, 65(2), 244–249. Retrieved from http://www.jstor.org/stable/1818860
- Penner, L. A. (2002). Dispositional and organizational influences on sustained volunteerism: An interactionist perspective. *Journal of Social Issues*, *58*(3), 447-467. doi:10.1111/1540-4560.00270
- Penner, L. A., & Finkelstein, M. A. (1998). Dispositional and structural determinants of volunteerism. *Journal of Personality and Social Psychology*, 74(2), 525-537. doi:10.1037/0022-3514.74.2.525
- Petriwskyj, A., & Warburton, J. (2007). Motivations and barriers to volunteering by seniors: A critical review of the literature. *The International Journal of Volunteer Administration*, 24(6), 3-25.

- Plummer, C. A., Ai, A. L., Lemieux, C. M., Richardson, R., Dey, S., Taylor, P., . . . Hyun-Jun Kim. (2008). Volunteerism among social work students during hurricanes katrina and rita: A report from the disaster area. *Journal of Social Service Research*, *34*(3), 55-71. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=32547027&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=32547027&site=ehost-live</a>
- Polit, D. F. (2010). *Statistics and data analysis for nursing research* (Second ed.). Upper Saddle River, NJ: Pearson Education Inc.
- Polit, D. F., & Beck, C.T. (2011). Nursing research: Generating and assessing evidence for nursing practice. Philadelphia: Wolters Kluwer Health/ Lippincott Williams Wilkins
- Primary Health Care. (2011). An opportunity to work in developing countries. *Primary Health Care*, 21(10), 5-5. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=69826866&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=69826866&site=ehost-live</a>
- Reeder, J. M. (2001). Why I volunteer for the american red cross. *Association of Operating Room Nurses.AORN Journal*, 74(5), 607-8. Retrieved from <a href="http://search.proquest.com.molloy.idm.oclc.org/docview/200810134?accountid=28076">http://search.proquest.com.molloy.idm.oclc.org/docview/200810134?accountid=28076</a>
- Rooney, P. M., Mesch, D. J., Chin, W., & Steinberg, K. S. (2005). The effects of race, gender and survey methodologies on giving in the U.S. *Economics Letters*, 86, 173-180. doi:10.1016/j.econlet.2004.06.015

- Rotolo, T., & Wilson, J. (2004). What happened to the "long civic generation"? explaining cohort differences in volunteerism. *Social Forces*, 82(3), 1091-1121. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=13069957&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=13069957&site=ehost-live</a>
- Rozario, K. (2003). "Delicious horrors": Mass culture, the red cross, and the appeal of modern american humanitarianism. *American Quarterly*, *55*(3), 417-455. Retrieved from <a href="http://search.proquest.com.molloy.idm.oclc.org/docview/223318050?accountid=28076">http://search.proquest.com.molloy.idm.oclc.org/docview/223318050?accountid=28076</a>
- Rudden, P. (2011). Volunteering for service: The role of emergency nurses. *Emergency Nurse*, 19(4), 18-19. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2011213474&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=rzh&AN=2011213474&site=ehost-live</a>
- Rushton, J., Chrisjohn, R. D., & Cynthia Fekken, G. (1981). The altruistic personality and the self-report altruism scale. *Personality and Individual Differences*, 2(4), 293-302. doi:http://dx.doi.org.molloy.idm.oclc.org/10.1016/0191-8869(81)90084-2
- Ryan, R. M., Rigby, S., & King, K. (1993). Two types of religious internalization and their relations to religious orientations and mental health. *Journal of Personality and Social Psychology*, 65(3), 586-596. doi:10.1037/0022-3514.65.3.586
- Seidlitz, L., Abernethy, A. D., Duberstein, P. R., Evinger, J. S., Chang, T. H., & Lewis, B. L. (2002). Development of the spiritual transcendence index. *Journal for the Scientific Study of Religion*, 41(3), 439-453. doi:10.1111/1468-5906.00129

- Sloand, E., Ho, G., Klimmek, R., Pho, A., & Kub, J. (2012). Nursing children after a disaster: A qualitative study of nurse volunteers and children after the haiti earthquake. *Journal for Specialists in Pediatric Nursing*, 17(3), 242-253. doi:10.1111/j.1744-6155.2012.00338.x
- Smith, D. B. (2010). Volunteer patterns of mid- and later life american couples. *Journal of Sociology & Social Welfare*, *37*(3), 131-154. Retrieved from <a href="http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=53791807&site=ehost-live">http://search.ebscohost.com/login.aspx?direct=true&db=aph&AN=53791807&site=ehost-live</a>
- Steinberg, K. S., Rooney, P. M., & Chin, W. (2002). Measurement of volunteering: A methodological study using indiana as a test case. *Nonprofit and Voluntary Sector Quarterly*, 31(4), 484-501. doi:10.1177/0899764002238097
- Tabachnick, B. G., & and Fidell, L. S. (2012). *Using multivariate statistics* (6th ed.). Upper Saddle River, NJ: Pearson.
- Tang, F., Copeland, V., & Wexler, S. (2012). Racial differences in volunteer engagement by older adults: An empowerment perspective. *Social Work Research*, *36*(2), 89-100. doi:10.1093/swr/svs009
- Taniguchi, H. (2006). Men's and women's volunteering: Gender differences in the effects of employment and family characteristics. *Nonprofit and Voluntary Sector Quarterly*, 35(1), 83-101. doi:10.1177/0899764005282481
- Thoits, P. A., & Hewitt, L. N. (2001). Volunteer work and well-being. *Journal of Health and Social Behavior*, 42(2), 115-131. Retrieved from

http://search.ebscohost.com/login.aspx?direct=true&db=mnh&AN=11467248&site=ehost-live

Tuttas, C. (2009). Volunteering: The heart of travel nursing. *Healthcare Traveler*, 16(9), 14.

Retrieved from

<a href="http://proquest.umi.com/pqdweb?did=1686979501&Fmt=7&clientId=18094&RQT=309&V">http://proquest.umi.com/pqdweb?did=1686979501&Fmt=7&clientId=18094&RQT=309&V</a>

Name=PQD

- U.S. Department of Health and Human Services, Human Resources and Services Administration. (2010). The registered nurse population: Findings from the 2008 national sample survey of registered nurses. ().
- Van Vianen, Annelies E. M., Nijstad, B. A., & Voskuijl, O. F. (2008). A person-environment fit approach to volunteerism: Volunteer personality fit and culture fit as predictors of affective outcomes. *Basic & Applied Social Psychology*, 30(2), 153-166.

  doi:10.1080/01973530802209194
- Van Willigen, M. (2000). Differential benefits of volunteering across the life course. *Journal of Gerontology: SOCIAL SCIENCES*, 55B, March 1, 2011-S308-S318.
- Vantilborgh, T., Bidee, J., Pepermans, R., Willems, J., Huybrechts, G., & Jegers, M. (2013).
  Revisiting the relationship between personality and psychological contracts: A moderated mediation model explaining volunteer performance. *Social Service Review*, 87(1), May 29, 2013-158-186. doi:10.1086/669825

- Vecina, M. L., Chacón, F., Marzana, D., & Marta, E. (2013). Volunteer engagement and organizational commitment in nonprofit organizations: What makes volunteers remain within organizations and feel happy? *Journal of Community Psychology*, 41(3), May 30, 2013-291-302. doi:10.1002/jcop.21530
- Vecina, M. L., Chacón, F., Sueiro, M., & Barrón, A. (2012). Volunteer engagement: Does engagement predict the degree of satisfaction among new volunteers and the commitment of those who have been active longer? *Applied Psychology: An International Review*, 61(1), 130-148. doi:10.1111/j.1464-0597.2011.00460.x
- Waltz, C. F., Strickland, O. L., & Lenz, E. R. (2010). *Measurement in nursing and health research* (Fourth ed.). New York, NY: Springer Publishing Company.
- Waters, R.D., Bortre, D.S. (2012). Improving volunteer retention efforts in public library systems. how communication and inclusion impact female and male volunteers differently.

  \*International Journal of Nonprofit and Voluntary Sector Marketing, 17, May 26, 2013-92-107. doi:10.1002/nysm.438
- Watson, D., & Clark, L. A. (1994). The PANAS-X: Manual for the positive and negative affect schedule expanded form. *Iowa Research Online*, , September 7, 2013. Retrieved from <a href="http://scholar.google.com/scholar\_url?hl=en&q=http://ir.uiowa.edu/cgi/viewcontent.cgi%3F">http://scholar.google.com/scholar\_url?hl=en&q=http://ir.uiowa.edu/cgi/viewcontent.cgi%3F</a> <a href="mailto:article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n">http://scholar.google.com/scholar\_url?hl=en&q=http://ir.uiowa.edu/cgi/viewcontent.cgi%3F</a> <a href="mailto:article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n">http://scholar.google.com/scholar\_url?hl=en&q=http://ir.uiowa.edu/cgi/viewcontent.cgi%3F</a> <a href="mailto:article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n">http://scholar.google.com/scholar\_url?hl=en&q=http://ir.uiowa.edu/cgi/viewcontent.cgi%3F</a> <a href="mailto:article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n">http://scholar.google.com/scholar\_url?hl=en&q=http://ir.uiowa.edu/cgi/viewcontent.cgi%3F</a> <a href="mailto:article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n">http://article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n</a> <a href="mailto:article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n">http://article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n</a> <a href="mailto:article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n">http://article%3D1011%26context%3Dpsychology\_pubs&sa=X&scisig=AAGBfm2vc61BsSo44n</a> <a href="mailto:article%3D1011%26context%3D1011%26conte
- Watson, J. (2008). *Nursing: The philosophy and science of caring* (Revised Edition ed.). Boulder, CO: University Press of Colorado.

- Watson, J. (2009). Assessing and measuring caring in nursing and health sciences (2nd ed.).

  New York, NY: Springer Publishing Company.
- Watson, J. (2012). *Human caring science: A theory of nursing* (2nd ed.). Sudbury, MA: Jones & Bartlett Learning.
- Weil, P., Kimball, P., & Lerner, W. (2010). The volunteer activities of healthcare executives/PRACTITIONER APPLICATION. *Journal of Healthcare Management*, 55(2), 115. Retrieved from <a href="http://proquest.umi.com/pqdweb?did=2011791361&Fmt=7&clientId=18094&RQT=309&V">http://proquest.umi.com/pqdweb?did=2011791361&Fmt=7&clientId=18094&RQT=309&V</a> Name=PQD
- Weinstein, N., & Ryan, R. M. (2010). When helping helps: Autonomous motivation for prosocial behavior and its influence on well-being for the helper and recipient. *Journal of Personality and Social Psychology*, 98(2), 222-244. doi:DOI: 10.1037/a0016984
- Wilkenfeld, B. (2009). A multielvel analysis of context effects on adolescent civic engagement:

  The role of family, peers, school, and neighborhood. (Unpublished Doctor of Philosophy).

  University of Maryland, College Park,
- Wilson, J. (2000). Volunteering. *Annual Review of Sociology*, 26(1), 215. Retrieved from http://search.ebscohost.com/login.aspx?direct=true&db=bth&AN=3780371&site=ehost-live
- Wilson, L. B., Lester, L., & Simson, S. P. (2000). Assessing the involvement of retired health professionals in meeting the needs of underserved populations. *Nursing Outlook*, 48(1), 34-39. doi:DOI: 10.1067/mno.2000.98119

Yonge, O., Rosychuk, R. J., Bailey, T. M., Lake, R., & Marrie, T. J. (2010). Willingness of university nursing students to volunteer during a pandemic. *Public Health Nursing*, 27(2), 174-180. doi:10.1111/j.1525-1446.2010.00839.x

#### **Permissions**

### 1. Spiritual Transcendence Index

Request for permission to use the Spiritual Transcendence Index

Nicolette Fiore-Lopez <nfiore-lopez@lions.molloy.edu> Oct 6

to lseidlitz

Dr. Seidlitz

My name is Nicolette Fiore-Lopez. I am a student in the PhD program at Molloy College in Rockville Center, New York, USA. Having recently achieved Doctoral Candidacy, I am beginning work on my dissertation proposal.

I would like to request your permission to use the scale that you developed "The Spiritual Transcendence Index " as a tool for my proposal and future dissertation research. Please let me know if you require further information in association with this request.

I look forward to hearing from you.

Thank you for your time and consideration.

Nicolette Fiore-Lopez, PhD(c), RN, CNEP Molloy College Reply Forward



Larry Seidlitz <lseidlitz@gmail.com> Oct 7

to me

Dear Nicolette,

It is fine, you may use, as long as you provide citation in any publications related to your work using the scale.

#### 2. Altruism

The Self-Report Altruism Scale



Nicolette Fiore-Lopez <br/> <br/> siore-lopez@lions.molloy.edu>  $^{\mbox{Sep }29}$ 

to rchrisjo, fekkenc

Drs. Chrisjohn and Feeken

My name is Nicolette Fiore-Lopez. I am a student in the PhD program at Molloy College in Rockville Center, New York, USA. Having recently achieved Doctoral Candidacy, I am beginning work on my dissertation proposal.

I would like to request your permission to use the scale that you developed "The Self-Report Altruism Scale " as a tool for my proposal and future dissertation research.

Please let me know if you require further information in association with this request.

I look forward to hearing from you.

Thank you for your time and consideration.

Nicolette Fiore-Lopez, PhD(c), RN, CNEP

Molloy College

Reply Reply to all Forward

Chrisjohn Please go right ahead. R. Chrisjohn, Ph. D. Sep 29

Please go right ahead. R. Chrisjohn, Ph. D.

Roland Sep 29

Chrisjohn

Loading...



Roland Chrisjohn <rchrisjo@stu.ca> Sep 29

to me

Please go right ahead.

R. Chrisjohn, Ph. D.

On Sun, 29 Sep 2013 16:30:32 -0400

Nicolette Fiore-Lopez <nfiore-lopez@lions.molloy.edu> wrote:

Drs. Chrisjohn and Feeken

My name is Nicolette Fiore-Lopez. I am a student in the PhD program at Molloy College in Rockville Center, New York, USA. Having recently achieved Doctoral Candidacy, I am beginning work on my dissertation proposal.

I would like to request your permission to use the scale that you developed "The Self-Report Altruism Scale" as a tool for my proposal and future dissertation research.

Please let me know if you require further information in association with this request.

I look forward to hearing from you.

Thank you for your time and consideration.

Nicolette Fiore-Lopez, PhD(c), RN, CNEP

Molloy College

From: Roland Chrisjohn<rchrisjo@stu.ca>

Date: Sun, Sep 29, 2013 at 5:14 PM

Subject: Re: The Self-Report Altruism Scale

To: Nicolette Fiore-Lopez <nfiore-lopez@lions.molloy.edu>

Please go right ahead.

R. Chrisjohn, Ph. D.

Reply Forward

G. Cynthia Fekken <fekkenc@queensu.ca> Sep 29

to me, rchrisjo

Dear Ms Fiore Lopez

Thank you for your inquiry.

The scale is published in the public domain. You are most welcome to use it in your research.

You will note that one of the items refers to "helping someone push a car out of the snow". I wonder if that item is relevant to the country/context in which you propose to do the research. Some researchers have instead used "I have helped a stranger who experienced car trouble such as changing a tire or pushing a car."

Best wishes for success in your research.

G. Cynthia Fekken, PhD.

Professor of Psychology

Associate Vice Principal (Research)

Queen's University

Kingston, Ontario, Canada

K7L 3N6

•	-	• 1	
٦.	Prose	าดเล	Iness

Requesting permission to use the Prosocialness Scale for Adults

Sep 29

Nicolette Fiore-Lopez<nfiore-lopez@lions.molloy.edu>

to Gianvittorio.C.

Dr. Caprara

My name is Nicolette Fiore-Lopez. I am a student in the PhD program at Molloy College in Rockville Center, New York, USA. Having recently achieved Doctoral Candidacy, I am beginning work on my dissertation proposal.

I would like to request your permission to use the scale that you developed "The Prosocialness Scale for Adults" as a tool for my proposal and future dissertation research.

Please let me know if you require further information in association with this request.

I look forward to hearing from you.

Thank you for your time and consideration.

Nicolette Fiore-Lopez, PhD(c), RN, CNEP Molloy College

Reply Forward

Sep 30

Gianvittorio Caprara<gianvittorio.caprara@uniroma1.it>

to me

I am glad to accord my permission to use our scale,. For any other question please contact <a href="maria.gerbino@uniroma1.it">maria.gerbino@uniroma1.it</a>

Sincerely, GVCaprara

#### A. Institutional Review Board



1000 Hempstead Avenue Rockville Centre, NY 11571 www.molloy.edu

**Tel.** 516.678.5000 Ext 6871 **Tel.** 516.678.5000 Ext 6288

Date: January 7, 2014

To: Nicolette Fiore-Lopez

From: Kathleen Maurer Smith, PhD

Co-Chair, Molloy College Institutional Review Board

Veronica D. Feeg, PhD, RN, FAAN

Co-Chair, Molloy College Institutional Review Board

SUBJECT: MOLLOY IRB REVIEW AND DETERMINATION OF EXEMPT STATUS

Study Title: The Relationship Between New Nurses Who Volunteer and the Caring Behavior

New Nurses Exhibit in the Practice Setting, One Year Past Graduation

Approved: January 7, 2014

Dear Nikki:

The Institutional Review Board (IRB) of Molloy College has reviewed the above-mentioned research proposal and determined that this proposal is approved by the committee. It is EXEMPT from the requirements of Department of Health and Human Services (DHHS) regulations for the protection of human subjects as defined in 45CFR46.101(b).

You may proceed with your research. Please submit a report to the committee at the conclusion of your project.

<u>Changes to the Research:</u>It is the responsibility of the Principal Investigator to inform the Molloy College IRB of any changes to this research. A change in the research may disqualify the project from exempt status.

Sincerely,

Kathleen Maurer Smith, PhD

Kathleen Maurer Smith

Veronica D. Feeg, PhD, RN, FAAN

Veronica D. Feef

#### **B.** Consent

Consent Text—part of email introduction

#### Dear NSNA alumnae

You are being asked to participate in this research study because you indicated that you would be interested in completing a follow-up survey when you submitted a permanent email address with your completion of the 2012 NSNA New Graduate survey. Thank you.

The purpose of this research study is to describe the characteristics of new nurses who volunteer and the influence of volunteering on the caring behavior that theses nurses report in the practice setting, over one year post graduation.

The risks and benefits of this study are minimal and assess some questions and self-examination of your beliefs and practices in everyday life and at work.

You are asked to complete a questionnaire that requires approximately 15 -25 minutes. There will not be any compensation for your participation. Your participation is voluntary and you are free to withdraw from the study at any time without penalty. Your confidentiality will be assured through the use of a secure website. Your responses will be coded and only the researcher will have the password to access the file. Demographic data collected will be standard and generic so as not to be linked to you personally.

The results of this study will be used in partial fulfillment of the requirements for the researcher's Doctor of Philosophy in nursing degree. Data may be used in aggregate form and presented at professional conferences, published in professional journals or articles, or used in future educational purposes.

If you have any questions or concerns at any time before, during or after this survey completion, you are invited to contact the researcher, Nicolette Fiore-Lopez. PhD(c), RN, CNEP, either by email: nfiore-lopez@lions.molloy.edu or cell phone: (631) 561- 5292.

# C. Demographic Questionnaire

Demographic Questionnaire
What is your gender?MaleFemale
What is your age (in years)?
Birth order
First born
Second born
Third born and greater
What is your race?
White, Non-Hispanic
Black or African American, Non-Hispanic
Hispanic
American Indian or Alaska Native
Asian
Native Hawaiian or Other Pacific Islander
What was your basic nursing education?
Diploma

Associate degree
Bachelor's degree or higher
Are you presently enrolled in school?
Yes
No
If yes,RN to BSNRN to MSNMaster's in Nursingother
If yes, Full time Part time
Household composition
1. What is your marital status?
Married or domestic partnership
Widowed
Divorced
Separated
Single, Never married
2. Do you have children?
Yes
No
Employment Status
Full time in nursing
Part time in nursing

Per diem in nursing
Work, not in nursing
Does not work outside the home
Religious affiliation (check all that apply)
Buddhist
Jewish
Muslim
Protestant
Roman Catholic
Non-affiliated
Other(Specify)
Do you consider yourself to be actively practicing your religion?
Yes
No
Were you part of a National Student Nurses' Association (NSNA) total school program?
Yes
No
Don't know
If you wish to be eligible for a one of ten, ten dollar gift cards that will be offered, please submit
your email address here:

# **D.** Spiritual Transcendence Index

Please respond to each of the items below by checking the one number that most closely describes the extent to which you agree or disagree with the statement.

1=strongly disagree

2=disagree

3=slightly disagree

4=slightly agree

5=agree

6=strongly agree

	1	2	3	4	5	6
1. My spirituality gives me a feeling of						
fulfillment.						
2. I maintain an inner awareness of God's						
presence in my life.						
3. Even when I experience problems, I can find						
a spiritual peace within.						
4. I try to strengthen my relationship with God.						
5. Maintaining my spirituality is a priority for						
me.						
6. God helps me to rise above my immediate						
circumstances.						
7. My spirituality helps me to understand my						
life's purpose.						
8. I experience a deep communion with God.						

# E. Self-Report Altruism Scale

5= very often

1= never 2= once

3= more than once

	Π	1	2	3	4	5
I have helped push a stranger's car out of the snow						
2. I have given directions to a stranger.						
3. I have made change for a stranger.						
4. I have given money to a charity.	1					
5. I have given money to a stranger who						
needed it (or asked me for it).						
6. I have donated goods or clothes to a charity.	1					
7. I have done volunteer work for a charity.	1					
8. I have donated blood.						
9. I have helped carry a stranger's belongings						
(books, parcels, etc.).						
10. I have delayed an elevator and held the door	1					
open for a stranger.						
11. I have allowed someone to go ahead of me						
in a lineup (at Xerox machine, in the						
supermarket).						
12. I have given a stranger a lift in my car.						
13. I have pointed out a clerk's error (in a bank,						
at the supermarket) in undercharging me for						
an item.						
14. I have let a neighbor whom I didn't know						
too well borrow an item of some value to						
me (e.g., a dish, tools, etc.).						
15. I have bought 'charity' Christmas cards						
deliberately because I knew it was a good						
cause.						
16. I have helped a classmate who I did not						
know that well with a homework						
assignment when my knowledge was						
greater than his or hers.	<u> </u>					
17. I have before being asked, voluntarily						
looked after a neighbor's pets or children						
without being paid for it	igspace					
18. I have offered to help a handicapped or						
elderly stranger across a street.	$\perp$					
19. I have offered my seat on a bus or train to a						

stranger who was standing.			
20. I have helped an acquaintance to move			
households.			

### F. Prosocialness Scale for Adults

For each item below, please indicate whether the statement is

1= never/almost never true

2= occasionally true

3= sometimes true

4= often true

5= almost always/ always true

		T	1	
1	2	3	4	5

# G. Questionnaire on Volunteering

Have you ever volunteered and participated in unpaid activity where you provided healthcare for underserved or underprivileged clients?
YesNo
If yes, was it (check all that apply)
A. School-related/required for course credit
B. School-related/voluntary
C. Not school-related/voluntary
D. Local
E. National
F. International
Please describe
Do you volunteer now?
YesNo
If yes, is it:
a. School-related/required for course credit
b. School-related/voluntary
c. Not school-related/voluntary
d. Local
e. National
f. International
Please
describe

If you participate in unpaid activity where you provided healthcare for underserved or underprivileged clients, please check the frequency that most closely resembles your activity:

- a. Once per week to once per month
- b. Two to five times per year
- c. Annually

### H. Nyberg Caring Assessment Scale

Are these caring attributes things you actually use in your day-to-day practice?

- 1. Cannot use in practice
- 2. Occasionally use in practice
- 3. Sometimes use in practice
- 4. Often use in practice
- 5. Always use in practice

Do you:					
	1	2	3	4	5
1. Have a deep respect for the needs of others?					
2. Not give up hope for others					
3. Remain sensitive to the needs of others					
4. Communicate a helping, trusting attitude					
towards others					
5. Express positive and negative feelings					
6. Solve problems creatively					
7. Understand that spiritual forces contribute					
to human care					
8. Consider relationships before rules					
9. Base decisions on what is best for the					
people involved					
10. Understand thoroughly what situations					
mean to people					
11. Go beyond the superficial to know people					
well					
12. Implement skills and techniques well					
13. Choose tactics that will accomplish goals					
14. Give full consideration to situational factors					
15. Focus on helping others grow					
16. Take time for personal needs and growth					
17. Allow time for caring opportunities					
18. Remain committed to a continuing					
relationship					
19. Listen carefully and be open to feedback					
20. Believe that others have a potential that can					
be achieved					

# I. Satisfaction with Career Choice Questionnaire

### Satisfaction with Career Choice

1.	All in all, how satisfied would you say you are with your career choice?
	Very dissatisfied
	Dissatisfied
	Somewhat dissatisfied
	Neither dissatisfied or satisfied
	Somewhat satisfied
	Satisfied
	Very satisfied
2.	If you were free to go into any type of career you wanted, what would your choice be?
	I would want the same career I have now
	I would prefer some other career
3.	Knowing what you know now, if you had to decide all over again whether to choose your
	present career, what would you decide?
	I would definitely not choose my present career
	I would not choose my present career
	I would choose my present career
	I would definitely choose my present career

### J. Data

Seventy-four respondents chose to end the survey after the completion of only one of the embedded tools, the Self-Report Altruistic Scale (SRA) and also did not complete the demographic questionnaire embedded later in the survey. When a test for reliability of the scale was performed with and without this group of seventy four, no difference was observed. Cronbach's alpha for the SRA at the initial sample size of 1,097 was 0.883. Cronbach's alpha for the SRA without the seventy four respondents was 0.886. When tests for Central Tendency and Dispersion were performed for each group, there was no significant difference in the two groups. Therefore, a decision was made to eliminate the seventy-four respondents that ended the survey after completion of the first embedded tool. This yielded a usable sample of 1,023.