Developing emotional intelligence in student nurse leaders: a mixed methodology study

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A B S T R A C T

Objective: The purpose of this mixed method, exploratory study was to measure the impact of a peer coaching program on the measured emotional intelligence (EI) of a group of student nurse leaders. **Methods** Participation in the study was offered to nurses in the Student Ambassador program. Students who consented received instruction on EI and its importance in leadership. Participants then took a preintervention EI test (The Mayer-Salovey-Caruso EI Test, version 2 [MSCEIT]) to obtain a baseline EI ability score. Students then participated in a series of peer coaching sessions across a semester. Participants then completed a postintervention MSCEIT test, and also a qualitative survey. **Results:** The analysis of the paired sample t-test showed that there was not a statistically significant difference in the total group EI scores from pre to posttest, t (8) = 0.036 >0.05; however, 80% of participants reported perceived changes in EI ability due to the intervention and 90% reported that peer coaching was beneficial to their leadership development. **Conclusions:** This study contributes to the body of EI literature and research on nursing education and leadership development.

Key words: Emotional intelligence, nursing education, peer coaching, Mayer Salovey Caruso Emotional Intelligence Test, nursing students, emotional intelligence development

Introduction

There are nearly 3 million registered nurses licensed and working in the United States. The majority, 62.2%, work in hospitals.[1] In 2008, 45% of the current nursing workforce was age 50 or above.[2] With predicted workforce shortages, coupled with rapid changes, such as health care reform and greater technological advances, the profession of nursing will quickly undergo a period of transformation and rejuvenation.

A large number of the nursing workforce is approaching retirement age, and a shortage of nurses is anticipated in the coming decade. Anticipated in this shortage are nurse leaders of organizations. For this reason, it is imperative that new graduate nurses not only develop leadership skills but also demonstrate a readiness to assume these leadership roles earlier in their careers than would be expected of other professions. This will be vital for the nursing workforce, which is expected to grow 19% by 2022.[3] Nursing schools, practicing nurses, and educators need to find ways to prepare novice nurses for these leadership roles as students transition from the academic world to a rapidly changing and demanding professional world.

Significance of emotional intelligence

Several emotional intelligence (EI) research studies across many professional disciplines, including nursing, have demonstrated evidence of a positive correlation between measured EI and effective leadership outcomes.[4-6] Within the discipline of nursing, there are research findings that provide evidence for the importance of EI as an attribute

for nurse leaders.[7-9] In one Meta-Analysis performed, 69 EI performance research studies showed a positive correlation between EI and measures of performance.[10] These outcomes include leader effectiveness, retention, positive fiscal outcomes, customer satisfaction, and organizational resiliency in periods of change.

These outcomes are increasingly important in nursing as the entire health care industry is entering into a period of profound change. There is also evidence that adds that EI has a positive relationship with leadership development in small groups.[11] In addition, there is evidence that peer coaching strategies may be successful in developing EI in both nurse leaders and leaders in other professions.[12,13]

Developing emotional intelligence ability

Emotional intelligence ability has a significant place in nursing, where compassion and caring are two foundations of the profession. In order to provide compassionate care nurses must be able to identify, use, manage, and understand emotions not only in themselves but also in the context with others. EI ability is not something that can be taught in a lecture class, it has to be developed through an active listening, engagement, and participation.[13]

Research provides a handful of methods to develop EI abilities. Most of the research combines EI and leadership development together; other studies also involve the use of coaching. One of the first studies investigating the development of EI found that with education and training in small groups, EI scores improved, when compared to a group that received no training or education.[14] The study also found that increased EI scores remained increased 6 months after the intervention.[14] There is also some recent evidence that supports the use of peer coaching to develop EI. This study demonstrated that by using peer coaching the participants' perception and awareness of their EI abilities improved.[13]

Peer coaching

Peer coaching is a dialog between two colleagues that establishes a rapport and a mutual relationship between the two participating parties. It is a process that empowers participants and actively engages them in providing feedback and helps them decide how to incorporate their knowledge into actual abilities.[15] Certain essential components must be present for peer coaching to be beneficial. These components include trust, active listening, nonevaluative feedback, and self-reflection.[13,15]

Peer coaching has been successfully used in the discipline of education, where it has been used for over 20 years.[15] It can be used as a tool to for the development skill sets and abilities in students and new employees in certain professions.[16] Already established in the discipline of education, peer coaching is used to enrich and develop new teachers' skillsets.[16] Other professional disciplines such as nursing and organizational management have begun to incorporate peer coaching to develop new employees and leaders.

Theoretical framework

Ability model of emotional intelligence

For use in this study, the Ability Model of EI was chosen for the following five reasons:
1. The instrumentation of this model does not overlap with other personality instruments, unlike the personality and mixed models.[17]
2. The high reliability and validity of the Mayer Salovey Caruso EI Test (MSCEIT).[18] The MSCEIT measures EI ability based on the performance of emotional tasks and scores them among 8 branch scores [Figure 1].[19]
3. EI ability has been shown to have a positive correlation with leadership emergence in small groups.[11]
4. The nature of the relationship of positive correlations between measured EI ability and leadership effectiveness outcomes.[4-6]
5. The close relationship of EI ability and the development of leadership ability.

Transformational leadership

Transformational leadership theory can be operationally defined as the ability to transform an organization through people using innovation while producing desired outcomes.[20] It involves the incorporation of change that involves both leaders and followers. This framework was selected for use in this study due to its articulation of organizational transformation as dependent on a special set of leadership abilities.[21]

This framework was chosen for the following four reasons:
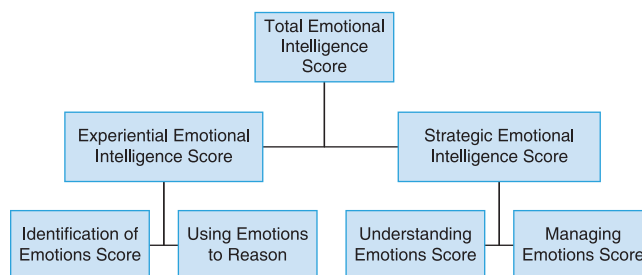1. Leadership practices have great influence in any

Figure 1: Mayer Salovey Caruso Emotional Intelligence test scores and sub-scores. [19]

workplace, especially in nursing. Research in nursing has shown that leadership styles can either enhance or hinder workplace environments, ultimately having an effect on employees.[22] The leadership in the workplace has a direct effect on employee satisfaction, productivity, and outcomes.

2. Transformational leadership has been shown to relate to positive organizational outcomes such as employee satisfaction and improved positive patient outcomes.[22] Effective nurse leaders are empathetic to fellow staff members which enhance workplace dynamics and fosters a productive workplace atmosphere.[9] These attributes coincide with qualities of those with high EI ability such as empathy, motivation, self-awareness, trust, and emotional stability.[23] The leader must be aware of their own self, needs, and goals in order to effectively lead their team or group.

3. Characteristics of transformational leaders include idealized consideration, intellectual stimulation, inspirational motivation, and idealized influence.[22] Charisma is often also included in the qualities of a leader with a transformational leadership style. These qualities often provide a supportive work environment, especially in nursing.

4. Coaching also shares many characteristics that are exhibited in transformational leadership behavior.[22]

Transformational leaders work with their employees, fostering trust and open, honest relationships between the leader and employee, as well as among coworkers. These relationships enable employee/manager teams to have open dialogs in order to effectively share new ideas, provide feedback, and promote change through innovation.[22]

Literature review

A broad literature review was completed using the University's online library databases to find peer-reviewed scholarly research on EI and nursing. These databases included EBSCO host, CINAHL, Medline, Psychology and Behavioral Sciences Collection, MASTERfile Premier, Health Source: Nursing/Academic Version, and Academic Search Premier. Peer coaching and leadership development were also investigated.

The majority of the EI research exists in the fields of psychology and business. Out of this body of research, a very limited number were scholarly research articles that involved EI and nursing students. The majority of the articles on EI in nursing students did not measure the ability of the individual, only traits or personality tendencies the authors related to EI.

Only two articles surrounding the development of EI and nurses were found. Neither article involved nursing students. The most valuable article explored the development of EI ability in oncology nurses which utilized the MSCEIT to measure EI abilities.[24] This article also utilized peer coaching as a means for developing EI in the sample. There are no articles related to measured EI ability in nursing students.

Three articles were returned that explored the relationship of peer coaching and nursing. None of them included EI or leadership development. All three articles reported common themes of peer coaching as: Participant accountability, increased self-awareness, and reciprocity.

Most of the research that examined EI and leadership development pertained to organizational management. In one study, the focus was on increasing EI of employees within the context of transformational leadership theory. This study provided strong evidence for the relationship between EI and transformational leadership. Study data showed development of EI ability in the employees that enabled more effective leadership.[25]

After reviewing the current literature surrounding EI and nursing student leaders, it was clear that there is a lack of research providing information on how EI can be developed in the nursing student population. There was a vast amount of literature that supports the relationship with EI and leadership across different disciplines; however, there were no studies that suggested how to develop EI in the student population. Based on the literature review performed, it was clear that this study could make a significant contribution to the body of EI literature.

Objective

The purpose of this mixed method, exploratory study was to describe the impact of a program of peer coaching on the measured EI of a group of nursing student leaders. It was hoped that the findings of this study would make a contribution to the growing body of nurse EI literature by providing data about measured EI in student nurses, and the impact of an intervention designed to develop EI in the student nurse population.

Research questions

The research questions in this study focused on EI ability scores before and after an intervention of peer coaching. Another focus was to explore the impact of the intervention on participant's perceptions of changes in their EI ability. These questions aimed to explore the

possible impact of EI education and peer coaching on EI ability scores.

Research questions were:
1. Does a program of peer coaching have an impact on the measured EI ability scores in a group of student nurse leaders?
2. Does measured EI ability change after a period of peer coaching activity?
3. Do student participants report changes in their perceived EI ability across a period of peer coaching activity?
4. How do student participants rate peer coaching as a means for developing leadership ability?

Materials and Methods

Study design

This mixed method exploratory study was undertaken to explore the effect of an intervention of peer coaching on the measured EI ability scores of a group of student nurse leaders. The evaluation of EI ability scores was analyzed by the comparison of preintervention MSCEIT scores to postintervention MSCEIT scores. An analysis of themes was performed with the use of a survey of the participants' perceptions of the value of the study intervention.

Protection of human subjects

This study obtained the University's Institutional Review Board's approval in order to ensure that all human participants were protected.

Setting

The study took place at a large, ethnically diverse, public university located on the island of Oahu. The University's School of Nursing was a dynamic, technologically advanced, supportive learning environment where students from several cultures, ethnicities, and backgrounds come to learn.

Sample

Participants consisted of both undergraduate 4th and 5th semester nursing students pursuing a Bachelor's of Science in Nursing degree and Master's Entry Program in Nursing students. Both student groups were Student Ambassadors for the University. This Student Ambassador program was a unique experience that integrated education on EI, peer coaching, community involvement, and professional growth into a program of leadership development.

Both male and female students were involved, and a small variety of ethnic groups were represented. All participants have graduated high school and have completed some college. There were 13 student ambassadors who participated in the study. Among the study participants, age ranged from 21 to 43 years, with the majority being 20-29 years of age. There were 12 female and 1 male participants. The only ethnicities identified were Caucasian and Asian, however, 6 participants declined to identify ethnicity or their ethnicity was not a choice listed on the MSCEIT, version 2.

Procedures

At the first Student Ambassador meeting of the semester, the participant group was given a presentation on EI by an EI expert. Potential participants were then given a presentation on the proposed research study with an invitation to participate. Consenting participants then completed an online preintervention MSCEIT, version 2, test. At the next meeting, a presentation on peer coaching was given. This study's investigator then demonstrated and facilitated a peer coaching session between pairs of participants. Participants were then instructed to perform the intervention weekly, with their partner, over the course of the 15-week semester. At the last meeting of the semester, students were instructed to complete an online postintervention MSCEIT, version 2, test. Participants were then also given a short survey [Appendix A] to complete.

Results

Emotional intelligence scores

The MSCEIT, version 2., test reports EI scores in the form of seven scores [Figure 1]. The total EI score is based on four Branch scores and two composite Area scores two composite Area scores. Each Area score is a composite of two Branch scores. The Experiential EI Area score is based on two Branch scores, Identification of Emotions, and Use of Emotions to Reason. The Strategic EI Area score is based on the other two Branch scores, Understanding Emotions, and Managing Emotions [Figure 1].[19] For the MSCEIT, version 2, test, scores ranging from 90 to 110 are considered "average." Scores falling below 89 are considered "below average," while scores above 111 are considered "above average."

Quantitative data

All 13 participants in the Student Ambassador program agreed to participate in the study. Of the 13 participants, four did not complete the postintervention test. Because they did not complete the posttest, their scores were not included in the analysis. The remaining 9 ($n = 9$) scores

Appendix A

Emotional Intelligence and Nursing Student Leadership Survey Instrument

1.   How many times total did you meet with your peer coach? _____

2.   Did you meet weekly? _____

3.   In what manner did you and your peer coach meet?
    a.   face to face
    b.   virtual space (online via second life, face time, or skype)
    c.   phone call
    d.   text message
    e.   E-mail

4.   What were the biggest obstacles for your peer coaching sessions?
    a.   different schedules
    b.   lack of availability
    c.   lack of interest

5.   Did you set an Emotional Intelligence goal?
    a.   If yes, please list your goal_____
    b.   No

6.   On a scale of 1-5, one being the least, and five being the most beneficial, please rate how beneficial you feel peer coaching was to you. _____

| Least				Most
1	2	3	4	5

7.   Did you value your peer coaching sessions? On a scale of 1-5, 1 being the least valuable, and 5 being the most valuable, please rate the value you gained from your peer coaching sessions.

Least				Most
1	2	3	4	5
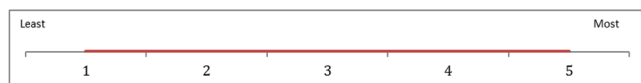
8.   On a scale of 1-5, 1 being the least and 5 being the most, do you feel you were able to meet your Emotional Intelligence goal with your peer coaching sessions?

Least				Most
1	2	3	4	5

9.   Do you feel your abilities of Emotional Intelligence has increased due to your peer coaching sessions? On a scale of 1-5, 1 being the least and 5 being the most, please rate your level of increased emotional intelligence ability.

Least				Most
1	2	3	4	5
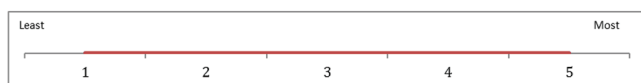
were utilized. The MSCEIT pre and postintervention scores were analyzed using paired samples *t*-test with Statistical Package for Social Sciences (SPSS version 20).

Research question 1

Does a program of peer coaching have an impact on the measured EI ability scores in a group of student nurse leaders?

Total emotional intelligence score

The first comparison of the paired samples *t*-test analyzed the pretest total EI MSCEIT score with the posttest total EI MSCEIT score. The analysis of the pre and posttotal EI scores indicated that there was not a statistically significant difference between pre and posttest scores [Table 1].

Area scores

Experiential emotional intelligence and strategic emotional intelligence

The pre and posttest MSCEIT Area score, Experiential EI, was analyzed. The analysis indicated that there was not a statistically significant difference between pre and posttest scores [Table 1]. Strategic EI was also analyzed. The data analysis indicated that there was no statistically significant difference between pre and posttest scores [Table 1].

Branch emotional intelligence scores

The four Branch Scores were analyzed as follows:
1. Identification of Emotions.
2. Using Emotions to Reason.
3. Understanding Emotions.

4. Managing Emotions. All of the Branch Score data indicated that there was not a statistically significant difference between pre and posttest scores [Table 1].

Research question 2

Does measured EI ability change after a period of peer coaching activity?

Study findings were also explored using descriptive statistics. Questions posed were: How many EI scores were in below average range, average range, and above average range? Did any EI scores change from the average range to above average range? Did any change from the average to below average? How many moved from below average to average between the pre and posttest? What were the highest and lowest branch scores for the pre and posttest groups? What were the highest and lowest Area scores for the pre and posttest groups?

In the pretest analysis, 22% of the 9 participants scored within the above average range, 67% of the participants scored in the average range, and 11% of the participants scored within the below average range [Figure 2]. In the posttest analysis, 33% of the participants scored within the above average range, 34% in the average range and 33% in the below average range [Figure 2]. Data showed that the individual total EI scores did change.

Descriptive statistics showed that individual total EI test scores did change from the preintervention testing when compared to postintervention testing [Figure 3]. Some participants' total EI scores increased and some decreased. The range for the pretest total MSCEIT EI ability scores was 71-113, a range of 32 points. The range for the posttest total MSCEIT EI ability scores was 78-123, a range of 45 points.

There were also individual differences in the comparison of pre and posttest scores of the MSCEIT, version 2. The majority (67%) of the group's total EI test score increased from the preintervention test to the postintervention test, while 11% of the group's total EI scores did not change at all, and 22% of the group experienced a decrease in their total EI scores. The measured EI ability scores of a group of nursing student leaders did change after a period of peer coaching activity.

Areas of highest and lowest participant scores were also analyzed on both the pre and posttests. In the pretest Branch scores, 45% of respondents scored highest in Use of Emotions to Reason [Figure 4]. In the posttest Branch scores, 45% of respondents scored highest in Managing Emotions [Figure 4]. In the pretest Branch scores, 45%, scored lowest in Understanding Emotions [Figure 5]. For the posttest Branch scores, 45%, scored lowest in Understanding Emotions [Figure 5]. The highs and lows of the Branch scores did change after the completion of the intervention.

For Area scores, pre and posttest scores were consistent. In both the pre and posttest Area scores, 56% of the sample had their highest score in Strategic EI and their lowest score in Experiential EI. These results indicate there was not a significant change in Area scores.

| Table 1: Quantitative data (*n*=9)			
MSCEIT Categories	**Pretest means**	**Posttest means**	**t-test results**
Total EI score	100.67	100.56	$t(8)=0.36, P>0.05$
Area scores			
Experiential EI	99.00	99.22	$t(8)=0.059, P>0.05$
Strategic EI	100.67	100.67	$t(8)=0.000, P>0.05$
Branch scores			
Identification of emotions	97.89	97.44	$t(8)=0.103, P>0.05$
Using emotions to reason	102.22	101.22	$t(8)=0.166, P>0.05$
Understanding emotions	98.89	98.00	$t(8)=0.262, P>0.05$
Managing emotions	101.33	101.44	$t(8)=0.056, P>0.05$
EI: Emotional intelligence			
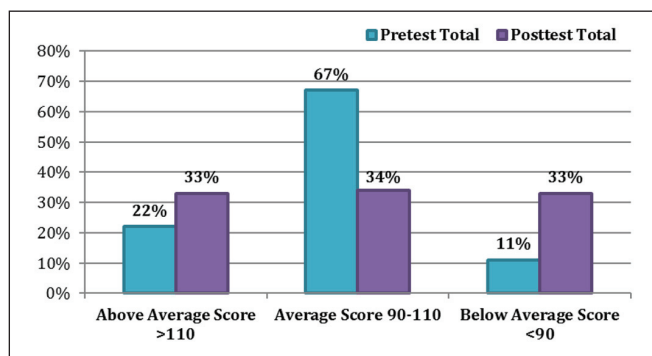
Figure 2: Pre and posttest mayer salovey caruso emotional intelligence test total emotional intelligence scores
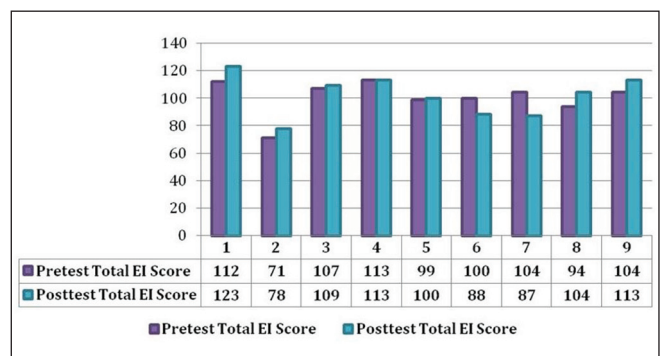

Figure 3: Individual pre and post mayer salovey caruso emotional intelligence test total emotional intelligence scores

Survey data

Qualitative data were collected by the use of a survey scoring the perception and value of the intervention [Appendix A]. Of the 13 participants in this study, only 10 (n = 10) participated in the Qualitative survey. Predominant themes were analyzed for meaning.

Survey question 1

How many times total did you meet with your peer coach? One theme that emerged was that all participants reported meeting at least once throughout the study. The majority of participants, 40%, answered that they met <5 times over the study time frame. 3 (30%) of the participants said they met >5 times over the semester, and 3 (30%) of the participants said they met only 5 times over the semester.

Survey question 2

Did you meet weekly? The majority, 70%, of respondents answered no while 30% answered yes. The theme present was that participants did not perform the intervention on a weekly basis.

Survey question 3

In what manner did you and your peer coach meet? The predominant theme in the respondent answers was that they met face to face. 80 (80%) of participants listed meeting face to face, whereas 20% met via telephone. It was clear that sample participants followed instructions in order to perform the intervention correctly as instructed.

Survey question 4

What were the biggest obstacles for your peer coaching sessions? Scheduling difficulties was the predominant theme; 80% of respondents chose this answer for this question. One participant, 10%, stated the biggest obstacle was the lack of availability, and the other participant, 10%, stated that a lack of interest was the biggest obstacle.
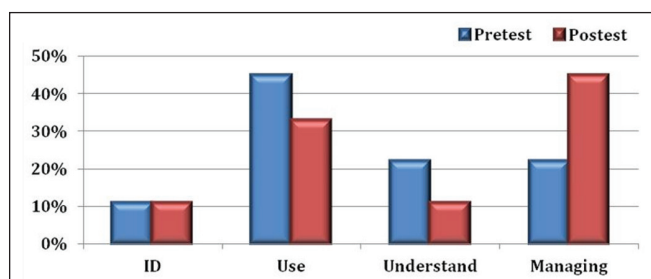
Survey question 5

Did you set an EI goal? Half of the respondents stated that they did not set an EI ability goal. The other half of respondents identified clear goals that they wanted to improve upon. Goals listed were: Decrease stress, increase EI score, more efficient time management, improve EI skills/abilities, and improve and develop EI.

The remaining four questions of the survey asked participants about their individual perceptions of peer coaching as an intervention. Each question asked participants to rank their perception of the category based on a simple scale with the 1 being least, 2 being somewhat, 3 being mild, 4 being moderate, and 5 being most [Appendix A]. Questions that were asked pertained to the perceived benefit of peer coaching, value of peer coaching, participant ability to meet EI goals, and participant perception of the increase in EI ability.

Research question 3

Do student participants report changes in their perceived EI ability across a period of peer coaching activity?

Research question 4

How do student participants rate peer coaching as a means for developing leadership ability?

Value of peer coaching: The majority, 50% of participants also stated that their peer coaching sessions had a moderate value to them [Table 2]. The data showed that the majority of the participants felt that peer coaching were at least mildly beneficial to them as a means for increasing their EI abilities.

Meeting emotional intelligence goals

The majority, 60% of participants identified that they were somewhat able to meet their EI goal with the use of their peer coaching sessions [Table 2]. The clear theme is that most participants felt they were at least mildly able to meet their EI goal with the intervention.
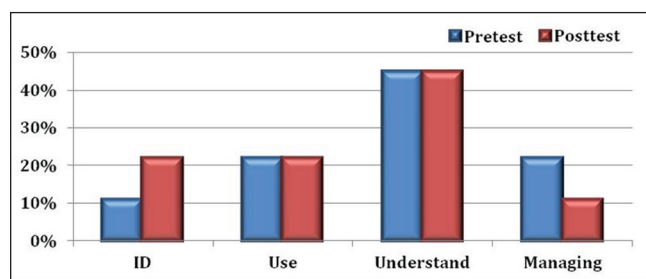

Figure 4: Comparison pre and posttest highest branch scores

Figure 5: Comparison pre and posttest lowest branch scores

Perceived change in emotional intelligence ability

For the last question, half of the participants stated they felt they had a mild increase in their EI abilities due to the peer coaching intervention [Table 2]. The majority of participants felt at least mildly better about their EI abilities after they had completed the study intervention.

In summary, 80% of students reported changes in their perceived EI abilities after the completion of the peer coaching intervention. In addition, 90% of participants also reported that the study intervention was beneficial to their leadership development with the focus of developing EI.

Discussion

The purpose of this study was to explore if a peer coaching intervention had an effect on the measured EI ability on a group of student nurse leaders. Descriptive and inferential statistics were used; qualitative data were analyzed for themes. During the comparison analysis of pre and postintervention tests, several interesting findings were discovered. Several interesting findings outside of the specific research questions were noted.

Emotional intelligence scores

One interesting finding of this study was that the total EI scores did change after analyzing the individual pre and postintervention test scores. Originally, due to the short duration of the study intervention, a change in scores was not expected. It was interesting to note that the scores did change.

Emotional intelligence area scores

Experiential emotional intelligence

It was also noted that the majority of the group's Experiential Area score increased. 5 (56%) of the participants exhibited an increase in this area score, whereas 4 (44%) of the participants exhibited a decrease in this area score [Figure 6]. This increase in area score means that participants' exhibited an increase in their ability to identify emotions correctly and also their use of emotions to reason.

Strategic emotional intelligence

The analysis of individual area scores also noted increases in the majority of the participants. 4 (44%) participants' Strategic area score increased while 1 (11%) participant's score remained the same, and 4 (44%) participants' scores decreased [Figure 7]. The analysis of these data means that half of the participants exhibited increased ability in managing emotions and understanding emotions.

Emotional intelligence branch scores

The analysis of the Branch scores demonstrated areas of greatest strengths for the participant group. It also provided areas of needed improvement for future studies.

The area of greatest strength for the participant group was "Managing Emotions" [Figure 8]. Six of the participants (67%) exhibited an increase in the "Managing Emotions" Branch score. This finding was significant because the ability to manage emotions in oneself and in others is essentially crucial in nursing since it is a profession surrounded by highly charged emotional situations. In addition, it can be inferred that the study intervention increased the participants' ability to manage their own emotions.

The lowest Branch score in need of the most improvement was "Use of Emotions to Reason" [Figure 9]. The analysis of this Branch score suggested that the majority of study participants did not have an increase in their ability to use emotions to reason. 4 (44%) participants exhibited
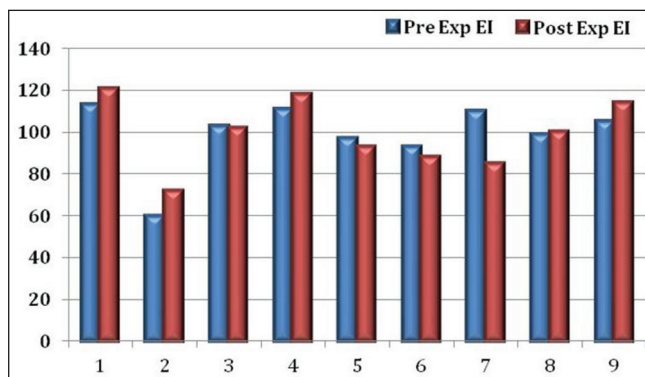

Figure 6: Experiential area scores

Table 2: Individual perception of peer coaching intervention (*n*=10)					
Categories	Least (%)	Somewhat (%)	Mild (%)	Moderate (%)	Most (%)
Perceived benefit of peer coaching	1 (10)	—	5 (50)	4 (40)	—
Value of peer coaching	1 (10)	—	3 (30)	5 (50)	1 (10)
Ability to meet EI goals by using peer coaching	1 (10)	—	6 (60)	2 (20)	1 (10)
Perception of increase of EI abilities	1 (10)	1 (10)	4 (40)	3 (30)	1 (10)
EI: Emotional intelligence					

significant increases in their ability to use emotions to reason, however, 5 (56%) participants' scores decreased. It was inferred that this area needs the most attention for future EI development.

Survey data

As a result of the survey data, participant feedback indicated that the majority of participants felt better about their perceived EI abilities. This has implications for future research because the intervention did help the participants feel like they improved their EI ability. Another important finding was that the participants also felt that this study's intervention was greatly helpful for their leadership development. This was also important because the ultimate goal for this study was to increase participants' leadership abilities with the incorporation of EI and participation in this study's intervention.

The findings of this study also suggest that other leadership development procedures and methodologies need to be included in nursing education. This study has influential implications for the education of undergraduate and graduate nursing students. Psychological, organizational, and nursing research all support that measured increased EI abilities are positively correlated with leadership effectiveness outcomes.[8,10] Based on previous research, this supports the concept that education on EI and the inclusion of peer coaching interventions should be included in nursing education in order to develop a student's measured EI abilities.

Limitations

The small study n limited the strength of the study findings. Although there was a 100% data completion rate from this sample group, more data could have been compiled from a larger group of participants. Study results could have been affected by the small study sample. The analysis of qualitative data collected was rich and adds to the significance of this study's findings, and also provided a starting place for further research.

The short span of the intervention process, also limited the study findings. The intervention process was constrained due to the short duration of a semester (15 weeks). This could have possibly limited the effect of the intervention, which ultimately affected EI ability scores. Perhaps, if the study was conducted over the span of two or three semesters, there would be greater opportunity for the impact of the intervention to influence the EI scores. This is suggested for further research of this type.
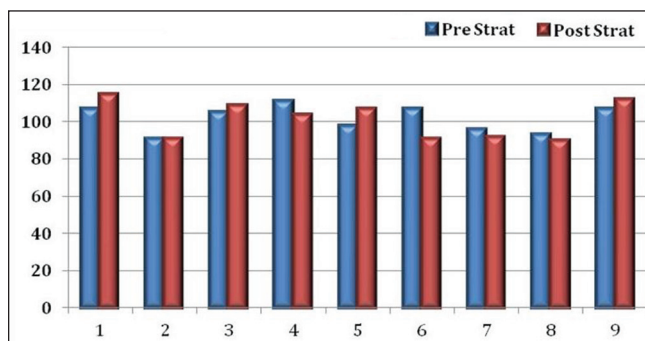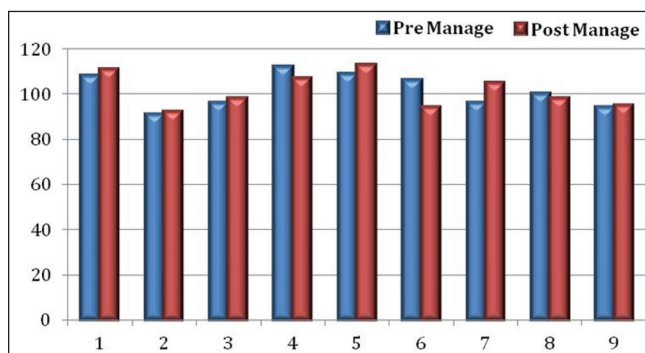

Figure 7: Strategic area scores
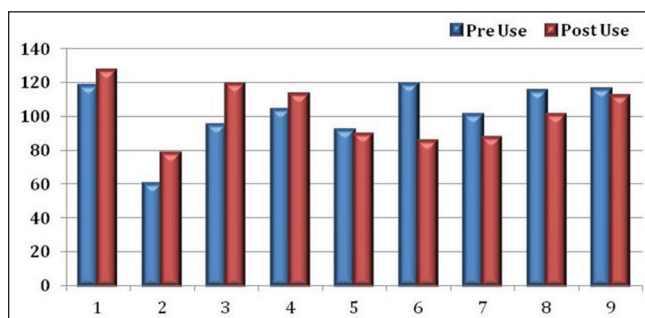

Figure 8: Managing emotions branch scores

Figure 9: Use of emotions to reason branch scores

Another limitation was that the sample group was not representative of nursing students in other locations in the United States. In addition, the male population was not well-represented. These results of this study may not be generalized to other population or locations as the demographics represented differ from the general populations of other geographic regions.

Conclusion

The results of this study provide a foundation to support the use of peer coaching as a means to develop EI ability. Peer coaching can be used to build EI skills and abilities in the student population before graduation and transition into the professional workplace. The lack of previous studies performed on the student population makes this study

increasingly important. Due to the upcoming changes to the healthcare industry this study has implications for student nurses, nursing education, leadership development, and practicing nurses. EI abilities are essential to the profession of nursing in both educational and clinical practice. Further examination of the role of peer coaching and the development of EI abilities in student nurses are needed to support this foundation of EI research.

Acknowledgments

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