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RESEARCH PAPER

Self-compassion and emotional intelligence in nurses

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Self-compassion and emotional intelligence in nurses

Nurses often provide care for patients and families who are suffering and where emotions are heightened. Compassion is an essential component of the care that nurses provide. Emotions play an important role in the relationship and communication between nurses, patients and families. Self-compassion is the ability to be compassionate to oneself, without this ability nurses might not be prepared to be compassionate to patients. Emotionally intelligent persons perceive themselves as confident, better able to understand, control and manage their emotions. The purpose of this descriptive, correlational study was to examine the relationship between self-compassion and emotional intelligence. Participants were 135 nurses. The setting for this study was a health system with hospitals located in Queens, Nassau and Suffolk counties of New York, USA. Three of the hospitals in the study are located in Queens and/or the Queens/Nassau border. Queens is the most culturally diverse community in the USA. The patients served, as well as the nursing staff, are reflective of this cultural and religious diversity. Results indicated a positive correlation between self-compassion and emotional intelligence ($r = 0.55$). Recommendations for future research include: exploration of self-compassion and emotional intelligence in nurses, and identification of the benefits of enhancing self-compassion and emotional intelligence in nurses.

Key words: self-compassion, emotional intelligence, patient satisfaction.

INTRODUCTION

Patients are reporting decreasing satisfaction with nursing care in hospitals. The Agency for Healthcare Research and Quality in partnership with the Centers for Medicare and Medicaid Services developed the Hospital Consumer Assessment of Healthcare Providers and Systems surveys to measures patients' experiences with hospital care. Patients surveyed on their hospital experience reported in 2005 that they were always treated with courtesy and respect by nurses 81% of the time.[1] In 2006, patients score for the question on courtesy and respect decreased

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to 77%.[2] In 2005, when asked to rate if nurses listened carefully to them, patients reported that nurses always listened to them 71% of the time, this decreased to 66% in 2006.[1,2] Patients reported that the nurse always explained things in a way they could understand 72% of the time in 2005 and 65% of the time in the 2006 survey.[1,2] Physicians scored higher than nurses on all three of these questions in both the 2005 and 2006 reports.[1,2]

Nurses, in hospital settings, often provide care for patients and families who are suffering. Compassion is an essential component of the care that nurses provide. National hospital surveys indicate that patients report decreasing satisfaction with nurses treating them with courtesy and respect, listening carefully to them and doing everything to help them with pain.[1,2] According to Neff, compassion is the ability to acknowledge and be moved by the suffering of others; it encompasses a desire to help the suffering person and a willingness to be non-judgmental.[3] Self-compassion is having this same ability for oneself.[3] Examining the compassion that nurses might feel for themselves is a significant nursing issue, because without ability for self-compassion, nurses might be ill-prepared to show compassion to those for whom they care. Self-compassion requires that one has a fair and objective awareness of one's own emotions. True compassion, according to these researchers, includes confronting, not avoiding, thoughts and emotions that are painful.[4]

Emotional intelligence is defined by Salovey and Mayer as 'the ability to monitor one's own and others' feelings, to discriminate among these feelings, and to use this information to guide one's thinking and action'.[5] Trait emotional intelligence is a self-report of one's own perceptions and dispositions. These qualities are measured based on fifteen personality traits.[6]

Although both self-compassion and emotional intelligence are important concepts in nursing, little is known about these characteristics in nurses. The purpose of this study was to examine the relationship between self-compassion and emotional intelligence in nurses in acute care settings. Nurses often provide care for patients and families who are suffering and where emotions are heightened. Emotions play an important role in the relationship and communication between nurses, patients and families.[7] Yet, hospital surveys indicate that patients report decreasing satisfaction with nurses treating them with courtesy and respect, listening carefully to them and doing everything to help them with pain.[1,2]

Background

The first element of self-compassion, common humanity, refers to the shared human experience.[3] Suffering is universal and all humans experience it.[3] All humans are imperfect and vulnerable.[3] External factors, such as culture, genetics, and environmental conditions impact behaviours and relationships with others.[3] A person's integral acknowledgement of our common humanity and an ability to recognize the external factors that make us unique, can allow one to be non-judgmental and understanding.[3] Self-kindness encompasses an understanding of ourselves when we suffer or feel inadequate, without being self-critical.[3] When one accepts painful experiences with self-kindness, one is more apt to experience that pain calmly and rationally, rather than with anger and frustration.[3] The third element of self-compassion is mindfulness, a mind state whereby one can observe feelings and events without exaggerating, denying or suppressing them.[3] Mindfulness allows one to put the situation into a larger perspective.[3] Being mindful entails an approach to negative emotions that is balanced.[3]

Four factors that are important to emotional intelligence are well-being, self-control, emotionality and sociability.[8] The first of the four factors, well-being, encompasses self-esteem, trait happiness and trait optimism, which are characteristics of people who perceive themselves to be confident, cheerful and satisfied.[8] The factor self-control contains the components of emotion regulation, stress management and low impulsiveness.[8] People who perform well in this area are capable of controlling their emotions and are better at handling stress.[8] Emotionality, another of the four factors, includes emotional perception of self and of others, emotion expression, relationship skills and empathy.[8] People that perceive themselves as high performers in emotionality are capable of being clearer about their own feelings and communicating these feelings to others.[8] They are more able to take another's perspective and might have more fulfilling relationships.[8] The last factor, sociability includes social competence, the ability to manage emotions and assertiveness. People that score high in this area have stronger social skills and are capable of influencing others.[8]

In 2003, Neff developed the construct, self-compassion.[9] Neff, defines self-compassion as, 'Being

open to and moved by one's own suffering, experiencing feelings of caring and kindness towards oneself, taking an understanding, nonjudgmental attitude toward one's inadequacies and failures, and recognizing that one's experience is part of the common human experience'.[9] Neff described three elements of self-compassion: common humanity, self-kindness and mindfulness.[9] No studies were found on nurses and self-compassion.

Self-compassion and emotional intelligence were found to have a positive association.[9] Significant positive correlations were found with self-compassion and the ability to regulate mood and the clarity of the person's experience of their feelings.[9] Self-compassion was also found to be significantly related with positive mental health or well-being.[4,9–11]Increases in self-compassion were found before and after an intervention that helped participants become more self-empathetic.[4] Self-compassion was found to act as a defence to anxiety when participants were placed in a situation that threatened their ego.[4] Studies involving mindfulness-based stress reduction interventions suggested that this training might also be effective in increasing self-compassion.[12,13]

Self-compassion and self-esteem were found to be moderately related but self-esteem was significantly related with narcissism whereas self-compassion was not.[10,11] Neff *et al*. found that self-compassion was positively associated with ability goals and negatively associated with performance goals.[14] Self-compassionate students were less fearful of failure and perceived themselves as more competent.[14] In addition, self-compassion was positively associated with coping strategies and negatively associated with avoidance strategies.[14] Studies demonstrated that self-compassion predicted cognitive and emotional reactions such as accepting responsibility without negativity and without becoming defensive.[15] Self-compassion safeguarded participants from negative feelings and moderated negative emotions.[15] Self-compassion helped participants to acknowledge their role in negative events without negative emotions.[15] Reversely, participants that reported low self-compassion had less appreciation for their work.[15]

Compassion for oneself is stressed in the Buddhist tradition.[3] In the Buddhist perspective, one cannot be compassionate for another unless they have self-compassion.[3] Neff developed the self-compassion scale (SCS) in a series of three studies with a total of 623 undergraduates and 43 practicing Buddhists.[9] The Buddhist practitioner participants were found to have significantly higher scores of than the undergraduates.[9] As self-compassion is an Asian construct, Neff *et al*. studied the comparison of levels of self-compassion in participants from the USA, Thailand and Taiwan.[11] The results indicated that participants from Thailand had the highest levels of self-compassion, then the USA, followed by Taiwan.[11] The researchers suggested that the results were related to cultural features rather than East–West differences.[11]

Self-compassion predicted more stable feelings of self-worth than self-esteem and had a stronger negative association with social comparison, self-rumination, anger and the need for cognitive closure.[16] Self-esteem (but not self-compassion) was positively associated with narcissism, suggesting that self-compassion might be a useful alternative to self-esteem when considering what represents a healthy self-attitude.[16]

Emotional intelligence

There are few studies of nurses and emotional intelligence. This review of the literature is limited to studies that included nurses.

Codier *et al*.[17] found that the performance level of staff nurses was positively correlated with emotional intelligence. Level of performance was distinguished by those nurses that were on a clinical ladder vs. those that were not. Of the participants, 30% were on a clinical ladder and others were not. The researchers also found that a high number of nurses scored below average on the emotional intelligence ability measure.[17] Humpel and Caputi found a significant relationship between emotional competency and years of nursing experience.[18] Nurses with $\geq$ 6-year experience had higher levels of emotional competency. Akerjordet and Severinsson explored experiences of emotional intelligence in mental health nurses in their practice.[19]The researchers concluded from this qualitative study that emotional intelligence processes are central to nursing growth and development and to professional competency. Rochester *et al*., in a qualitative and quantitative study of nurse graduates, found that these graduates and their nursing unit managers identified emotional intelligence skills as being significant factors for successful nursing practice.[20] The results from this study suggested that curriculum for nurses needs to be developed that includes more emotional intelligence content.

Humpel and Caputi, in a study of mental health nurses, did not find a significant association between emotional competency and stress.[18] In another study by Oginska-Bulik, using a self-report measure of emotional

intelligence, a correlation between emotional intelligence and stress was found but it was not strong.[21] This was a study of participants from various professions (physicians, nurses, teachers and managers). In a study of healthcare workers (i.e. nurses, respiratory therapists, radiology technicians, etc.), Humphreys *et al*. found a significant correlation between emotional intelligence, coping ability and organizational commitment.[22] The relationship between perceived emotional intelligence, coping, social support and mental health in nursing students was studied by Montes-Berges and Augusto. The results among the concepts studied demonstrated the importance of perceived emotional intelligence in stress coping in student nurses.[23] The researchers concluded that stress coping might be related to perceived emotional intelligence. Mikolajczak *et al*. studied emotional intelligence and occupational stress in Belgium nurses. This research was the one study found that used the TEIQue-SF (French version) with nurses. The researchers found that participants with high levels of emotional intelligence experienced lower levels of burnout and somatic complaints when confronted with emotional labour conflicts.[24]

Cummings *et al*. studied results from a 1998 survey given to 6526 registered nurses (RNs) who reported on hospital attributes and their own physical and emotional well-being.[25] Thirteen questions from this survey were chosen for this study because they reflected emotional intelligence leadership competencies. The researchers reported that nurses working for emotionally intelligent leaders reported less negative physical and emotional symptoms and were more satisfied with their supervisors and their jobs. The researchers recommended that future research be done prospectively and with instruments designed to measure emotional intelligence of leaders as it is perceived by followers. Humphreys *et al*. found a significant correlation between emotional intelligence, coping ability and organizational commitment among healthcare workers (nurses, respiratory therapists, radiology technicians, etc.).[22]

METHODS

This study was a descriptive correlational study. The setting for this study was a health system with hospitals located in Queens, Nassau and Suffolk counties of New York, USA. A convenience sample of approximately 350 RNs and nurse managers was recruited.

Instruments

Participants were asked to respond to ten background questions. The operational definition of the self-compassion variable was the total score on the SCS. The SCS was published by Neff in 2003 and is the only tool found for this concept based on a review of the literature. This scale is a 26-item instrument designed to assess self-compassion and six aspects of self-compassion.[9] The scale was based on Neff's work on the construct of self-compassion. The scale includes six subscales. The SCS was found to have an internal consistency of 0.92; the scale also had test–retest reliability of 0.93 using a 3-week interval.[9] Positive correlations were found to be significant with social connectedness, emotional intelligence and life satisfaction. Significant negative correlations were found with self-criticism, perfectionism, depression and anxiety.[9]

The Trait Emotional Intelligence Questionnaire—Short Form (TEIQue-SF) was selected as the most appropriate instrument for this concept based on a review of the literature and a review of the instruments available to measure emotional intelligence. This questionnaire is a 30-item instrument designed to assess the ability to identify and manage one's own emotions and the emotions of others. This short form scale was developed by Petrides and Furnham in 2006. Trait emotional intelligence regards the construct as self-perceptions and qualities that are at the lower level of the Big Five personality traits.[26] The internal consistency of the TEIQue-SF was found to be 0.88 ($n = 1119$).[27] Positive correlations were found with mental health, coping, job satisfaction and organizational commitment.

Procedures

Recruitment was to those nurses in the seven hospitals where the nurses have access to the internal website. Recruitment was in the form of flyers that were sent via the health system's internal email requesting that nurses take the surveys. Participation in the study was voluntary.

RESULTS

Sample

A total of 143 nurses participated in the survey online via the health system's internal website. Among the 143 surveys, eight were excluded as > 10% of the survey questions were unanswered. Thus the sample for this study included 135 participants.

The RNs were primarily female (95.28%) and over one-third worked on a medical unit (34%) followed by surgery (11.85%) and critical care (11.85%). Most of the RNs were staff nurses (54.55%) followed by nurse managers (34.09%). Over half of the nurses were between the ages of 41–50 (32.84%) and 51–60 (30.60%). The level of education of the nurses was as follows: Bachelors of Science (42.22%), Masters (28.15%), Associate (22.96%), Bachelor of Arts and Diploma (6.67%). The years as a nurse ranged 0–10 (31.34%), 11–20 (22.39%), 21–30 (26.10%) and > 30 (20.15%).

The majority of the RNs described themselves as White (56.72%). RNs that described themselves as Black accounted for 18.66% and Asian 16.42%. The majority of the participants were Roman Catholic (54.07%) followed by Protestant (26.19%) and Jewish (8.89%). Job satisfaction was rated on a seven-point scale with '1' being very satisfied and '7' being very dissatisfied. Most of the RNs scored themselves in the higher end of job satisfaction: 1 (21.64%), 2 (38.81%) and 3 (16.42).

Reliability of the research instruments

The Cronbach's alpha for the total SCS for this study was 0.90. The SCS has six subscales. Neff reported a Cronbach's alpha of 0.92 for the SCS.[9] The Cronbach's alpha for the total scale for this study was high suggesting a high internal consistency of the scale.

The Cronbach's alpha for the subscales for this study were as follows: self-kindness (0.79), self-judgment (0.74), common humanity (0.72), isolation (0.69), mindfulness (0.85) and over identification (0.72). Neff reported Cronbach's alpha for the subscales as follows: self-kindness (0.78), self-judgment (0.77), common humanity (0.80), isolation (0.79), mindfulness (0.75) and over identification (0.81).[9] The subscales have small numbers of items (four to five per subscale) and have a lower Cronbach's alpha than the total scale but still represent acceptable internal consistency. These results are included in Table 1.

The Cronbach's alpha for the TEIQue-SF for this study was 0.88. Petrides reported a Cronbach's alpha of 0.88.[27]

Research question: what is the relationship between self-compassion and emotional intelligence?

The mean self-compassion score of the RNs in this study was 3.49. The self-compassion subscale means for this study were self-kindness (3.37), common humanity (3.50), mindfulness (3.74), self-judgment (2.60), isolation (2.52) and over identification (2.49). The mean for the TEIQue-SF for this study was 5.42.

Table 1 Reliability of the self-compassion scale

Self-compassion scale	N of items	Cronbach's alpha
Total scale	26	0.90
Self-kindness items	5	0.79
Self-judgment items	5	0.74
Common humanity items	4	0.72
Isolation items	4	0.69
Mindfulness items	4	0.85
Over identification	4	0.72

Table 2 Mean data of nurses' self-compassion ($n = 135$)

Scale	Mean	Standard deviation
Total self-compassion scale	3.49	0.60
Self-kindness items	3.37	0.81
Self-judgment items	2.60	0.79
Common humanity items	3.50	0.81
Isolation items	2.52	0.84
Mindfulness items	3.74	0.88
Over identification	2.49	0.85

Pearson correlations were computed for the self-compassion score and the emotional intelligence score. Results indicate a positive correlation between self-compassion and emotional intelligence ($r = 0.55$). In addition, there was a positive correlation between emotional intelligence and five of the six subscales of the SCS. The Pearson correlation for the subscales is as follows: self-kindness ($r = 0.45$), self-judgment ($r = 0.30$), common humanity ($r = 0.41$), isolation ($r = 0.37$), mindfulness ($r = 0.47$) and over identification ($r = 0.40$). These results are included in Tables 2 and 3.

Additional analysis

Additional analysis were performed to examine the relationship between background variables and level of job satisfaction) and the self-compassion and emotional intelligence variables. Independent *t*-tests of the total

Table 3 Relationship between self-compassion and emotional intelligence ($n = 135$)

Scale	Pearson correlation
Total scale	0.55*
Self-kindness items	0.45*
Self-judgment items	0.30**
Common humanity items	0.41*
Isolation items	0.37*
Mindfulness items	0.47*
Over identification	0.40*

* $P < 0.0001$. ** $P < 0.0003$.

self-compassion mean and the total emotional intelligence mean were run with background variables. No significant association was found between self-compassion and/or emotional intelligence and the background variables. Pearson's correlations were computed for the self-compassion score and job satisfaction as well as the emotional intelligence score and job satisfaction. Results indicate no correlation between these variables.

DISCUSSION

Over half of the RNs were between the ages of 41–50 (32.84%) and 51–60 (30.60%). In 2004, the U.S. Department of Health and Human Services reported the average age of RNs as 46.8 years with 41% being over 50 years of age.[28] The majority of the RNs described themselves as White (56.72%). RNs that described themselves as Black accounted for 18.66% and Asian 16.42%. The U.S. Census Bureau reported the population in Queens County, New York, as White (55.2%), Black (20.9%) and Asian (21.3%) for the year 2006.[29] The U.S. Census Bureau reported Nassau County's population demographics as White (80.4%), Black (11.3%) and Asian (6.9%).[30]

There have been no previous studies of nurses' self-compassion and few studies with nurses' emotional intelligence using the TEIQue or TEIQue-SF. The five-factor model was used as the conceptual framework for the study. Self-compassion and emotional intelligence, using the SCS and TEIQue-SF, measure different traits that when combined might be attributed to the behaviours, self-compassion and emotional intelligence, described by the authors of the instruments. Self-compassion and emotional intelligence are perceived behaviours of individuals that are at the lower levels of the hierarchical personality structure (the lower levels of the five-factor model). Personality traits are characteristics that influence behaviour and help describe individual differences.[31,32] Traits that are studied might be blends of the five factors of personality.[32]

Table 4 Self-compassion scores

Country	Thailand	USA	Taiwan
Total self-compassion scale	3.41	3.14	2.92
Self-kindness items	3.48	3.10	3.22
Self-judgment items	2.55	2.97	3.22
Common humanity items	3.24	3.19	3.22
Isolation items	2.59	2.84	3.34
Mindfulness items	3.53	3.32	3.42
Over identification	2.65	2.99	3.79

The mean self-compassion score of the RNs in this study was 3.49. In a study of self-compassion in three countries, the researchers reported the mean score was highest in Thailand (3.41) with 223 undergraduates, followed by the USA (3.14) with 181 undergraduates and lowest in Taiwan (2.92) with 165 undergraduates.[11] Thais are largely Buddhists. Self-compassion and compassion for others, 'is central to a Buddhist worldview, as suffering, failure and imperfection are seen as natural part of life'.[11]In contrast, Taiwanese are influenced by Confucianism, which stresses 'the importance of good conduct, proper social relations, humility and self-improvement to maintain group harmony'.[11] The authors had predicted that the Thais would have a higher level of self-compassion and the Taiwanese lowest with the USA somewhere in the middle based on cultural features in these societies.[11]

The RNs also scored higher in the subscales of self-kindness (3.37), common humanity (3.50) and mindfulness (3.74). The subscales self-judgment, isolation and over identification are negative subscale items. The mean score for the RNs on the subscale for self-judgment (2.60) was higher than those reported from Thailand but lower that the USA and Taiwan results. The RN scores for isolation (2.52) and over identification (2.49) were lower than those reported by Neff *et al*. who reported the mean scores listed in Table 4.[11]

It is important to emphasize that the sample in the study above were undergraduates with a mean age of Thais (19.8 years), Americans (21.3 years) and Taiwanese

(20.5 years). Age and life experience might account for the differences in the level of self-compassion in the RNs.

The mean score for emotional intelligence in this study of nurses was 5.42. In a review of the studies done using the same scale, TEIQue-SF, no mean scores are indicated so no comparison is possible.

A positive relationship was identified in this study between self-compassion and emotional intelligence in nurses working directly with patients in acute care settings. The relationship between self-compassion and emotional intelligence was evaluated at the subscale level of self-compassion and positive relationships were found with the six subscales. Neff's study that defined the construct of self-compassion and described the development of the SCS, also found an association between emotional intelligence and self-compassion.[9] The positive correlations were found with the subscales repair (0.55) and clarity (0.43) of the Trait Meta-Mood Scale. The Trait Meta-Mood Scale is a self-report emotional intelligence tool. Neff expected these findings, 'given that one should be able to regulate one's negative emotions and see them with clarity through the processes involved in giving oneself compassion'.[11]

Implications for practice

Compassion is an essential component of the care that nurses provide. Examining the compassion that nurses might feel for themselves is a significant nursing issue, because without ability for self-compassion, nurses might be ill prepared to show compassion to those for whom they care. This was a new study of self-compassion in RNs. Results of this study might indicate that many RNs have high levels of self-compassion. However, in all the subscale items there were RNs that responded on the low side and with the lowest scored answered (i.e. least self-kind or more self-judgmental). Further research is needed on self-compassion of nurses. Identifying and supporting those RNs that have low levels of self-compassion is an important implication to practice.

National hospital surveys indicate that patients report decreasing satisfaction with nurses treating them with courtesy and respect, listening carefully to them and doing everything to help them with pain.[1,2] RNs that have low self-compassion might be contributing to the dissatisfaction of patients. Identification of nurses with low self-compassion through screening would provide healthcare organizations a systematic approach to offering intervention training specifically to that population of nurses. Interventions to improve self-compassion are being studied.[11] These interventions might increase self-compassion in nurses, which might improve the relationships nurses have with patients and their families.

Recommendations for future research

The results from this study suggest that nurses might have a high level of self-compassion. As prior studies were primarily of undergraduates, a suggestion for future research would be to include representatives from differing professions in the same age group as the RNs from differing professions. As this study was the first to examine self-compassion in RNs, it would be important to replicate the study. Additional studies on ways to improve self-compassion are also needed. Finally, studies that compare the relationship between self-compassion, emotional intelligence and patient satisfaction might generate insight into the decreasing patient satisfaction reported nationally.

REFERENCES

1 Agency for Healthcare Research and Quality. *2006 CAHPS Hospital Survey Chartbook: What Patients Say about Their Experiences with Hospital Care*. 2006. Available from URL: http://www.cahps.ahrq.gov/content/ncbd/PDF/HCAHPS_Chartbook_2006.pdf. Accessed 30 January 2009.

2 Agency for Healthcare Research and Quality. *2007 CAHPS Hospital Survey Chartbook: What Patients Say about Their Experiences with Hospital Care*. 2007. Available from URL: http://www.cahps.ahrq.gov/content/ncbd/PDF/HCAHPS_Chartbook_2007.pdf. Accessed 30 January 2009.

3 Neff KD. Self-compassion: An alternative conceptualization of a healthy attitude toward oneself. *Self and Identity* 2003; **2**: 85–102.

4 Neff KD, Kirkpatrick K, Rude SS. Self-compassion and its link to adaptive psychological functioning. *Journal of Research in Personality* 2007; **41**: 139–154.

5 Salovey P, Mayer JD. Emotional intelligence. *Imagination, Cognition, and Personality* 1990; **9**: 185–211.

6 Petrides KV, Furnham A, Mavroveli S. Trait emotional intelligence: Moving forward in the field of EI. In: Matthews G, Zeidner M, Roberts R (eds). *Emotional Intelligence: Known's and Unknowns*. Oxford, UK: Oxford University Press, 2007; 120–129.

7 Sheldon LK, Barrett R, Ellington L. Difficult communication in nursing. *Journal of Nursing Scholarship* 2006; **38**: 141–147.

8 Petrides KV, Furnham A. Trait emotional intelligence: Behavioural validation in two studies of emotion recognition and reactivity to mood induction. *European Journal of Personality* 2003; **17**: 39–57.
9 Neff KD. Development and validation of a scale to measure self-compassion. *Self and Identity* 2003; **2**: 223–250.
10 Neff KD, Rude SS, Kirkpatrick K. An examination of self-compassion in relation to positive psychological functioning and personality traits. *Journal of Research in Personality* 2007; **41**: 908–916.
11 Neff KD, Pisitsungkagarn K, Hseih Y. Self-compassion and self-construal in the United States, Thailand, and Taiwan. *Journal of Cross-Cultural Psychology* 2008; **39**: 267–285. Available from URL: https://webspace.utexas.edu/neffk/pubs/scculture.pdf. Accessed 12 December 2007.
12 Shapiro SL, Astin JA, Bishop SR, Cordova M. Mindfulness-Based Stress Reduction for health care professionals: Results from a randomized trial. *International Journal of Stress Management* 2005; **12**: 164–176.
13 Shapiro SL, Brown KW, Biegel GM. Teaching self-care to caregivers: Effects of mindfulness-based stress reduction on the mental health of therapists in training. *Training and Education in Professional Psychology* 2007; **1**: 105–115.
14 Neff KD, Hseih Y, Dejitthirat K. Self-compassion, achievement goals, and coping with academic failure. *Self and Identity* 2005; **4**: 263–287.
15 Leary MR, Tate EB, Adams CE, Allen AB, Hancock J. Self-compassion and reactions to unpleasant self-relevant events: The implications of treating oneself kindly. *Journal of Personality and Social Psychology* 2007; **92**: 887–904.
16 Neff KD, Vonk R. Self-compassion versus global self-esteem: Two different ways of relating to oneself. *Journal of Personality* 2009; **77**: 23–50.
17 Codier E, Kooker BM, Shoultz J. Measuring the emotional intelligence of clinical staff nurses: An approach for improving the clinical care environment. *Nursing Administrator Quarterly* 2008; **32**: 8–14.
18 Humpel N, Caputi P. Exploring the relationship between work stress, years of experience and emotional competency using a sample of Australian mental health nurses. *Journal of Psychiatric and Mental Health Nursing* 2001; **8**: 399–403.
19 Akerjordet K, Severinsson E. Emotional intelligence in mental health nurses talking about practice. *International Journal of Mental Health Nursing* 2004; **13**: 164–170.
20 Rochester S, Kilstoff K, Scott G. Learning from success: Improving undergraduate education through understanding the capabilities of successful nurse graduates. *Nurse Education Today* 2005; **25**: 181–188.
21 Ogińska-Bulik N. Emotional intelligence in the workplace: Exploring its effects on occupational stress and health outcomes in human service workers. *International Journal of Occupational Medicine and Environmental Health* 2005; **18**: 167–175.
22 Humphreys J, Brunsen B, Davis D. Emotional structure and commitment: Implications for health care management. *Journal of Health Organization and Management* 2005; **19**: 120–129.
23 Montes-Berges B, August JM. Exploring the relationship between perceived emotional intelligence, coping, social support and mental health in nursing students. *Journal of Psychiatric and Mental Health Nursing* 2007; **14**: 163–171.
24 Mikolajczak M, Menil C, Luminet O. Explaining the protective effect of trait emotional intelligence regarding occupational stress: Exploration of emotional labour processes. *Journal of Research in Personality* 2007; **41**: 1107–1117.
25 Cummings G, Hayduk L, Estabrooks C. Mitigating the impact of hospital restructuring on nurses. *Nursing Research* 2005; **54**: 2–11.
26 Petrides KV, Furnham A. Trait emotional intelligence: Psychometric investigation with reference to established trait taxonomies. *European Journal of Personality* 2001; **15**: 425–448.
27 Petrides KV. *Internal Consistency Data for the TEIQUE and TEIQUE-SF (v. 1.50)*. Spring, 2006. Available from URL: http://www.psychometriclab.com/Webnote_1.pdf. Accessed 12 December 2007.
28 U.S. Department of Health and Human Services Health Resources and Service Administration Bureau of Health Professions. 2006. The registered nurse population: Findings from the March 2004 national samples survey of registered nurses. Available from URL: ftp://ftp.hrsa.gov/bhpr/workforce/0306rnss.pdf. Accessed 14 December 2008.
29 U.S. Census Bureau. *Quickfacts*. 2008. Available from URL: http://quickfacts.census.gov/qfd/states/36/36081.html. Accessed 14 December 2008.
30 U.S. Census Bureau. *Quickfacts*. 2008. Available from URL: http://quickfacts.census.gov/qfd/states/36/36059.html. Accessed 14 December 2008.
31 Schulze R, Roberts RD, Zeidner M, Matthews G. Theory, measurement, and applications of emotional intelligence: Frames of reference. In R. Schulze and R. D. Roberts. Self-compassion and reactions to unpleasant self-relevant events: The implications of treating oneself kindly. *Journal of Personality and Social Psychology* 2005; **92**: 2410–2439.
32 McCrae RR, John OP. An introduction to the five-factor model and its applications. *Journal of Personality* 1992; **60**: 175–215.