

Decreasing Compassion Fatigue In Cardiovascular Intensive Care Nurses Through Self-Care and Mindfulness

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Background

Compassion fatigue

- State of physical, emotional, and/or spiritual depletion associated with caring for people in extreme physical or emotional pain
- Affects 53% of all nurses across the clinical spectrum⁴
- Leads to physical, emotional, spiritual, and mental health problems
- Associated with decreased productivity, medical errors, poor patient outcomes, decreased job satisfaction, and poor staff retention¹

Self-care and mindfulness-based activities have been shown to reduce levels of compassion fatigue and stress in nurses and other healthcare workers.²

The Professional Quality of Life Survey (ProQOL) measures compassion fatigue. It measures the positive and negative aspects of caring for others, including:

1. **Compassion satisfaction** (the positive side, what makes you feel good)
2. **Burnout** (negative)
3. **Secondary traumatic stress** (negative)

PICOT

Among (P) pediatric cardiovascular intensive care nurses, how does (I) application of a mindfulness-based educational intervention compared to (C) no intervention affect (O) levels of compassion satisfaction, burnout, and secondary traumatic stress over a (T) thirty-day period?

Methods

Design: 30-day, nonrandomized, pre-post intervention study (DNP student scholarly project)

Setting: CVICU at Children's of Alabama

Sample: In the Fall of 2018, all full-time staff nurses and advanced practice nurses (88) were recruited via email, flyers, and word of mouth; 40 nurses enrolled, 26 completed the study (13 withdrew due to lack of participation, 1 resigned from Children's)

Data Collection: IRB approval was obtained prior to recruitment and data collection. After enrollment, each participant completed a demographic survey and the ProQOL survey. Next, participants individually received education about compassion fatigue, self-care, mindfulness, and meditation using a PowerPoint presentation provided by the principal investigator. Participants received an email containing 16 audio files for download; files contained guided audio meditations, each lasting 2 to 8 minutes. Participants agreed to listen to four meditations per week for four weeks at home. Following the intervention period, participants completed the ProQOL survey again and were invited to complete an anonymous online opinion survey. Pre and post-ProQOL mean scores were compared using the paired t test. Statistical analysis was performed using SPSS.

Results

Table 1. Paired Sample t-tests Comparing Pre-intervention to Post-intervention Scores from ProQOL Means (n=26)

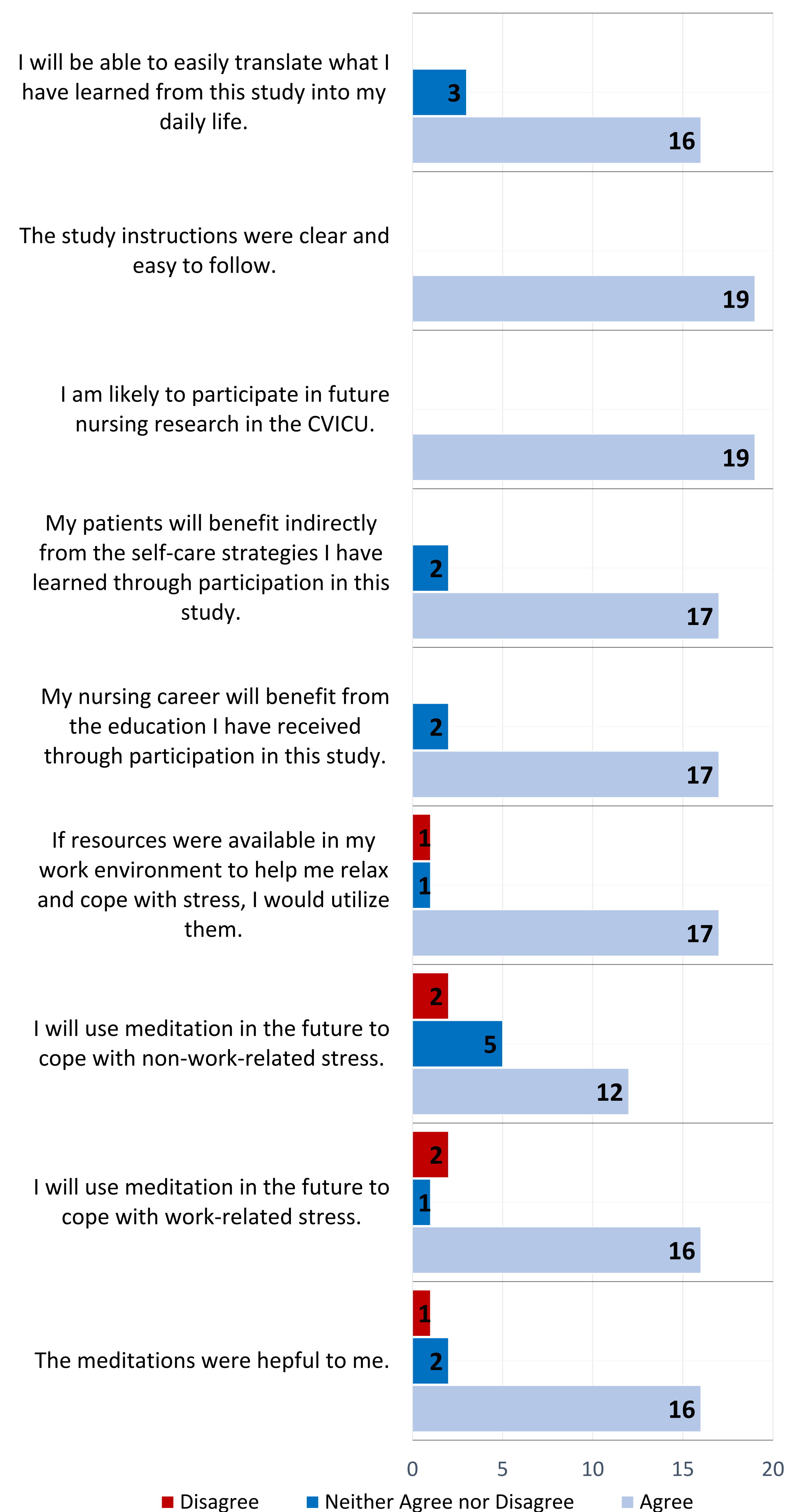
Subscale	Pre m ± SD	Post m ± SD	Difference m ± SD	t	p Value
Compassion Satisfaction	40.2 ± 4.2	42.7 ± 3.6	2.4 ± 3.7	-3.4	0.002
Burnout	22 ± 4.5	20.3 ± 3.9	1.8 ± 4	2.2	0.037
Secondary Traumatic Stress	23.7 ± 5.1	21.4 ± 4.6	2.4 ± 4	3.1	0.005

* Professional Quality of Life Survey, version 5

Table 2. Sociodemographic Information for Nurses Working in the Cardiovascular Intensive Care Unit at Children's of Alabama (n=26)

Demographic characteristics	N (%)
Age (in years)	
20-25	17 (65.4)
26-30	7 (27)
>30	2 (7.5)
Gender	
Female	26 (100)
Male	0
Current Shift Assignment	
Day (7a-7p)	9 (34.5)
Night (7p-7a)	15 (58)
Both	2 (7.5)
Months as a Nurse	
<12	9 (35)
12-24	6 (23)
25-36	3 (11.5)
37-48	3 (11.5)
49-60	3 (11.5)
>60	2 (7.5)
Months Worked in CVICU	
<12	10 (38.5)
12-24	7 (27)
25-36	2 (7.5)
37-48	1 (4)
49-60	4 (15.4)
>60	2 (7.5)
Professional Role	
Bedside RN	21 (81)
Charge RN	3 (11.5)
Advanced Practice RN	2 (7.5)
Years as Advanced Practice Nurse (n=2)	
8	1 (50)
10.5	1 (50)

Table 3. Results from Anonymous Online Survey (n=19)



* Of the 26 participants who completed the study, only 19 completed the online survey

Conclusions

- Compassion satisfaction, burnout, and secondary traumatic stress scores all showed **statistically significant improvement** following the intervention
- According to the ProQOL scale:
 - Compassion satisfaction **improved** from **moderate to high**
 - Secondary traumatic stress **decreased** from **average to low**
 - Burnout scores **remained** in the **low** category
- Overall, nurses reported satisfaction with the knowledge and self-care skills that they learned from the intervention
- Positive results from this project indicate that teaching nurses to engage in self-care and mindfulness-based activities such as meditation can effectively reduce stress and cultivate self-compassion

Limitations

The small sample size, lack of male participation, and lack of a control group make it difficult to generalize these findings to a larger population. Because of time constraints related to the principal investigator's academic program of study, the intervention period was limited to 30 days. A longer study period may provide more insight into the benefits and sustainability of self-care and mindfulness over time.

References

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