The Significance of Sleep Disturbance and Attentional Fatigue among Breast Cancer Survivors
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INTRODUCTION

- Breast cancer is the most commonly occurring cancer type among women worldwide.
- The 5-year survival rate for women with breast cancer is now approximately 89%.
- Currently, it is estimated that more than 3.1 million breast cancer survivors (BCS) are living in the U.S.

PURPOSE

The purpose of this study was to examine the impact of sleep disturbance on attentional fatigue in BCS controlling for known covariates of age, level of education, and time since treatment.

BACKGROUND

- Sleep disturbance among BCS is shown to be related to other distress symptoms.
- Attentional fatigue, a decreased ability to focus, has also been identified as a persistent challenge.
- Little is known about the impact of sleep disturbance on attentional fatigue.

METHODS

- A secondary data analysis was completed from a cross-sectional, descriptive study.
- Multiple regression was used to assess the impact of sleep disturbance on attentional fatigue controlling for the covariates of age, level of education, and time since treatment.
- Measures:
  - The Pittsburgh Sleep Quality Index (PSQI): 9-item sub-scale measuring sleep disturbance, where higher scores indicate worse sleep disturbance.
  - The Attentional Function Index (AFI): A 13-item scale measuring attentional fatigue, where higher scores indicate better functioning.

RESULTS

- 68 BCS from a Midwestern cancer center, ranging from 29 to 68 years of age (M=52.1 [SD, 8.6]), and on average 4.97 (SD, 3.36) years post-cancer treatment participated.
- The $R^2$ for the model explained 16% of the variance of attentional fatigue.
- Sleep disturbance significantly predicted attentional fatigue. F(4, 57) = 2.68, p<0.04, $R^2=0.16$.

DISCUSSION

- These findings extend our knowledge of the relationship between sleep disturbance and attentional fatigue in long-term BCS.
- Nurses are in a prime position to assess and intervene to decrease sleep disturbance to improve attentional fatigue in BCS.
- However, sleep disturbance is just one factor contributing to attentional fatigue.
- Further investigation into factors contributing to attentional fatigue in BCS is warranted.

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