

GENDER DIFFERENCES IN CLINICAL SYMPTOMS IN PATIENTS WITH IMPLANTABLE CARDIOVERTER-DEFIBRILLATORS

Genevieve Smith, BSN Honors Nursing Student

Sandra Dunbar RN, DSN, FAAN

Marian Chris O'Brien, RN, MPH, Bindu Viswanathan, PhD.

Emory University School of Nursing

1520 Clifton Road

Atlanta, Georgia 30322 - 4207

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Purpose: The purpose of this study was to examine the gender differences in demographic, clinical, and psychosocial symptoms in persons receiving Implantable Cardiac Defibrillators (ICDs) for treatment of life threatening ventricular arrhythmias. A better understanding of these characteristics would be helpful to determine gender specific needs and to direct clinical care to promote optimal recovery.

Method: A convenience sample of 234 patients was recruited from 5 hospitals at the time of implantation of their initial ICD. 176 (75%) were men and 58 (25%) were women. Data were collected in the hospital prior to and following ICD implantation. The demographic variables included age, race, education, and marital status. Clinical variables were history of sudden cardiac arrest (SCA) and CAD, NHYA class, medications, and functional status (Duke Activity Status Index, DASI). Psychosocial symptoms and measures were: depressive symptoms (Beck Depression Inventory II, BDI-II), anxiety (State Trait Anxiety Inventory, STAI), Sleepiness (Epworth Sleepiness Scale, ESS), sleep difficulties (Pittsburgh Sleep Quality Inventory, PSQI), and pain (Brief Pain Inventory, BPI). Descriptive statistics, t-tests, and Chi-square were used to compare variables by gender.

Findings: Women were significantly younger in age than men (54 ± 13 vs. 60 ± 10 years, $t=3.45$, $p=.001$), and less women than men had a history of CAD ($p = 0.004$). Fifty percent of women were NYHA class III-IV vs. 26% of men. Women had lower DASI scores (15.2 ± 13 vs. 21.3 ± 17 , $t = 2.44$, $p = 0.01$) indicating lower functional status. Women also had significantly higher BPI scores ($p= 0.003$), and higher PSQI scores ($p=0.001$). No gender differences were found on the ESS, BDI-II or STAI scores.

Discussion: Although younger and less likely to have ischemic heart disease, women ICD patients had greater severity of heart failure symptoms and lower physical functioning than men at the time of ICD implant. Women were more likely to report distressing symptoms of increased pain severity and sleep difficulties, although there were no differences in psychological outcomes of depressive symptoms or anxiety. Few studies have addressed gender issues in ICD patients. The information obtained from this study could have important implications for nursing care, teaching, and follow - up of patients living with ICDs. Clinical implications of this data include the need to address symptoms of pain, sleep, and lower functional status in women. Gender focused nursing interventions should be developed and tested to promote better recovery outcomes for these patients.