Original Article

Assessment of sociodemographic characteristics in a sample of breast cancer patients in Baghdad.

Usama M. Al-Fadhli* **MBChB**
Ameel F. Al-Shawi ** **MBChB, MSc, PhD**
Ahmed S. Al-Nuaimi* **MBChB, MSc, PhD**

Abstract:

Background: In Iraq, breast cancer is the most common type of malignancy among the Iraqi population in general. It accounts for approximately one third of the registered female cancers according to the latest Iraqi Cancer Registry.

Objectives: This study was conducted to assess the sociodemographic characteristics of patients with breast cancer in Baghdad.

Methodology: This cross sectional study that was conducted in Baghdad City during a three months period from January to March 2016. It was conducted at Al-Amal National Hospital for Cancer Management. The questionnaire form gathered info about sociodemographic characteristics including: age, gender, educational attainment, marital status, living arrangement, finical status, and disease associated factors like disease duration and treatment modalities.

Results: A random sample of 250 female patients with breast cancer was analyzed. The mean age was 56 years. The high frequency of breast cancer was among women aged 50-59 years, which is consistent with what was reported in the literature as age is one of the risk factors for developing breast cancer. The highest proportion of study sample completed their secondary school and about one fifth had university education. Married females constituted a large proportion of the study sample. In addition, parous women were frequent in the study sample, which was also consistent with global prevalence data of breast cancer.

Conclusions: A high proportion of BC patients were married, multiparous, urban residence, and at least completed their secondary school.

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Keywords: Sociodemographic characteristics, breast cancer, Iraqi patients.

Introduction

Cancer of the breast in women is a major health burden worldwide. It is the most common cause of cancer among women in both high-resource and low-resource settings, and is responsible for over one million of the estimated 10 million neoplasms diagnosed worldwide each year in both sexes. It is also the primary cause of cancer death among women globally, responsible for about 375,000 deaths in the year 2000[1]. International comparisons of disease rates by area and time of diagnosis can provide important clues to the underlying causes of diseases and the effects of natural or planned interventions, and serve as indicators of the scope for preventive strategies. There is at least a 10-fold variation in breast cancer incidence rates worldwide [2]. Breast cancer (BC) is the most common cancer among women, comprising 25% of the female cancers.

The casefatality rates are highest in low-resource countries. Although substantial improvement in survival from this disease has been reported in high-income countries such as the USA, the risk continues to increase and survival rates in middle-and low-income countries remain low[3]. In Iraq, BC is the most common type of malignancy among the Iraqi population in general. It accounts for approximately one third of the registered female cancers according to the latest Iraqi Cancer Registry[4], which shows a trend for the disease to affect younger age groups[5]. The aim of study is describing the sociodemographic variables among patients with BC in Baghdad.

Methods:

A cross sectional study that was conducted in Baghdad City during January, February and March 2016 and took place at Al –Amal National hospital for cancer management. This hospital is considered as one of the specialized referral centers for treating cases with tumors. All BC patients attending Al-Amal National Hospital for Cancer Management for follow up were targeted in this study. The list of patients who were scheduled for a clinic session was obtained from the staff nurse in the

**Dept. of Community Medicine, College of Medicine/Baghdad University.*
***Dept. of Community Medicine, College of Medicine/Mustansiriya University.*
Ahmedihss2@gmail.com

early morning to prepare for sample selection. A systematic random sampling method was adopted. The sampling interval minimally varied during the clinic session from 5 to 6. If the selected patient was not able to participate, the next patient on the list was contacted instead. The questionnaire had questions on sociodemographic characteristics including: age, gender, educational attainment, marital status, living arrangement, finical status, and data about disease associated factors like disease duration and treatment modalities. The Researcher contacted each selected patient while waiting to consult the doctor and explained to her the rationale of the study and ensured the patient's ability to read and understand the language of the questionnaire. The respondents were informed that participation in this study is voluntary and does not encompass any payment from either parties and no financial benefits will be made out of the study. Statistical analyses were done using IBMSPSS version 23 computer software (Statistical Package for Social Sciences). Descriptive statistics were done. Quantitative variables were described with mean ± Standard Deviation (SD) while categorical variables were described with frequency and relative frequency.

Results:

A total of 250 female patients with BC were included in the study. Their ages ranged between 42 and 73 years with a mean ± SD of 56 ± 6 years. Those younger than 50 years constituted 19.6% of the sample, while those older than 59 years constituted around a fifth (22%). The highest proportion of study sample completed their secondary school only (54.8%). Married females constituted 60.8%, while single and divorced/widowed constituted 14.8% and 24.4% respectively. Around two fifths (41.6%) were nulliparous and a similar proportion (44%) were unemployed. Furthermore, around a quarter (25.2%) were of rural residence, table 1. As shown in table 2, around a third of cases had their disease diagnosed for longer than 1 year. Chemotherapy was used in four fifths of the study sample (80.8%), while radiotherapy was used in only 4.4% of cases.

Table 1: Frequency distribution of the study sample by sociodemographic variables

	N	%
Age group (years)		
<50	**49**	**19.6**
50-59	**146**	**58.4**
60+	**55**	**22.0**
Total	**250**	**100.0**
Educational Attainment		
Primary school	**65**	**26.0**
Secondary school	**137**	**54.8**
University / higher education	**48**	**19.2**
Total	**250**	**100.0**
Marital Status		
Single	**37**	**14.8**
Married	**152**	**60.8**
Divorced/widowed	**61**	**24.4**
Total	**250**	**100.0**
Parity Status		
Nulliparous	**104**	**41.6**
Parous	**146**	**58.4**
Total	**250**	**100.0**
Occupation		
Skilled	**140**	**56.0**
Unemployed	**110**	**44.0**
Total	**250**	**100.0**
Dwelling status		
Rural	**63**	**25.2**
Urban	**187**	**74.8**
Total	**250**	**100.0**

Table 2: Frequency distribution of the study sample by duration of the disease and type oftreatment

	N	%
Duration of disease since diagnosis		
<=1 year	**159**	**63.6**
>1 year	**91**	**36.4**
Total	**250**	**100.0**
Chemotherapy		
No	**48**	**19.2**
Yes	**202**	**80.8**
Total	**250**	**100.0**
Radiotherapy		
No	**239**	**95.6**
Yes	**11**	**4.4**
Total	**250**	**100.0**

Discussion

The mean age of women with BC in the current study was 56 years. The older age for women with BC is consistent with what reported in the literature as the age is one of the risk factors for developing breast cancer[6]. Another plausible conclusion is the poor, inefficient screening and education programs for detection breast cancer in early life for risky group like women who have a first degree relative (mother, sister, or daughter) with a history of BC as they have double the risk to develop this disease, compared to women with a negative family history[7]. The highest proportion of study sample completed their secondary school and about one fifth obtained a university education. It is expected that education may result in a higher degree of health awareness, better perception of breast related symptoms and less delay in seeking medical care[8]. Thus highly educated women may stand better chances with their BC and experience better prognosis in most of the cases[9]. Married females constituted the highest proportion of the sample, which can indicate that married women are more oriented toward BC. One can also expect high risk of BC among married women due to exposure to stress, life style, obesity, physical inactivity[9] The use of hormonal therapy and long term use of oral contraceptives are other plausible explanations for the increased risk to develop BC[11]. The results of current study revealed that multiparity status was frequent among women with BC, which is consistent with other studies. A study conducted in Pakistan demonstrated a higher risk factor to develop BC among multiparous women[11]. Another study, from Singapore, revealed differences in prevalence of BC and multiparity across ethnic groups[13]. The study showed a high proportion of patients from urban area and this is consistent with the global prevalence data of BC, this might be attributed to one or more factors. Rural communities elsewhere have been shown to have poor access to health care services, poor and insufficient cancer prevention programs, rural residents also tend to have lower income and educational levels than urban populations[14]. In addition, a high risk for women in urban area including hazard exposure and related to lifestyle[15].

Conclusion:

A high proportion of BC patients were married, multiparous, urban residence, and at least completed their secondary school.

Authors' contributions:

Usama Medhat: the primary Author has participated in Study conception, Study design, Acquisition of data analysis, Interpretation of data and Drafting of manuscript.

Ameel F Al-Shawi: Has participated in data analysis, Interpretation of data and critical revision.

Ahmed Samir Al-Nuaimi: Has participated in Study conception, Study design, data analysis, Interpretation of data and critical revision.

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