



Evaluation Breast Cancer Patients in Libya with Comparison Between Female and Male Patients

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Abstract

This study was aimed to evaluate the women's and male's knowledge towards breast cancer in Libya last eight years ago. Data were recorded in the cancer registry of the Department of Oncology at Hospital of Sabrata last eight years ago from 2011 to 2018. Increase over all eight years exactly in 2014. A comparison female and male patients with this study it found remarkably increased in 2015 about 14 patients of male. The occurrence of breast cancer in patients is strongly associated with age 30 – 50 years. Patients with benign breast disease were found 14 patients only in 2011. Conclusion increasing awareness between both genders is the key to early detection of the signs and symptoms, and avoiding worse prognosis. Effective communication and education between cancer patient and health care provider can improve adherence to medication and complete treatment successfully ⁽¹⁸⁾

Keywords: Female and male breast cancer patients screening, in Libya, Cancer incidence

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Introduction:

Breast cancer disease is the main health concern among women worldwide. In developed and developing countries it has been indicated that breast cancer is considered the second leading cause of cancer death. Breast cancer is the main health concern worldwide. In developed and developing countries it has been indicated that breast cancer is considered the second leading cause of cancer death⁽¹⁾. Recent global cancer statistics showed that breast cancer incidence is rising at a faster rate in populations of developing countries⁽²⁾. A number of studies have showed that breast cancer is the most common malignancy and is first killer disease among women beyond the age of 45 years⁽³⁾. Breast cancer in men is a very rare cancer, accounting 1% of all breast cancer with an incidence ratio of 1:100 of men to women and about 1% of all malignancies in men^(4,5). It accounts for <0.2% of all cancer-related deaths among men⁽⁶⁾. Because this disease is rare, no randomized trials have been possible. Most information on male breast cancer has been collected from retrospective studies spanning several decades, and treatment recommendations have been extrapolated from results of trials in female patients. Because the incidence of male breast cancer is rising, there has been an increasing interest in this disease⁽⁷⁾.

Over the past two decades, major improvements have been achieved in the understanding of breast cancer, and cure can be offered if the disease is diagnosed at an early stage. However, the disease is more often diagnosed at more advanced stages (3 or 4) in men, in contrast to women⁽⁸⁾. Globally, breast cancer is the most common form of malignant neoplasia in females, contributing to 23% of all types of cancer⁽⁹⁾. Breast cancer accounts for 10-18% of all cancer-related deaths and

is the most common cause of cancer-related death in industrialized countries, and the third in developing countries⁽¹⁰⁾.

The incidence of certain cancers is diverging between different geographic locations and populations. These differences may associate with environmental, genetic causes and ethnic.⁽¹¹⁾ There may be considerable discrepancies between developing and developed countries, considering the epidemiology of cancer diseases. Conversely, the in-progress fast industrialization and modernization in developing countries, by modifying the people lifestyle and environment, may change the epidemiologic patterns of various cancers in these regions⁽¹¹⁾.

The incidence of cancer is increasing in developing countries because of aging, and cancer-associated lifestyle factors such as smoking, obesity, and physical inactivity^(12,13). Libya is a large country extends over 1,759,540 km², making it the largest nation in the world by size. It is located in epidemiologic transition, and cancer is the third cause of death after ischemic heart diseases and road traffic accidents⁽¹¹⁾. Therefore, it is imperative to illuminate the epidemiological status of cancers in different regions. Hence, it is essential for each region to elucidate the incidence and epidemiology of cancer disease in its own population. When diagnosed in early stages the treatment is more successful⁽¹⁸⁾.

The present study was aimed to evaluate the women's and male's knowledge towards breast cancer in Libya last eight years ago.

Materials and Methods

All histological proven breast cancer cases of males and females that were recorded in the cancer registry of the Department of Oncology at Hospital of Sabrata last eight years ago were reviewed in this retrospective study. Hospital of Sabrata is the largest teaching hospital in Libya with bed capacity of around 1000 beds and the majority of cancer cases in this registry were from all region of Libya.

Cases identification and data collection

Data were obtained from the computer records comprised demographic characteristics such as age, sex, residence, date of diagnosis, and site of cancer. Duplicate entry checking was carried out by comparing the data obtained from the Department of oncology and laboratory data for breast cancer cases that received from the different clinical units and clinics across the region.

Sex-specific and age-specific incidence rates for eight years ago were as defined as a number of breast cancer cases for all eight years ago from 2011 to 2018 and also compare female and male of all region of Libya (Table 1).

Year	Female	Male
2011	154	4
2012	188	1
2013	295	8
2014	429	7
2015	290	14
2016	267	7
2017	208	7
2018	262	7

Table 1: shows all of the breast cancer patients during the years 2011-2018

Incidence rates and standardized incidence rates

Sex-specific and age-specific incidence rates during eight years ago, the histological diagnoses were based on available pathology reports.

that the number of admissions during the study period varied. Many patients entered the hospital for a preliminary diagnosis, and the patients were diagnosed, treated, followed up, and received further therapy at hospital (Table 2).

Year	NO. of breast cancer patients with available history and follow-up information	No. of breast cancer patients with Benign	No. of breast cancer patients Died
2011	141	14	3
2012	185	2	2
2013	303	0	0
2014	431	0	5
2015	303	0	1
2016	272	0	2
2017	212	0	3
2018	269	0	0

Table 2: Breast cancer patients admitted to Hospital of Sabrata during the years 2011-2018

Results and Discussion

Breast cancer is the common cancer among women worldwide⁽¹⁴⁾. Breast cancer is a rare disease among men and male breast cancer is different from female breast cancers with respect to clinical-pathologic characteristics⁽¹⁵⁾. The early detection of breast cancer with clinical examination offers a clear indication for a significant reduction in female mortality many women were not screened. In general, investigations are focused on trends in use, and factors associated with physicians and women’s knowledge, attitude and practice related to mammography⁽¹⁶⁾.

Evidence shows that breast cancer in all region of Libya is on the increase over all eight years exactly in 2014 and in 2011 is markedly lower compare with any year (Figure 1). The apparently slow increase in incidence may be related to improved diagnostic practice (mammography, immunostaining) in the last few years in Libya. This increase may be attributed to the development in health care, including improved diagnostic facilities. The high rate of overall breast cancer cases found among Libyan females. This high rate of breast cancer is similar to the previous reports from Libya and Breast is the most common cancer among Libyan female patients with a frequency of 20%⁽¹¹⁾.

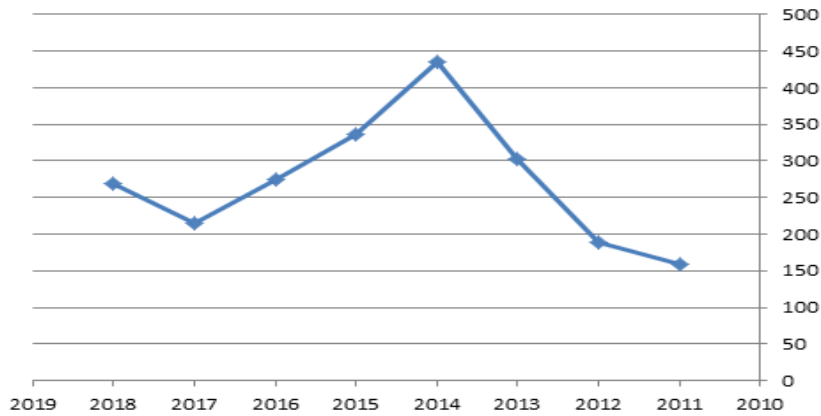


Figure 1: shows that breast cancer during the years 2011-2018

Demographic information included age at diagnosis (<30 years, 30 – 50 years, >50 years). The occurrence of breast cancer in patients is strongly associated with age 30 – 50 years. The breast cancer incidences with age 30-50 years, >50 years, and <30 years were 56.9%, 33.02% and 7.33% respectively. The breast cancer incidence in age <30 years is markedly lower than that >50 years (Table 3). One study suggested the large percentage of patients in advanced stages indicates delayed presentation and late diagnosis⁽¹⁷⁾.

The knowledge level is an important factor in the control of breast cancer. Generally, prevention is the first approach to decrease breast cancer related morbidity. Increasing knowledge regarding the risk

factors is crucial for the primary prevention. In the present study, we found that Libyan people with risk with age 30 -50 years and in 2014. (59.6%), and also patient almost death with this year about 5 patients. Patients with benign breast disease were found 14 patients only in 2011. A comparison female and male patients in this study it found remarkably increased in 2015 about 14 patients of male., but other years nearly the same. The knowledge level is an important factor in the control of breast cancer. Generally, prevention is the first approach to decrease breast cancer related morbidity. Increasing knowledge regarding the risk factors is crucial for the primary prevention.

Year	Age <30 years	Age 30 – 50 years	Age >50 years
2011	11(7.8%)	108(68.3%)	39(24.7%)
2012	11(5.8%)	117(61.9%)	61(32.3%)
2013	26(8.6%)	165(54.4%)	112(36.9%)
2014	32(7.33%)	260(59.6%)	114(33.02%)
2015	46(15.1%)	139(45.7%)	119(39.1%)
2016	35(12.8%)	147(53.6%)	92(33.6%)
2017	20(9.30%)	112(52.1%)	83(38.6%)
2018	30(11.1%)	124(46.1%)	115(42.7%)

Table 3: shows breast cancer patients with age during the years 2011-2018

Conclusion

Breast cancer incidence varies considerably with ages and different eight years ago. Breast cancer was the most common cancer found in females and increased last eight years, but it also occurs in men. Increasing awareness between both genders is the key to early detection of the signs and symptoms, and avoiding worse prognosis. Young women with breast cancer can have psychological and sexual disturbances, the health professional play major role in education to enhance awareness and reduce anxiety. Effective communication and education between cancer patient and health care provider can improve adherence to medication and complete treatment successfully.

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