

Assessment of Student's Knowledge Regarding Breast Cancer at al-Muthanna University-College of Nursing

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ABSTRACT

Background: Although 1 in 8 women in the US may acquire breast cancer, there is optimism for 2019 with 34.8 female breast cancer rates in the governorate of Iraq. Overall, survival rates are rising. Women live longer after beating cancer. Nurse students were studied as future health care professionals.

Objectives: The study's aims are to assess student knowledge of breast cancer at al-Muthanna University-College of Nursing.

Methodology: The descriptive study was used for three months to analyse nursing college students' knowledge and its relationship to age, gender, and education. The study was done at Al-Muthanna University's College of Nursing. It contained 100 male and female students from three academic levels. The data was collected using a questionnaire that included 30 questions about students' understanding about breast cancer.

Results: The results of the study that two-thirds of the students were female and three-quarters of the students their ages were among the youth group, most of them from the second stage, and as for their level of knowledge, it was average or acceptable in relation to the knowledge table of (30) items towards breast cancer, and therefore they obtained a degree ranging within the acceptable level

Conclusion: The researcher concluded from the results of the current study that most of the nursing students at the University of Muthanna, Iraq had acceptable knowledge, but it was not sufficient to limit the spread of breast cancer, and this knowledge came to them to qualify them to educate women in the city

Keywords: Assessment, Student's Knowledge, Breast Cancer.

INTRODUCTION

Worldwide, breast cancer is the most common type of cancer in women, accounting for 23% of all gynaecological malignancies. Additionally, it is the leading cause of cancer death in developing nations with little resources^{1,2}. Breast cancer affects one in every twelve females aged one to 85 in the UK. Breast cancer affects 1 million women annually, accounting for 18% of all gynaecological cancers. By 2021, 85 per 100,000 women will have breast cancer³. Breast cancer is the most frequent type of cancer in women worldwide, and its incidence is increasing, especially in developing countries, where the majority of cases are discovered in their late stages. Additionally, it accounts for 16% of all female cancers and is more prevalent in females than in males. Breast cancer is curable with early detection⁴. In Turkey, cancer is the second largest cause of death. Breast cancer is the most frequent type of cancer in Turkish women, accounting for 26.5 percent of all female cancers⁵. By boosting treatment options and survival rates, early notice and detection of BC can play a vital role in reducing cancer incidence and death⁶. Although key cancer prevention is gaining traction, secondary cancer prevention and early cancer detection remain the primary emphasis for minimizing breast cancer mortality. Ethiopian women are less likely than Western women to be diagnosed with breast cancer early⁷. Late-stage breast cancer is frequently identified due to lack of public awareness, with poor treatment outcomes expected. The stage of breast cancer upon diagnosis and treatment has a big impact on survival. Stage I and II breast cancers have a 5-year disease-free survival rate of 85%, but stage III has a 10%⁸.

METHODOLOGY

The descriptive study design was implemented during the period from 9/31/2021 to 1/1/2022 to assess the knowledge of students of the College of Nursing and its relationship with their age, gender

and educational level. The study was conducted at the College of Nursing - University of Al-Muthanna. The research sample included (100) male and female students from three study stages. The data was collected using the questionnaire that was built by the researcher for the purposes of the study. The questionnaire consists of separate parts: the first part included demographic data and contained (3) items, and the second part included students' knowledge (30) items. The credibility of the questionnaire content was established by (10) experts, which was a statistically acceptable value (r: 0.93). Data were collected through direct interviews with students, and were analysed by applying descriptive statistical analysis (frequency, percentage) in addition to inferential data analysis (weighted mean) using the statistical package for the social sciences (SPSS ver. 22).

RESULTS

Table 1: The Distribution of (100) Nursing Students.

Students' Socio-Demographics	Groups	F.	%	Cum. Percent
Gender	Female	66	66%	34
	Male	34	34%	100
		100	100%	
Age	19-24	78	78%	6
	25-30	16	16%	84
	31-35	6	6%	100
Level of Education	2 nd stage	45	45%	21
	3 rd stage	34	34%	66
	4 th stage	21	21%	100
	Total	100	100%	

F: frequency, %: percentage

The table shows that 66% of the 100 students were female, 75% were between the ages of 19-24, and 46% were from the second stage.

Table 2: Assessment of Student's Knowledge regarding General information about Breast Cancer.

No.	Items	Responses	F.	%	M.S	Severity
1.	Cancer is a genetic disease.	True	25	25%	1.59	M
		False	9	9%		
		Don't know	66	66%		
2.	Breast cancer affects both sexes.	True	16	16%	1.53	M
		False	21	21%		
		Don't know	63	63%		
3.	Breast cancer is a leading cause of death among women after lung cancer.	True	35	35%	2.27	M
		False	57	57%		

		Don't know	8	8%		
4.	Early detection of breast cancer increases the chances of recovery and survival.	True	38	38%	1.99	M
		False	23	23%		
		Don't know	39	39%		
5.	Breast cancer: - It is an abnormal cell growth.	True	30	30%	1.83	M
		False	23	23%		
		Don't know	47	47%		
6.	Malignant breast lumps are often painless.	True	33	33%	2.13	M
		False	37	37%		
		Don't know	40	40%		
7.	Breast cancer is classified into three stages based on (tumor size and Extent of damage to the lymph nodes and age of the person).	True	10	10%	1.52	M
		False	32	32%		
		Don't know	58	58%		
8.	The purpose of staging breast cancer is to determine the likelihood of spread tumors.	True	23	23%	1.92	M
		False	46	46%		
		Don't know	31	31%		
9.	Milk duct carcinoma is the most common type of breast cancer.	True	22	22%	2.09	H
		False	65	65%		
		Don't know	13	13%		
10.	Being older than 35 years of age is a risk factor for breast cancer.	True	12	12%	1.66	M
		False	32	32%		
		Don't know	66	66%		
11.	The risk factor for breast cancer is the presence of a family history of infection (mother, sister, or even father).	True	24	24%	1.84	M
		False	36	36%		
		Don't know	40	40%		
12.	One of the risk factors is delayed childbearing.	True	12	12%	1.86	M
		False	62	62%		
		Don't know	26	26%		
13.	One of the risk factors for breast cancer is not breastfeeding.	True	10	10%	1.87	M
		False	67	67%		
		Don't know	23	23%		
14.	One of the symptoms of breast cancer is a difference in size or color (an increase in the size of one breast without the other).	True	17	17%	1.91	M
		False	57	57%		
		Don't know	26	26%		
15.	One of the symptoms of breast cancer is itching.	True	3	3%	1.88	M
		False	82	82%		
		Don't know	15	15%		
16.	One of the symptoms of breast cancer is abnormal discharge from the breast.	True	9	9%	1.37	L
		False	19	19%		
		Don't know	72	72%		
17.	One of the symptoms of breast cancer is redness of the skin of the breast.	True	71	71%	2.65	H
		False	23	23%		
		Don't know	6	6%		
18.	Breast cancer There is rarely pain.	True	27	27%	1.63	M
		False	9	9%		
		Don't know	64	64%		
19.	Clinical Breast Examination Cancer Diagnostic Methods (by the caregiver).	True	82	82%	2.66	H
		False	2	2%		
		Don't know	16	16%		
20.	The time of a monthly breast self-examination, on the 7-10th day of the menstrual cycle.	True	6	6%	1.2	L
		False	8	8%		
		Don't know	86	86%		
21.	Breast self-examination increases the chances of early detection of breast cancer.	True	74	74%	2.64	H
		False	16	16%		
		Don't know	10	10%		
22.	Women over the age of 40 should get a mammogram	True	14	14%	1.53	M
		False	25	25%		
		Don't know	61	61%		
23.	If the size of the cancer mass is large we need chemotherapy immediately after surgery.	True	7	7%	1.16	L
		False	2	2%		
		Don't know	91	91%		
24.	Chemotherapy is not limited to cancer cells, but rather includes normal cells that divide rapidly, such as skin cells, hair follicles and bone marrow cells.	True	55	55%	2.47	M
		False	37	37%		
		Don't know	8	8%		
25.	Radiation therapy is given after the tumor removal process to destroy the remaining microscopic cancer cells.	True	21	21%	1.45	M
		False	3	3%		
		Don't know	76	76%		
26.	Nurses can influence both the physical and emotional recovery of breast cancer patients.	True	70	70%	2.58	H
		False	18	18%		
		Don't know	12	12%		
27.	The nurse is responsible for educating women about coping with risks, maintaining quality of life and participating in support groups.	True	79	79%	2.64	H
		False	6	6%		
		Don't know	15	15%		
28.	One of the nurse's roles is to monitor the harmful effects of radiation and chemotherapy.	True	82	82%	2.65	H
		False	1	1%		

		Don't know	17	17%		
29	One of the nurse's roles is to reduce fear and anxiety and improve resilience to disease.	True	91	91%	2.85	H
		False	3	3%		
		Don't know	6	6%		
30	One of the nurses' roles is to encourage women to have health education and knowledge of breast cancer.	True	62	62%	2.42	M
		False	18	18%		
		Don't know	20	20%		
Total MS					1.99	M

No: Number; F: Frequency; %: Percentage; MS: Mean of scores; L: Low; M: Moderate; H: High

This table indicates that the overall average score for all thirty items was (1.99), which is considered a satisfactory level of knowledge about breast cancer among female students at Al-Muthanna University - College of Nursing.

The third table shows the levels of the three-stage students in the College of Nursing and shows that the largest number of them, 63, got a score ranging between 31-60 degrees within the average level of scores on their knowledge of breast cancer, as shown in Figure (1).

Table 3: Student's knowledge level of Breast Cancer.

No.	Level of knowledge	F.	%	Severity
1	0 – 30 Marks	10	10%	Low level
2	31-60 Marks	63	63%	Intermediate level
3	61-90 Marks	27	27%	High Level
		100	100%	

No: Number; F: Frequency; %: Percentage

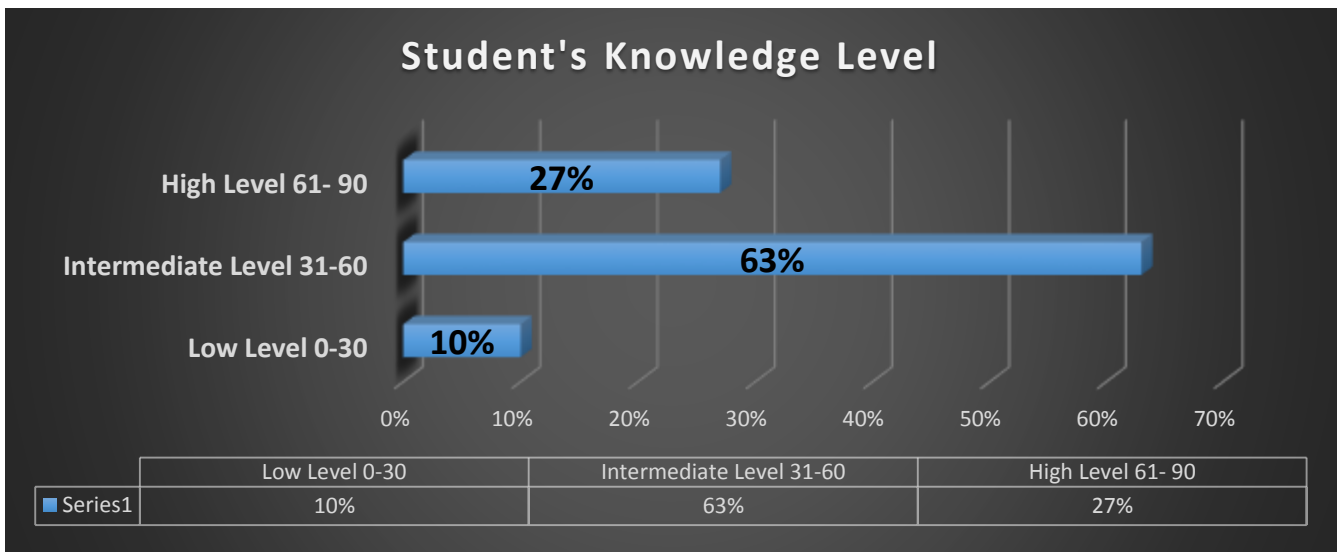


Figure 1: It represents the students' knowledge levels distributed according to the grades obtained about breast cancer..

CONCLUSION

The study sample consists of a hundred nursing students at the University of Al-Muthanna and from three different stages, the second, third and fourth, both sexes, to assess their knowledge about breast cancer and according to the results of the study shows that 66% of the students were female, 75% were between the ages of 19-24, and 46% were from the second stage. The cross-sectional study used questionnaires to assess 387 educated Iraqis (302 females and 85 males) on their knowledge, attitudes, and behaviors about breast cancer and BSE. 48.3% practiced mad cow disease. The most common explanation given was a lack of knowledge about proper technique application ¹.

This table indicates that the overall average score for all thirty items was (1.99), which is considered a satisfactory level of knowledge about breast cancer among female students at Al-Muthanna University - College of Nursing. The study focused on chosen secondary school students in the Abuja District Municipal Council. It included 287 students. Their mean age was 16.51.4. 163 respondents (56.8%) were unaware of breast cancer, whereas 217 (75.6%) were unaware of BSE. The least recognized risk factors for breast cancer include being female (39.7%), followed by obesity and advanced age (39.7%). Breast cancer and mad cow disease were primarily media-driven. Only 29 (10.1%) of responders reported BSE. BSE knowledge is intertwined with BSE practice⁴. A descriptive cross-sectional study It happened in Manisa, Turkey, at a high school. The study included 718 high

school students. Breast self-examination was poorly understood in high school, and only a few students reported completing monthly self-examination. The most common reason for not completing a breast self-exam was lack of information (98.5 percent). Most pupils had no idea about breast cancer risk factors. The students' most common risk factor was a family history of breast cancer (68.7 percent). Age, grade level, understanding of breast cancer, and knowledge of breast self-examination were found to be linked with breast self-exam practice⁵. Participants came from the medical campus, the women's campus, and the fine arts and design college. Most participants knew about breast cancer, but not about risk factors or warning signs/symptoms. Knowledge about BSE performance was lacking. This underscores the need to educate young women in the UAE about breast cancer and mad cow disease⁹. In February and March 2008, Universiti Sains Malaysia conducted a survey. When 200 students were picked at random, their average total knowledge score was 60.7 percent. Indian pupils knew less about breast cancer than Chinese and Malaysian students (P 0.05)¹⁰.

The third table shows the levels of the three-stage students in the College of Nursing and shows that the largest number of them, 63, got a score ranging between 31-60 degrees within the average level of scores on their knowledge of breast cancer A self-administered questionnaire was used to assess individuals' awareness and knowledge of breast cancer. The survey was completed by 595 medical and non-medical undergraduate

students. Our research shows that Angolan university students, whether in medical or non-medical disciplines, are unaware about breast cancer. The majority of participants were unaware of early breast cancer symptoms including changes in nipple color or shape, despite knowing the value of monthly breast self-examination. In general, most posts emphasized the necessity of raising college student awareness of breast cancer¹¹. A cross-sectional study was conducted at Makerere University on 204 female students. A standardized questionnaire was used to collect data for two months. Female students had a high level of knowledge (98.0 percent) about breast cancer and BSE practices (76.5 percent). Over half of students (61.3 percent) are aware of breast cancer's risk factors and symptoms³. The current pilot study assessed the knowledge of 157 female university students in Muscat about breast cancer screening (breast self-examination), risk factors, and symptoms. The study discovered that students were more knowledgeable about breast cancer symptoms than they were on breast cancer risk factors. Additionally, the poll revealed that while the majority of students recognize that BSE is the most common and easiest method of detecting breast cancer, they are unaware of the disease's frequency and timing¹².

Recommendations: At the end of the scientific research, it was recommended to include the topic of breast cancer within the curricula of the Ministry of Education and all universities to raise the awareness of female students and to give continuous and intensive educational courses for women and students.

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Informed consent: All participants were requested to consent before to the survey.

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