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Original Research Article

Study on Clinical Presentation of Breast Carcinoma of 80 Cases

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Abstract: *Background:* Breast carcinoma is one of the most frequent malignancies in women which can cause tumor deaths. Although there are measures for early recognition like screening with development in treatment procedures but many patients may eventually develop this malignancy. *Methdos:* This study was a prospective study which was carried out at the department of Oncology in Bangabandhu Sheikh Mujib Medical University, Dhaka, Bangladesh. The study was conducted in between the period of 2017-2019. The total sample size for this study was 80. *Result:* 38(47.5%) were aged between 41-50 years. 78(98%) participants were female and only 2(2%) patients were male. Lump in the breast was seen in all 80(100%) cases and followed by pain in the breast was present in 59(73.8%) patients, nipple discharge in 16(20%), skin fixation over lump in 14(17.5%), fixation of lump to chest wall in 11(13.8%) and nipple retraction in 21(26.3%). The most patients had carcinoma on left breast and 36(45%) in right breast and only 2(3%) had problem on both sides. Infiltrating duct carcinoma was found in most 74(92.5%) cases and followed by Mucinous carcinoma in 3(3.8%), Medullary carcinoma in 1(1.3%), Tubular carcinoma in 1(1.3%) and Papillary carcinoma in 1(1.3%). Upper & outer quadrant was seen in most 34(42.5%) cases and followed by upper & inner quadrant in 19(23.8%), lower & outer quadrant 8(10%), lower & inner quadrant in 6(7.5%), Central in 11(13.8%) and whole breast in 2(2.5%). Stage I was found in 8(10%) cases and followed by stage II in 11(13.8%), most of the respondents 43(53.8%) were in stage III and stage IV in 18(22.5%). *Conclusion:* The breast cancer is the most common form of cancer among the women over the world. Although there are many risk factors but the possibility of emerging breast cancer mostly increases with rising age. So, effective measures for the early detection and proper treatment is required.
Keywords: Breast Carcinoma, Malignancy, Breast cancer.

INTRODUCTION

Breast carcinoma is one of the most frequent malignancies in women which can cause tumor deaths. Although there are measures for early recognition like screening with development in treatment procedures but many patients may eventually develop this malignancy. A study reported that about one fourth women face breast related disease in their life time mostly after adolescence [1, 2]. The worst is that it can become a cause of death among women in the form of breast cancer. Breast cancer results from uncontrolled proliferation of malignant cells resulting appearance of a lump or a mass in the breast. The incidence of breast cancer has been rising worldwide [3]. This malignancy has wide familial implications as it can plague a mother, a sister, a wife, or a daughter. However, breast cancer related disease usually increases with age [4, 5]. Besides, high fat diet, family history, early menarche, late menopause, late first full-term pregnancy, null parity, the choice not to breastfeed are also some of the risk factors for breast related diseases [6-8]. Breast cancer is now has become the most prevalent malignancy found among women in both developed and

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developing countries and ranked second after cervical cancer [9, 10]. Another study claimed that this incidence is three times high in urban area than that of rural area [11]. A recent study showed that breast cancer is the most common cancer and also in USA and Western World it is the second leading cause of cancer death of women who are aged more than 30 years [12, 13]. In western countries, breast cancer was diagnosed among 27% of all female cancer and one woman in every 14 have chance to develop breast cancer in their life time [14, 15] In Bangladesh the incidence of this malignancy is also rising. Due to less research in this field, it is difficult to know the exact statistics about the incidence of breast carcinoma in Bangladeshi women. Hence, the patients who suffer from breast cancer showed poor outcome due to late presentation, diagnosis and treatment. Though, there are a number of studies had been carried out on carcinoma breast in Bangladesh but this is not sufficient. Hence, this study aims to investigate the incidence of carcinoma in cases of breast lumps presenting in a tertiary care hospital in Bangladesh.

OBJECTVES OF THE STUDY
The objective of this study was to investigate the incidence of carcinoma in cases of breast lumps presenting in a tertiary care hospital in Bangladesh.

MATERIALS AND METHODOLOGY
This study was a prospective study which was carried out at the department of Oncology in Bangabandhu Sheikh Mujib Medical University, Dhaka, Bangladesh. The study was conducted in between the period of 2017-2019. The total sample size for this study was 80.

Inclusion Criteria
- The patients who were admitted in different surgical units with clinical diagnosis of Breast Carcinoma for elective surgery.
- The patients who were identified with palpable or doubtful Breast lumps.

Exclusion Criteria
- The patients who were less than 10 years were excluded.
- The patients who were unwilling to give consent after knowing the study purpose.

Detailed history of each patient under study were recorded with special attention to history of Breast cancer in their family, their age of menarche, lactating history, menopausal status & use of oral contraceptives. Important and relevant findings on thorough physical examination will be recorded. Collected data were analyzed to find out the risk factors, clinical presentation & age incidence of breast cancer in our country.
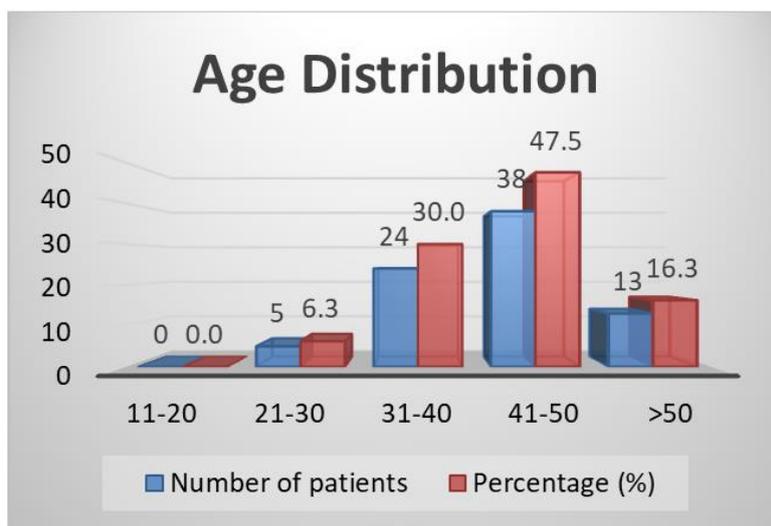
RESULT

Figure I: Age Distribution of the Respondents

Figure I show the age distribution of the respondents. Most of the respondents 38(47.5%) were aged between 41-50 years and followed by 5(6.3%) from 21-30 years, 24(30%) form 31-40 years and 13(16.3%) were >50 years.
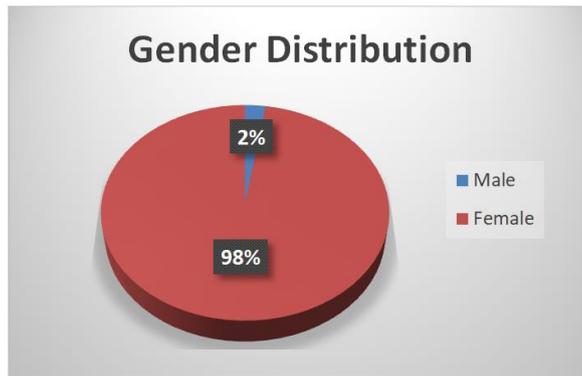
Figure II: Gender Distribution of the Respondents

Figure II shows the gender distribution of the respondents. The most 78(98%) participants were female and only 2(2%) patients were male.

Table I: Clinical Presentation of the Disease (n=80)

Presenting features	N	Percentage (%)
Lump in the breast	80	100.0
Pain in the breast	59	73.8
Nipple discharge	16	20.0
Ulceration over lump	18	22.5
Peau'd orange	13	16.3
Skin fixation over lump	14	17.5
Fixation of lump to chest wall	11	13.8
Nipple retraction	21	26.3

Table I shows the clinical presentation of the disease among all the study people. Lump in the breast was seen in all 80(100%) cases and followed by pain in the breast was present in 59(73.8%) patients, nipple discharge in 16(20%), ulceration over lump in 18(22.5%), Peau'd orange in 13(16.3%), skin fixation over lump in 14(17.5%), fixation of lump to chest wall in 11(13.8%) and nipple retraction in 21(26.3%).
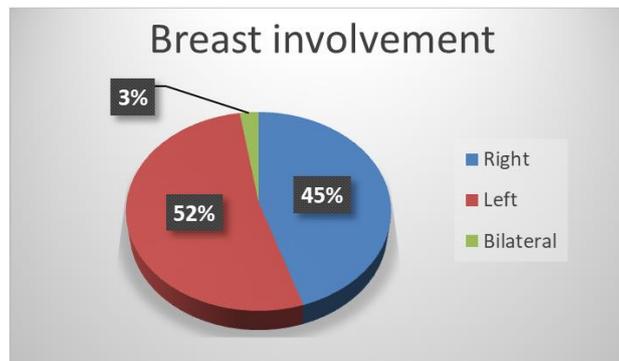

Figure III: Involvement of the breast by primary lesion (n=80)

Figure III denotes the involvement of the breast by primary lesion among the study people. The most patients had carcinoma on left breast and 36(45%) in right breast and only 2(3%) had problem on both sides.

Table II: Histological types of carcinoma breast lump (n=80)

Histological types	N	Percentage (%)
Infiltrating duct carcinoma	74	92.5
Mucinous carcinoma	3	3.8
Medullary carcinoma	1	1.3
Tubular carcinoma	1	1.3
Papillary carcinoma	1	1.3

Table II illustrates the histological types of carcinoma breast lump of the patients. Infiltrating duct carcinoma was found in most 74(92.5%) cases and followed by Mucinous carcinoma in 3(3.8%), Medullary carcinoma in 1(1.3%), Tubular carcinoma in 1(1.3%) and Papillary carcinoma in 1(1.3%).

Table III: Carcinoma involved the different quadrant of the breast (n=80)

Quadrant involved	N	Percentage (%)
Upper & outer quadrant	34	42.5
Upper & inner quadrant	19	23.8
Lower & outer quadrant	8	10.0
Lower & inner quadrant	6	7.5
Central	11	13.8
Whole breast	2	2.5

Table III represents the carcinoma involved the different quadrant of the breast among the patients. Upper & outer quadrant was seen in most 34(42.5%) cases and followed by upper & inner quadrant in 19(23.8%), lower & outer quadrant 8(10%), lower & inner quadrant in 6(7.5%), Central in 11(13.8%) and whole breast in 2(2.5%).
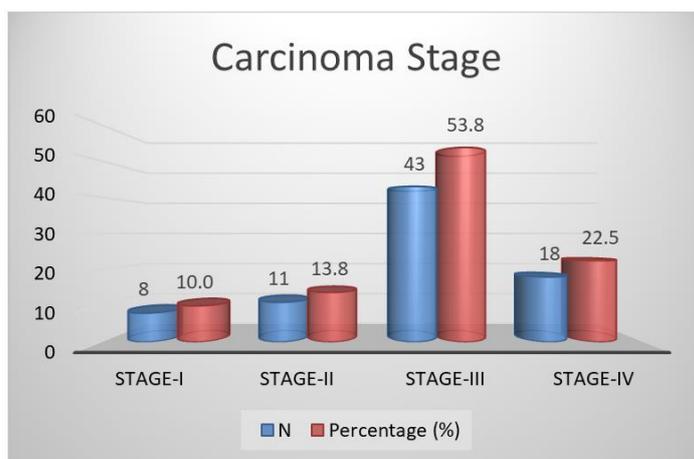

Figure IV: Presentation of carcinoma breast according to stage (IUAC)

Figure IV shows the presentation of carcinoma breast according to stage (IUAC). Stage I was found in 8(10%) cases and followed by stage II in 11(13.8%), most of the respondents 43(53.8%) were in stage III and stage IV in 18(22.5%).

DISCUSSION

Breast cancer is the most common cancer prevailing in women now a day. It is one of the leading syndromes which are affecting mostly the adult women. It has become an important public health concern due to the screening, research and treatment related health care costs [16]. In this present study most of the respondents 47.5% were aged between 41-50 years and followed by 6.3% from 21-30 years, 30% from 31-40 years and 16.3% were >50 years [Figure I]. This finding is consistent with the study of Raju *et al,* [17]. Also the study conducted at Lahore by Salina and Usmani observed the incidence of malignancy was 23.2% and 38.9% in the 4th and 5th decade respectively which was also consistent with the present study [18]. In this study, the most 98% participants were female and only 2% patients were male [Figure II]. About sex distribution of the carcinoma breast Haradhan Deb Nath *et al,* in their study showed only 2% male patients of carcinoma breast and 98% female patients which is similar to the findings of this present study [19]. So, it is observed that men have a lower risk of developing breast cancer comparing to the female. Lump in the breast was seen in all 100% cases and followed by pain in the breast was present in 73.8% patients, nipple discharge in 20%, ulceration over lump in 22.5%, Peau'd orange in 16.3%, skin fixation over lump in 17.5%, fixation of lump to chest wall in 13.8% and nipple retraction in 26.3% [Table I]. Parveen *et al,* in their study reported breast lesion presented with breast lump in 95% of their patients, 5% with nipple discharge and 5% with pain [20]. The most patients had carcinoma on left breast and 45% in right breast and only 3% had problem on both sides [Figure III]. This result is very much similar to the study of Malik *et al,* where they reported that left breast involvement was present in 54% while right breast 46% [21]. Infiltrating duct carcinoma was found in most 92.5% cases and followed by Mucinous carcinoma in 3.8%. Medullary carcinoma in 1.3%, Tubular carcinoma in 1.3% and papillary carcinoma in 1.3% [Table II]. Among the histological types of breast carcinoma Haradhan Deb Nath *et al,* in their study showed 82% patients were with duct cell carcinoma

(NST), 12% patients were ductal carcinoma, 4% patients were mucinous carcinoma, medullary 2%, papillary 2%. But in their study, there were no such patients who were with and metaplastic carcinoma [19]. Upper & outer quadrant was seen in most 42.5% cases and followed by upper & inner quadrant in 23.8%, lower & outer quadrant 10%, lower & inner quadrant in 7.5%, Central in 13.8% and whole breast in 2.5% [Table III]. Malik *et al,* in their study found 29 patients with a lump in the upper and outer quadrant, 9 had a lump in the upper and inner quadrant and 4 patients had a palpable lump in the lower and outer quadrant. There were 5 and 3 patients the upper and outer quadrant to be the dominant quadrant to have a palpable lump [21]. Stage I was found in 10% cases and followed by stage II in 13.8%, most of the respondents 53.8% were in stage III and stage IV in 22.5% [Figure IV]. Out of 50 clinically suspected breast malignancies, Haradhan Deb Nath *et al,* showed 10% patients were in stage-I, 14% patients were in stage-II, 54% in stage- III and 22% patients were in stage-IV. These findings suggest that most of the patients were in advanced malignancy and strongly similar with the present study [19].

CONCLUSION

The breast cancer is the most common form of cancer among the women over the world. Although there are many risk factors but the possibility of emerging breast cancer mostly increases with rising age. So, effective measures for the early detection and proper treatment is required. Besides, the women with greater risk for developing breast cancer should be identified properly. Regular physical examinations of breast should be done by doctors. Any suspicious change or disorder must have a cytological diagnosis properly with the consultation of health professionals. A less expensive screening technique should be implemented so that every woman who is at risk of developing this disorder can afford the treatment cost. Also, health education is required with seminar and well publicity by radio, TV, newspaper, mobile phone, website and social media in this purpose so that the women can be more conscious and can take preventive measures.

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