

A Prevalence of Breast Lumps In Patients Attending Surgery OPD In A Secondary Centre, Ahmedabad , Gujarat.



Medical Science

KEYWORDS : Breast lumps, Fibroadenoma, Fibroadenosis ,Carcinoma breast, mastitis, breast abscess, Paget's disease of nipple,

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ABSTRACT

Background: Breast lesions can be of various types from inflammatory to benign to malignant. Some lesions are common in young females while others are more common in elderly age group. *Aim:* The study aim were intend to profiling prevalence and finding out age-related presentation of breast lumps. To find out the prevalence of inflammatory, benign and malignant breast lesions and age related pattern of presentation of patients with various breast lesions. *Materials and method:* The study comprises analysis of 100 patients attending for breast symptoms in surgical opd at GMERS Hospital, Sola, Ahmedabad, Gujarat. Detailed history was recorded and clinical examination was conducted. Fine needle aspiration cytology (FNAC) were done and results recorded. Suspicious cases were confirmed by histopathology examination. *Results:* Out of the 100 cases analysed, 69 % were benign, 18 % malignant and the remaining 13% were inflammatory. Among the benign breast disease fibroadenoma was most common accounting for 54 (54%) of total cases followed by 9 (9 %) fibroadenosis, 2 (2%) sebaceous cyst over breast, 3 (3 %) fibrocystic disease , 1(1%) Gynaecomastia and in the inflammatory lesions 12(12%) were breast abscess and 1(1%) was mastitis. Among malignant lesions, 17 (17%) were ductal adenocarcinoma, 1 (1%) paget's disease of nipple. In the age group 15-30 fibroadenoma comprised of 79.6 % cases. The youngest age of carcinoma breast in our study is 32 year , and older age is 75 year. *Conclusion:* Fibroadenoma is more common in benign breast lesions whereas ductal adenocarcinoma in malignant breast lesion.

Introduction

Breast is a glandular organ influenced by hormones in females with various structures giving rise to different types of lesion and lumps. Benign lesions of breast are the most common lesions which account for 90% of the clinical presentation related to breast.[1] Of all breast disorders, palpable breast lump is second most common presentation, the pain being the first.[2]

The consequences of breast lumps besides creating anxiety result into carcinoma and cause unbearable pain and deformity.[3] Breast tissue in is under the hormonal influence that results in changes throughout reproductive life.[4] Fibroadenoma of the breast is a common cause of a benign breast lump in pre menopausal women .[5] Fibrocystic disease is a histological term that refers clinically to a large group of syndrome presented as lump or lumpiness.[6] The purpose of this study is to analyze breast lesions causing breast lump with special reference to patients younger and older than 30 years of age diagnosed by fine-needle aspiration (FNA) and to evaluate the histology of the cases diagnosed as suspicious of malignancy in FNA. Early diagnosis will help in better management of the case, reduce undue anxiety of the patient in benign cases and reduce morbidity and mortality.

Material and Methods

The present prospective study was done in department of Surgery , GMERS Medical college and hospital, Sola, Ahmedabad, Gujarat. A total of 100 patients were attended with breast symptomatology i.e., lump, pain or lumpiness over a period of 12 months during January 2015 to January 2016 at Our hospital. All Patients informed about study and verbal & written consent was taken. All the cases were included in the study. The findings of history and clinical examination were recorded. Fine needle aspiration cytology (FNAC) was done in patients with palpable lump in breast and suspicious lesions. Suspected cases were sent for histopathological examination. The data were analysed by using various statistical techniques.

Results

Table-1 Age wise distribution pattern

Age	Benign	Inflammatory	Malignant
< 16	0	0	0
16 – 20	10	4	0
21 – 25	20	6	0
26 – 30	17	0	0
31 – 35	12	2	2
36 – 40	4	0	0
41 – 45	4	1	0
46 – 50	0	0	0
51 - 55	1	0	6
56 - 60	1	0	6
61 - 65	0	0	2
> 66	0	0	2
Total	69	13	18

Table-2 Cytological findings wise distribution:

Pathology	No. of patients
Fibroadenoma	54
Fibroadenosis	9
Fibrocystic disease	3
Seb. Cyst breast	2
gynaecomastia	1
Breast abscess	12
mastitis	1
ductal carcinoma	17
paget disease of nipple	1

Table-3 Benign breast disease wise distribution

Age	Fibroad-enoma	Fibroad-enosis	Fibro-cystic disease	Cyst	gynaeco-mastia
< 16	0	0	0	0	0
16 – 20	10	0	0	0	0
21 – 25	20	0	0	0	0
26 – 30	13	2	0	0	0
31 – 35	7	5	0	0	0
36 – 40	2	2	1	0	1
41 – 45	2	0	2	0	0
46 – 50	0	0	0	0	0
51 – 55	0	0	0	1	0

56 – 60	0	0	0	1	0
61 – 65	0	0	0	0	0
> 66	0	0	0	0	0
Total	54 (78%)	9(13%)	3(4.34%)	2 (2.89%)	1 (1.44%)

Discussions:

The youngest patient included in the study was 18 years old (fibroadenoma) and the oldest was 75 years old (ductal carcinoma). The largest number of cancer breast was found in 51-55 year age group accounting for 8 (44%) cases. The youngest case encountered was 32 yrs old and the oldest being 75 yrs old. Gynaecomastia was diagnosed in 1 male cases who presented at the age of 34 yrs age. Incidence of benign conditions of breast is significantly higher than malignant conditions. M. Kumar *et al*[7] asserted that in Indian rural population the benign breast diseases are 5 to 10 times more common than breast cancers; while Aisha Memon *et al*[8] referred that in west benign breast lesions are 10 times more common than breast cancers. In present study (2016), benign breast lesions are 4 times more than cancerous lesions. M. Kumar *et al*[7] observed that incidence of benign breast diseases varies in different geographical areas, and benign breast diseases are common in developing countries but due to lack of education women disregard the breast lump. They suggested that general features of individual breast diseases like incidence, age distribution, symptoms and palpatory findings are very important and beneficiary for the management of these lesions. Illiteracy, social taboo, unawareness resulting into delay in diagnosis in both benign and malignant lesions. Such delay in malignant lesions is associated with poor prognosis. Aisha Memon *et al*[8] described total 58.8% benign cases in a series of 500 cases which is quite less in number as compared to the study conducted by Adesunkanmi *et al*[9] in Nigeria where 87.2% patients had benign breast lumps. In present study (2016), benign lesions (including 13% inflammatory cases) were found in 82% cases. Therefore, our findings were similar to results of Adesunkanmi *et al*[9] Vissa Shanthi *et al*[10] studied 100 breast lesions and found 28% malignant pathology on cytological grounds, on further study out of 28 cases 23 cases were diagnosed as ductal cell carcinoma, 2 as lobular carcinoma, 1 as medullary carcinoma, 1 as malignant Phyllodes and 1 case was found to be mucinous carcinoma respectively. It was observed that upto 15.5% cases were malignant in a study of Pradhan *et al*[11] in Nepal. In another study reported from Nigeria, malignant lesions were diagnosed approximately 40% by Mayun *et al*[12] In our study, we found 18 (18%) cases malignant , 17 (94.4%) cases of which comprising ductal cell carcinoma and 1(5.6%) case of paget's disease. Mortality and incidence is relatively lower in developing countries and other parts of globe in comparison to western population.[13] The highest incidence was reported in European population living in Zimbabwe i.e. 122.7 in 1 lac population. In US, non- Hispanic whites had a rate of 86.2 per 1 lac population. With contrast to this Asian population has comparatively lower incidence as in Japan 31.1, China 26.5, India (Mumbai) 28.2 per 1 lac population. Balkrishna B Yeole *et al*[14] also reported life time risk (0 to 74 years) of breast cancers in Mumbai was 3.3% (1 in 30), Chennai 2.4% (1 in 42) and in Trivandrum it was 2.05% (1 in 50) respectively. In US life time risk of developing breast cancer during entire span of life is 1 in 8 i.e., 12.5%. Kelsay *et al* reported that breast cancer is 100 times more common in women than in men. The incidence of breast cancer increases with age, more common in urban population and in women of higher socioeconomic group. They also suggested that apart from genetic causes, change in life style is responsible for increase in incidence of malignant breast lesions. In present study, out of 100 cases, 18 cases were malignant. Reason for such findings is possibly that, these are secondary hospital data and breast malignant cases are referred to medical college hospital from large surrounding rural, suburban and urban population. Out of 100 cases, 69(69%) were benign lesions and 18 (18%) malignant and 13 (13%) were of inflammatory pathology. Benign to malignant breast disease ratio was calculated as

4:1. Most common benign lesion was fibroadenoma 54 (54 % of all lesions). Eight cases (14.81 %) were bilateral, 6 cases(11.11%) had multiple fibroadenoma, 5 cases (9.25%) were recurrent fibroadenoma. Out of 100, total 1 male breast lumps were found which was gynaecomastia. Out of 18 malignant cases, 17 (94.4%) were ductal cell carcinoma and 1 (5.6%) Paget's disease. Maximum number of cancer patients were found in the 51-55 year age group.

Conclusion

Fibroadenoma is more common in benign breast lesions whereas ductal adenocarcinoma in malignant breast lesion.

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