### KNOWLEDGE, ATTITUDE AND PRACTICE REGARDING BREAST CANCER AMONG RURAL WOMEN AGED BETWEEN 20 – 40 YEARS IN HEBBAL

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ABSTRACT: INTRODUCTION: Breast cancer, the most common cancer causing the largest burden of cancer deaths in women worldwide, accounts for 19-34% of all cancer cases among women in India. Lack of awareness regarding the disease coupled with non- affordability or non- availability of facilities for early detection and treatment are some of the major determinants of this. **OBJECTIVE**: To access the knowledge and attitude regarding the Breast cancer among 20-40 year women and to access the knowledge, attitude and practice of Breast Self-Examination among 20-40 year women. MATERIAL AND METHODS: A cross sectional survey was conducted in the month of December, 2013 in the CHTC Hebbal, Gulbarga attached to M.R. Medical College. A total of 220 female aged between 20-40 years with no personal history of breast cancer and ability to understand the semi – structured questionnaire were recruited in the study. A verbal consent was obtained from all the women who agreed to participate in the study. **RESULTS:** that out of the 220 study subjects, majority of the females belong to the age group 20-24 years (37.27%) and illiterate (33.18%). Majority 179(81.36%) females were married and majority 203(92.27%) were Hindus. Only 80 (36.36%) of the total respondents have heard of breast cancer and had obtained their information on breast cancer through their friends (45%) and television (22.25%). Most of the females perceive weight loss(41.25%) as the major symptom of breast cancer followed by lump in the breast (21.25\%), bleeding nipples (15%) and about 18(22.5%) were unaware of any of the symptoms. only 11(13.75%) females were aware of Breast Self-Examination as a method for detection of breast cancer, while only 7 (8.75%) practice Breast self-Examination CONCLUSION: The results of this study have demonstrated the extremely low level of breast awareness among community-dwelling women in Hebbal. Emphasis should be given on encouraging women to practice BSE.

**KEYWORDS:** Breast cancer, awareness, Breast self-Examination, Rural.

**INTRODUCTION:** Breast cancer, the most common cancer causing the largest burden of cancer deaths in women worldwide <sup>1</sup>, accounts for 19-34% of all cancer cases among women in India.<sup>1, 2</sup> Nearly 1.7 million new cases diagnosed in 2012 (second most common cancer overall). This represents about 12% of all new cancer cases and 25% of all cancers in women.<sup>3</sup> The main reason for this escalating mortality is lack of awareness and late diagnosis of disease.<sup>4, 5</sup>

Breast cancer used to be the disease of developed countries but its incidence is rising in developing countries including India. Breast cancer among Indian women is the second most common cancer after cervix and is already the leading cancer in certain metros. This has been attributed to increase life expectancy, increase urbanization and adoption of western lifestyles. Lack of awareness regarding the disease coupled with non-affordability or non-availability of facilities for early detection and treatment are some of the major determinants of this. Today more than 50% of cancer patients seek treatment in advanced stage and the onus is primarily shared by the inadequate

awareness about breast cancer<sup>6</sup>. As there is no exact etiological agent for breast cancer, early diagnosis and treatment is of paramount importance in improving the morbidity and mortality status<sup>7</sup>. Early diagnosis can lead to better prognosis hence there is a need for awareness of breast cancer and screening for breast cancer. The screening methods being breast self-examination (BSE), clinical breast examination (CBE) and mammography. Unlike CBE and mammography BSE is inexpensive and can be done by woman herself. There is a need to know the awareness level and screening practices in a country with wide sociodemographic status. Therefore this study was done to determine the awareness and practices of breast cancer screening. Baseline data on women's knowledge is essential in developing an effective and targeted awareness campaign and instill practice habits to prevent delayed presentations of breast cancer

#### **OBJECTIVE:**

- 1. To access the knowledge and attitude regarding the Breast cancer among 20-40 year women.
- 2. To access the knowledge, attitude and practice of Breast Self-Examination among 20-40 year women.

#### **MATERIAL AND METHODS:**

**PLACE OF STUDY:** The present study was carried out in CHTC Hebbal, Gulbarga attached to M.R. Medical College.

**STUDY POPULATION:** The study population comprised of Women aged between 20-40 years and who are permanent resident of the village.

**STUDY DESIGN**: The present study is a Cross sectional study undertaken to know the Knowledge, Attitude and Practice regarding Breast Cancer among women aged between 20-40 years in a rural area Hebbal, attached to M. R. Medical College, Gulbarga.

**INCLUSION CRITERIA:** All the Women aged between 20-40 years belonging to Hebbal were Interviewed and Included in the Study.

#### **EXCLUSION CRITERIA:**

- 1. Those who were not interested/co-operative in the study
- 2. Those women aged other than 20-40 years.
- 3. Those women who were unavailable during the study.

**SAMPLE SIZE:** A cross sectional survey was conducted in the month of December, 2013 in Hebbal Village. A total of 220 female aged between 20-40 years with no personal history of breast cancer and ability to understand the semi –structured questionnaire were recruited in the study. A verbal consent was obtained from all the women who agreed to participate in the study. At 95% confidence interval and 10% permissible error, a sample size of 220 was calculated. Considering the refusal rate to be 10%, 242 females were contacted to reach predetermined sample.

**METHOD OF DATA COLLECTION:** Data was collected using pre-tested questionnaires administered by a trained intern, designed to obtain relevant socio-demographic characteristics, knowledge, attitude and practice towards breast cancer. The questionnaire, including questions on Socio-

demographic information relating to age, educational status, occupational status, place of residence and marital status, and specific questions about knowledge of the common symptoms and signs of breast cancer, as well as attitude towards breast cancer and practice of breast self-examination (BSE) was developed based on information in the literature on risk-factors, common symptoms and signs of breast cancer, and common methods of early detection for the disease. The questions were completely close-ended included were multiple choice questions and checklist with an option of a free response when such responses are not in the checklist.

**ANALYSIS:** Data were analyzed with SPSS v 12 software. Categorical variables were described by using frequency distribution and percentage.

**RESULTS:** Table no 1 shows that out of the 220 study subjects, majority of the females belong to the age group 20-24 years (37.27%) followed by 25-29 years(26.36%) and the least belong to the age group of 35-40 years(13.18%) respectively. Majority 179(81.36%) females were married and majority 203(92.27%) were Hindus. Educational Status of the respondents showed that most of the females were illiterate (33.18%) followed by primary education (21.36%), secondary education (20.45%) and least were graduates (7.27%) respectively. Majority of the females were farmers/labors 117(53.18%) followed by Housewife/student 95(43.18%) and the least were self-employed 8(3.64%).

Table no 2 shows that out of the 220 study subjects, only 1(0.45%) female had a positive family history of Breast Cancer were as about 219(99.55%) did not have a positive history of Breast Cancer.

Table 3 shows that only 80 (36.36%) of the total respondents have heard of breast cancer. Majority of those who were aware of breast cancer obtained their information on breast cancer through their friends (45%) and television (22.25%).Out of the 80 respondents who are aware of breast cancer, 20(25%) perceive the cause as being brought about by a medical condition, 9(11.25%) old age, 8(10%) diet, 6 (7.5%) spiritual, 5 (6.25%) hereditary and 2 (2.5%) because of excessive breastfeeding. Most of the females perceive weight loss(41.25%) as the major symptom of breast cancer followed by lump in the breast (21.25%), bleeding nipples (15%) and about 18(22.5%) were unaware of any of the symptoms. About 27 (33.75%) of the females believe that the breast cancer can be treated if it is diagnosed early whereas 7(8.75%) females perceive that there is no treatment for breast cancer and about 46(57.5%) did not knew about the treatment.

Table 4 shows that only 11(13.75%) females were aware of Breast Self-Examination as a method for detection of breast cancer, while only 7 (8.75%) practice Breast self-Examination.

The attitude towards breast cancer is depicted in Table 5. It shows that 46(57.5%) and 45(56.25%) of the female respondents disagreed that breast cancer patients should be isolated or it is a punishment from God respectively, while the majority 56(70%) of them agreed that breast

Cancer patients should be allowed to live freely in the community and to be supported 68(85%). Majority 37(46.25%) agree that Breast cancer patients should not be allowed to breast feed whereas about 28(35%) disagree to it.

**DISCUSSION:** The present study was done among 220 females between the age group of 20-40 years in a Rural area Hebbal. Majority of the females belong to the age group 20-24 years (37.27%) and

about 179(81.36%) females were married and most of them 203(92.27%) were Hindus. Educational Status of the respondents showed that most of the females were illiterate (33.18%). Majority of the females were farmers/labors 117(53.18%) followed by Housewife/student 95(43.18%) and the least were self-employed 8(3.64%) respectively.

National screening program for breast cancer is not established well in our country. As we can clearly see in our present study that only 80 (36.36%) of the total respondents have heard of breast cancer as a disease. Similar observation were noted by a study done by P Somdatta<sup>8</sup> in New Delhi where in 56% of the respondents were aware of breast cancer as a disease and a study done by Babatunji Omotara<sup>9</sup> in Nigeria showed that about 58% of the respondents were aware of breast cancer as a disease whereas a study carried out by Okobia<sup>10</sup> in southern Nigeria (Edo state) which reported that the mean knowledge score was about 42.3% and only 21.4% were aware of breast cancer.

The findings of the study showed that only 1(0.45%) female had a positive family history of Breast Cancer were as about 219(99.55%) did not have a positive history of Breast Cancer. Similar observations were noted by a study done by S Puri<sup>11</sup> among North Indian Women which showed that nearly 85% did not have a positive history of Breast Cancer.

Majority of those who were aware of breast cancer obtained their information on breast cancer through their friends (45%) and television (22.25%).Similar observations were noted by a study done by N. K Irurhe et al<sup>12</sup> in Nigeria which showed that about 30.5% of the females got aware of the Breast cancer through Television/Radio and about 8.5% through friends. whereas a study done by D.V. Bala et al<sup>13</sup> done in Ahmedabad showed that the Main sources of knowledge were Health professionals (34.4%), magazines (32.8%) and media (14%).

Out of the 80 respondents who are aware of breast cancer, 20(25%) perceive the cause as being brought about by a medical condition, 9(11.25%) old age, 8(10%) diet, 6 (7.5%) spiritual, 5 (6.25%) hereditary and 2 (2.5%) because of excessive breastfeeding. Similar observations were noted by a study done by Omotara et al<sup>9</sup> in Nigeria which showed that (21.4%) perceive the cause as being brought Spiritual reason, Excessive breastfeeding(2.3%), Diet (5.1%), Medical condition (28.2%) and Old age(2.6%). Whereas a study done by Somadatta et al <sup>8</sup> in New Delhi showed that 3% women thought breast feeding is a risk factor. Other factors that that were mentioned were obesity (11%), excessive intake of fat (1%) and old age (4.9%).

Most of the females perceive weight loss(41.25%) as the major symptom of breast cancer followed by lump in the breast (21.25%), bleeding nipples (15%) and about 18(22.5%) were unaware of any of the symptoms. About 27 (33.75%) of the females believe that the breast cancer can be treated if it is diagnosed early whereas 7(8.75%) females perceive that there is no treatment for breast cancer and about 46(57.5%) did not knew about the treatment. whereas a study done by KC Kanaga<sup>14</sup> in Malaysia revealed that 72% knew that bloody discharge from the nipple was abnormal, while 76.8% knew that there is an association between lumps and breast cancer.

The findings of the study showed that only 11(13.75%) females were aware of Breast Self-Examination as a method for detection of breast cancer, while only 7 (8.75%) practice Breast self-Examination. Whereas study done by Anita Khokhar<sup>15</sup> in New Delhi showed that only 36% had heard the term breast self-examination while Only 13.37% practice Breast self-Examination.

The attitude towards breast cancer is depicted in Table 5. It shows that 46(57.5%) and 45(56.25%) of the female respondents disagreed that breast cancer patients should be isolated or it

is a punishment from God respectively, while the majority 56(70%) of them agreed that breast Cancer patients should be allowed to live freely in the community and to be supported 68(85%). Majority 37(46.25%) agree that Breast cancer patients should not be allowed to breast feed whereas about 28(35%) disagree to it. Whereas a study done by Omotara et al<sup>9</sup> in Nigeria which showed that the attitude of the respondents regarding risk factors of breast cancer is worrisome with 20.3% still believing that breast cancer is a punishment from God which is similar to the reasons reported in the study by Ibrahim and Odusanya.<sup>16</sup> Even more worrisome is the finding that almost a quarter of respondents 22.9% and 21.2% agreed that breast cancer patients should be isolated and not allowed to live freely in the community respectively.

**CONCLUSION:** The results of this study have demonstrated the extremely low level of breast awareness among community-dwelling women in Hebbal. Emphasis should be given on encouraging women to practice BSE. Health education programs should be targeted at women through various media including leaflets, television, and radio. In addition, health education should be channeled through women friendly agencies/organizations such as hospital antenatal and postnatal clinics, religious organizations, and women's self-help groups. In the rural areas, it may be easier to reach a wide cross-section of women through organizations built around the pre-existing community institutional framework, apart from electronic media which is widely available in South India. Available data suggest that people prefer to learn about cancer-related issues from their doctors and health organizations. Within the hospitals, we suggest that breast awareness education be integrated into already existing health education programs. We recommend that policy guidelines be framed and established that will enhance adequate and urgent dissemination of knowledge about breast cancer to all women. In addition, doctors should endeavor to educate women on "breast awareness" during regular physician visits for other health issues.

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Age in years	Frequency	Percentage
20-24 years	82	37.27%
25-29 years	58	26.36%
30-34 years	29	13.18%
35-40 years	51	23.18%
Total	220	100%
Marital Status	Frequency	Percentage
Married	179	81.36%
Unmarried	31	14.09%
Widow	10	4.55%
Total	220	100%
Religion	Frequency	Percentage
Hindu	203	92.27%
Muslim	17	7.73%
Total	220	100%
Educational Status	Frequency	Percentage
Illiterate	73	33.18%

Primary	47	21.36%
Secondary	45	20.45%
PUC/Diploma	39	17.73%
Graduate	16	7.27%
Total	220	100%
Occupational Status	Frequency	Percentage
occupational status	rrequency	I ci centage
Housewife/student	95	43.18%
-	I P	-
Housewife/student	95	43.18%
Housewife/student Farmer/Labor	95 117	43.18% 53.18%

Family history of Breast Cancer	Frequency	Percentage		
No	219	99.55%		
Yes	01	0.45%		
Total	220	100%		
II) Distribution of the study subjects regarding family history of Breast Cancer				

Awareness about Breast cancer	Frequency	Percentage	
Yes	80	36.36%	
No	140	63.64%	
Total	220	100%	
Source of knowledge	Frequency	Percentage	
Family	5	6.25%	
Friends	36	45.00%	
Health Worker	12	15.00%	
News Paper	7	8.75%	
Television	18	22.5%	
Other	1	1.25%	
Total	80	100%	
Causes of Breast cancer	Frequency	Percentage	
Hereditary	5	6.25%	
Diet	8	10%	
Medical	20	25%	
Excessive Breast feeding	2	2.5%	
Spiritual	6	7.5%	
Old age	9	11.25%	
Don't know	29	36.25%	
Total	80	100%	

Symptoms of Breast cancer	Frequency	Percentage
Lump	17	21.25%
Bleeding Nipples	12	15%
Weight Loss	33	41.25%
Don't Know	18	22.5%
Total	80	100%
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Cure for Breast Cancer	Frequency	Percentage
Yes	27	33.75%
	1 0	0
Yes	27	33.75%
Yes No	27 7	33.75% 8.75%

Knowledge about Breast cancer

Awareness about BSE	Frequency	Percentage	
Yes	11	13.75%	
No	69	86.25%	
Total	80	100%	
Practice about BSE	Frequency	Percentage	
Yes	07	8.75%	
No	73	91.25%	
Total	80	100%	
IV) Awareness and Practice of BSE among women who are aware of Breast Cancer			

Attitude towards Breast Cancer		Agree		Disagree		Not sure	
		%	No	%	No	%	
Breast cancer patients should be isolated	25	31.25%	46	57.5%	9	11.25%	
Breast cancer patients should be allowed to live freely in the community	56	70%	18	22.5%	6	7.5%	
Breast cancer is a punishment from God	19	23.75%	45	56.25%	16	20%	
Breast cancer patients should be provided with support and home care by the community	68	85%	7	8.75%	5	6.25%	
Breast cancer patients should not be allowed to breast feed	37	46.25%	28	35%	15	18.75%	
V) Assessment of Attitude towards Breast Cancer among Females 20-40 years							

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