An Experimental Study to Assess the Effectiveness of Planned Teaching Programme on Knowledge and Practice of Breast Cancer and Breast Self-Examination Among Female Health Workers

Sumitra Jangde[1*], Abhilekha Biswal[2], Seema Santosh[3]

[1]M.Sc. Nursing Final Year, Department of Nursing, Pt. DDU Ayush & HS University, Raipur, India
[2]Professor, Department of Child Health Nursing, P. G. College of Nursing, Bhilai, India
[3]Associate Professor, Department of Nursing, P. G. College of Nursing, Bhilai, India

Abstract: Breast cancer is a disease in which cells in the breast grow out of control. There are different kinds of breast cancer. The kind of breast cancer depends on which cells in the breast turn into cancer. The term "breast cancer" refers to a malignant tumor that has developed from cells in the breast. Usually, breast cancer either begins in the cells of the lobules, which are the milk producing glands, or ducts, the passages that drain milk from the lobules to the nipple. Cancer is a major public health problem globally. Breast cancer is the most frequent malignancy in women worldwide and is curable in 70-80% of patients with early-stage, non-metastatic disease. The incidence of cancer is increasing rapidly in many low- and middle-income countries like India due to the epidemiological transition. At present, breast cancer is the leading cancer in females in many countries including India. Worldwide, WHO (2020), there were 2.3 million women diagnosed with breast cancer and 685 000 deaths globally. As of the end of 2020, there were 7.8 million women alive who were diagnosed with breast cancer in the past 5 years, making it the world's most prevalent cancer. There are more lost disability-adjusted life years (DALYs) by women to breast cancer globally than any other type of cancer. Objectives 1) To assess the pre-test score on knowledge and practice on breast cancer and breast self-examination among female health workers. 2) To assess the post-test score on knowledge and practice on breast cancer and breast self-examination among female health workers. 3) To find out the effectiveness of planned teaching program regarding breast cancer and breast self-examination.4) To assess the correlation between knowledge and practice regarding breast cancer and breast self-examination among female health selected community Bhilai (C.G.) 5) To find out the association between pre-test score on knowledge and practice regarding breast cancer and breast self-examination with selected socio demographic variables. Major findings of study are over all analysis of pre-test and post-test knowledge score regarding breast cancer and breast self-examination among female health workers, in pre-test majority score 47 (78.33%) had poor knowledge, 13(21.67%) had average knowledge regarding breast cancer and breast self-examination. While in post-test knowledge score of female health workers majority score 45(75%) had good knowledge, and 15 (25%) had average knowledge regarding breast cancer and breast self-examination. So, it indicates that knowledge score improved from average to good after planned teaching programme on breast cancer and breast self-examination. Major findings of study are over all analysis of pre-test and post-test practice score regarding breast self-examination among female health workers, that in pre-test majority score 36 (60%) had average practice, 17(28.33%) had good practice, 7(11.67%) had poor practice regarding breast self-examination while in post-test practice score of female health workers majority score 57(95%) had good practice, and 3(5%) had average practice regarding breast self-examination. So, it indicates that practice score improved from average to good after planned teaching programme on breast self-examination.

Keywords: breast cancer, breast self-examination, female health workers, knowledge planned teaching programme, practice.

1. Introduction

Women in every part of the world are an important being as they have the power to shape the youth of the nation. The communities should be considering the image of women as an angel who cares for all family members equally. Traditionally, the women are associated with the roles are giving birth to a child, educating the child with good values, making a family circle from house, taking care of all members of the family. The female child and adolescent girls are base to improve the communities of a girl maintains her health properly during adolescent period, she will make a healthy mother a healthy baby and lead to a healthy nation.

Breast cancer is the leading cancer in females in many countries including India. A breast cancer risk factor is anything that makes it more likely you'll get breast cancer. But having one or even several breast cancer risk factors doesn't necessarily mean you'll develop breast cancer. Many women who develop breast cancer have no known risk factors other than simply being women. Factors that are associated with an increased risk of breast cancer include. Being female, increasing age, personal

*Corresponding author: sumi94jangde@gmail.com

history of breast conditions, family history of breast cancer, inherited genes that increase cancer risk.

In the current scenario women mainly affected by breast cancer, so female health workers play crucial role in prevention of breast cancer and practice of breast self-examination by creating awareness in the society to reduce the incidence of breast cancer, by considering the above researcher felt there is a need to conduct a study on effectiveness of planned teaching programme on knowledge and practice regarding breast cancer and breast self-examination among female health workers.

2. Material and Method

Experimental one group pre-test post-test research design was utilized to an experimental study to assess the effectiveness of planned teaching programme on knowledge and practice of breast cancer and breast self-examination among female health workers of selected community Bhilai (C.G.), where subject were selected by Non probability purposive sampling. An extensive review of literature was undertaken various related concepts the study adopted the modified bertalanffy general system theory model target population was female health workers. Purposive sampling technique was used to obtain 60 sample. The tool was questionnaire on demographic profile and knowledge regarding breast cancer and breast self-examination and the tool was checklist on practice regarding breast self-examination. The tool was validated by experts a pilot study was conducted on 10 female health workers in selected community Bhilai. In my study the reliability in self-structured questionnaire was the findings revealed that study was feasible and pre-test to test the reliability of the tool (r=0.90) for knowledge and (r=0.74) (Self-structured questionnaire) for practice was found to be statistically correct.in post-test the reliability of the tool (r = 0.94) for knowledge and (r = 0.83) (checklist) for practice was found to be statistically correct. To find out the effectiveness of planned teaching programme regarding breast cancer and breast self-examination among female health workers selected community Bhilai.

"t" test to evaluate the effectiveness of planned teaching programme on knowledge and practice regarding breast cancer and breast self-examination among female health workers. In the relation to analysis of effectiveness of planned teaching programme with the knowledge score on breast cancer and breast self-examination was found to be "t" value 35.74 is greater than table value 3.47 at P<0.001 level of confidence, the data signifies that the planned teaching programme was very effective in term of gain in knowledge regarding breast cancer and breast self-examination. In relation to analysis of effectiveness of planned teaching programme with practice score on breast self-examination. Was found to be "t" value 12.40 is greater than table value 3.47 at P<0.001 level of confidence, the data signifies that the planned teaching programme was very effective in term of gain in practice regarding breast self-examination.

3. Result

- Overall analysis of knowledge and practice score.

- Over all analysis of pre-test and post-test knowledge score regarding breast cancer and breast self-examination out of 60 female health workers, in pre-test majority score 47 (78.33%) had poor knowledge, 13(21.67%) had average knowledge regarding breast cancer and breast self-examination. While in post-test knowledge score of female health workers majority score 45(75%) had good knowledge, and 15 (25%) had average knowledge regarding breast cancer and breast self-examination. Major findings of study are over all analysis of pre-test and post-test practice score regarding breast self-examination among female health workers, that in pre-test majority score 36 (60%) had average practice, 17(28.33%) had good practice, 7(11.67%) had poor practice regarding breast self-examination while in post-test practice score of female health workers majority score 57(95%) had good practice, and 3(5%) had average practice regarding breast self-examination.
- Area wise analysis of knowledge and practice score in post-test area of knowledge about anatomy and physiology of breast mean score 3.36 & mean percentage 84%. Sign and symptoms mean score 2.44 & mean percentage 81.33%. Treatment of breast cancer mean score 4.86 & mean percentage 81%.

Effectiveness of planned teaching programme with knowledge score

The finding state effectiveness of planned teaching programme with knowledge score revealed that increase the knowledge as calculated "t" value 35.74 is greater than table value 3.47 at P<0.001 level of confidence, the data signifies that the planned teaching programme was very effective in term of gain in knowledge regarding breast cancer and breast self-examination.

Effectiveness of planned teaching programme with practice score.

The finding state effectiveness of planned teaching programme with practice score Revealed that increase the practice as calculated "t" value 12.40 is greater than table value 3.47 at P<0.001 level of confidence, the data signifies that the planned teaching programme was very effective in term of gain in practice regarding breast self-examination.

Correlation between pretest knowledge and practice score out of 60 female health workers.

Correlation between pretest knowledge and practice score reveals that there is very low positive correlation between pretest knowledge and practice score as the Karl Pearson correlation calculated "r" value-0.08, which is (-1>r<0).

Correlation between posttest knowledge and practice score.

Correlation between posttest knowledge and practice score reveals that there is moderate positive correlation between posttest knowledge and practice score as the Karl Pearson correlation calculated "r" value 0.30, which is (-1> r <0) which means knowledge and practice is improved after implementation.

Table 1
Over all analysis of pre-test and post-test knowledge score regarding breast cancer and breast self-examination among female health workers (N=60)

Level of Knowledge	Pretest Knowledge Score		Posttest Knowledge Score	
	Frequency (f)	Percentage (%)	frequency (f)	Percentage (%)
Good (25-36)	0	0	45	75
Average (13-24)	13	21.67	15	25
Poor (0-12)	47	78.33	0	0
Total	60	100	60	100

Table 2
Over all analysis of pretest and posttest practice score regarding breast self-examination among female health workers (N=60)

Level of practice	Pre-Test Practice Score		Post-Test Practice Score	
	Frequency (f)	Percentage (%)	frequency (f)	Percentage (%)
Good	17	28.33	57	95
Average	36	60	3	5
Poor	7	11.67	0	0
Total	6	100	6	100

4. Discussion

In present study over all analysis of pre-test and posttest knowledge score regarding breast cancer and breast self-examination among female health workers, in pre-test majority score 47 (78.33%) had poor knowledge, 13(21.67%) had average knowledge regarding breast cancer and breast self-examination. While in post-test knowledge score of female health workers majority score 45(75%) had good knowledge, and 15 (25%) had average knowledge regarding breast cancer and breast self-examination.

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Over all analysis of pre-test and post-test practice score regarding breast self-examination among female health workers, that in pre-test majority score 36 (60%) had average practice, 17(28.33%) had good practice, 7(11.67%) had poor practice regarding breast self-examination while in post-test practice score of female health workers majority score 57(95%) had good practice, and 3(5%) had average practice regarding breast self-examination.

So, it indicates that practice score improved from average to good after planned teaching programme on breast self-examination.

Above finding are supported to a study conducted by Salina Shrestha-Bogati, (May 2020) Which was carried out at knowledge, attitudes and practices regarding breast cancer among college students in Nepal. The cross-sectional study conducted in Nepal by Shrestha (2012) found poor level of knowledge regarding breast cancer. More than half participants (61%) responded painless lump as a sign for breast cancer followed by blood discharge from nipple. Knowledge on risk factors of breast cancer in the participants was very low. In another study conducted by Shrestha et al (2017), 78% participants responded growth of extra lump in breast as a primary sign and symptoms of breast cancer. It was followed by painless breast mass, change in shape and size of breasts.

5. Conclusion

On the basis of finding of the study, following conclusions were drawn:

- After intervention in post-test all students have good knowledge after intervention in the area of knowledge about anatomy and physiology of breast mean score 3.36 & mean percentage 84% and sign and symptoms mean score 2.44 and mean percentage 81.33%.
- This study was done to evaluate the effectiveness of planned teaching programme on knowledge about breast cancer and breast self-examination among female health workers. The result of this study showed that planned teaching programme was effective in improving knowledge among female health workers.
- "t" test reveals the post-test knowledge score was "t" value 35.74 is greater than table value 3.47 at $P<0.001$ and practice score was found to be "t" value 12.40 is greater than table value 3.47 at $P<0.001$.
- There was significant association between age in years, year of work experience in knowledge score and significant association between educational qualifications in practice score of female health workers.

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