

Dissertation Report

At

TATA Steel Foundation, Jamshedpur

**A pilot study on the level of awareness on Breast Cancer and Breast Self-Examination
practices among the rural women of Jharkhand**

by

Name Priyanka Chakraborty

Enroll No. PG/21/074

Under the guidance of

Dr Mukesh Ravi Raushan

PGDM (Hospital and Health Management)

2021-23



**International Institute of Health Management Research
New Delhi**

Dissertation Report

at

TATA Steel Foundation, Jamshedpur

**A pilot study on the level of awareness on Breast Cancer and Breast Self-Examination
practices among the rural women of Jharkhand**

by

Name Priyanka Chakraborty

Enroll No. PG/21/074

Under the guidance of

Dr Mukesh Ravi Raushan

PGDM (Hospital and Health Management)

2021-23



**International Institute of Health Management Research
New Delhi**

The certificate is awarded to

Priyanka Chakraborty

In recognition of having successfully completed his/her
internship in the department of

Public Health

And has successfully completed his/her Project on

**A pilot study on the level of awareness on Breast Cancer and Breast Self-Examination
practices among the rural women of Jharkhand.**

Date of Submission

07-06-2023

TATA Steel Foundation, Jamshedpur

He/ She come across as a committed, sincere & diligent person
who has a strong drive & zeal for learning.

We wish him/her all the best for future endeavors.


Lead, Public Health (New Programs)
Tata Steel Foundation


Head, Public Health
Tata Steel Foundation

TO WHOMSOEVER IT MAY CONCERN

This is to certify that Privanka Chakraborty student of PGDM (Hospital & Health Management) from International Institute of Health Management Research, New Delhi has undergone internship training at TATA Steel Foundation from 28th February, 2023 to 7th June, 2023.

The Candidate has successfully carried out the study designated to her during internship training and his/her approach to the study has been sincere, scientific and analytical.

The Internship is in fulfillment of the course requirements.

I wish her all success in all his/her future endeavors.



Dr. Sumesh Kumar
Associate Dean, Academic and Student Affairs
IIHMR, New Delhi



Mentor

IIHMR, New Delhi

Certificate of Approval



The following dissertation titled '**A pilot study on the level of awareness on Breast Cancer and Breast Self-Examination practices among the rural women of Jharkhand.**' at **TATA Steel Foundation** is hereby approved as a certified study in management carried out and presented in a manner satisfactorily to warrant its acceptance as a prerequisite for the award of **PGDM (Hospital & Health Management)** for which it has been submitted. It is understood that by this approval the undersigned do not necessarily endorse or approve any statement made, opinion expressed or conclusion drawn therein but approve the dissertation only for the purpose it is submitted.

Dissertation Examination Committee for evaluation of dissertation.

Name

Ekta Sarona
Anandhi Ramachandran

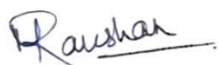
Signature

Certificate from Dissertation Advisory Committee

This is to certify that **Ms. Priyanka Chakraborty**, a graduate student of the **PGDM (Hospital & Health Management)** has worked under our guidance and supervision. He/ She is submitting this dissertation titled '**A pilot study on the level of awareness on Breast Cancer and Breast Self Examination practices among the rural women of Jharkhand.**' at '**TATA STEEL FOUNDATION**' in partial fulfillment of the requirements for the award of the **PGDM (Hospital & Health Management)**.

This dissertation has the requisite standard and to the best of our knowledge no part of it has been reproduced from any other dissertation, monograph, report or book.



Institute Mentor Name,
Designation, *Assistant Professor.*

Organization *IIMR-Delhi*



INTERNATIONAL INSTITUTE OF HEALTH MANAGEMENT RESEARCH,
NEW DELHI

CERTIFICATE BY SCHOLAR

This is to certify that the dissertation titled '**A pilot study on the level of awareness on Breast Cancer and Breast Self Examination practices among the rural women of Jharkhand.**' and submitted by PRIYANKA CHAKRABORTY with the enrollment No. PG/21/074 under the supervision of DR MUKESH RAVI RAUSHAN for award of PGDM (Hospital & Health Management) of the Institute carried out during the period from 28.02.2023 to 14.06.2023 represents my original work and has not formed the basis for the award of any degree, diploma, associate ship, fellowship, titles in this or any other Institute or other similar institution of higher learning.


Signature



**INTERNATIONAL INSTITUTE OF HEALTH
MANAGEMENT RESEARCH (IIHMR)**

Plot No. 3, Sector 18A, Phase-II, Dwarka, New Delhi- 110075
Ph. +91-11-30418900, www.iihmrdelhi.org

CERTIFICATE ON PLAGIARISM CHECK

Name of Student (in block letter)	Dr./Mr./Ms.: PRIYANKA CHAKRABORTY		
Enrollment/Roll No.	PGI/21/074	Batch Year	2021-2023
Course Specialization (Choose one)	Hospital Management	Health Management	Healthcare IT <input checked="" type="checkbox"/>
Name of Guide/Supervisor	Dr./Prof.: MUKESH RAVI RAUSHAN		
Title of the Dissertation/Summer Assignment	A PILOT STUDY ON THE LEVEL OF AWARENESS ON BREAST CANCER AND BREAST SELF EXAMINATION PRACTICES AMONG THE RURAL WOMEN OF JHARKHAND.		
Plagiarism detect software used	"TURNITIN"		
Similar contents acceptable (%)	Up to 15 Percent as per policy		
Total words and % of similar contents Identified	15%		
Date of validation (DD/MM/YYYY)	6/7/2023		

Guide/Supervisor

Name: Dr. Mukesh Ravi Raushan

Signature: *[Signature]* 06/07/2023

Report checked by

Institute Librarian

Signature: *[Signature]*

Date: *[Date]*

Library Seal



Student

Name: Priyanka Chakraborty

Signature: *[Signature]*

[Signature]

Dean (Academics and Student Affairs)

Signature:

Date:

(Seal)

FEEDBACK FORM

Name of the Student: *Priyanka Chakraborty*

Name of the Organization in Which Dissertation Has Been Completed:

Dissertation has been completed: TATA Steel Foundation

Area of Dissertation: *NCD (Non-communicable diseases) and VBD (Vector-borne diseases) control program.*

Attendance: *100%*

Objectives achieved: *Yes.*

Deliverables: *-To revisit the operational manual of NCD and VBD control program and contribute to its implementation part.
-To conduct a pilot study on the level of awareness on breast cancer and BSE practices in Jharkhand.*

Strengths: *Hard working, determined.*

Suggestions for Improvement:

Suggestions for Institute (course curriculum, industry interaction, placement, alumni):

Signature of the Officer-in-Charge Organization Mentor (Dissertation)



Date: *6.06.2023*

Place: *Jamshedpur.*

The level of awareness on breast cancer and breast self-examination practices: A pilot study of rural women in Jharkhand

Priyanka Chakraborty

(Health IT Stream)

Background: Breast cancer is the most common type of cancer across the globe. It is the second most frequent disease in India with an incidence of cases in the rural areas, being twice than in urban areas. But it can be detected, treated and prevented at an early stage with the help of sound knowledge over breast cancer and breast self-examination practices. A pilot study was conducted to understand the level of awareness regarding breast cancer and practices of breast self-examination, the attitudes of the rural women of Jharkhand with respect to their different socioeconomic and socio demographic status in the access of care and early detection.

Methodology: A pilot study was carried out among a sample of 108 (n=108) rural women of Jharkhand, aging 18 to 55 years of age to support the main study. The participants were interviewed based on the structured, self-administered questionnaire which was used to gather information on their level of awareness, attitudes and practices on breast cancer and assessment of knowledge on breast self-examination based on the socio-economic, socio-demographic, educational strata. The data was entered into the Microsoft Advanced excel spreadsheet and further analysis and interpretation was done in the SPSS software version 25 using descriptive statistics.

Results: A total of 108 (n=108) women from the rural areas of Jharkhand were included in the study, with a distribution of 25% of tribal community and 75% of other minority communities. 73.1% of the population have attended school education in their lifetime and 26.9% of the women did not attended school. About 91.7% of the sample population have not completed their school education. It is found that 72.2% of the women population had heard about breast cancer and 60.2% of the women in the rural population of Jharkhand are not aware about the breast self-examination practices.

Conclusion: From this study we can conclude that the majority of the population have basic education in their lifetime. They possessed knowledge regarding breast cancer but lacked knowledge over BSE practices. We also found out that majority of the population tend to seek late medical treatment due to the factors related to societal discrimination, fear of getting excluded from the society and other body image difficulties. These issues can be addressed by promoting community awareness programs, behavior change practices and capacity building of the primary healthcare workers.

Keywords: Breast cancer; breast self-examination, awareness, women, rural

Acknowledgements

As the three months of duration for the dissertation has come to an end, I would like to extend my heartfelt gratitude to each and everyone who have helped me to complete this project and provided me a platform for enriching my knowledge, expertise and experiences. I would also like to thank my organization mentors, Dr Anuj Bhatnagar Sir (Head of Public Health), Dr Bharath J sir (Public health specialist), Perves Alam sir (Lead- New Programs), Dr Prabal Ghosh Sir (Medical Officer) and Dr Putul Bagti Ma'am (Medical Officer) for providing me the opportunity to work in this project as a public health project intern at the TATA Steel Foundation, Jamshedpur.

I am also very grateful to Dr Mukesh Ravi Raushan sir (Assistant Professor, IIHMR Delhi) for giving me constant support and guidance throughout the project. Lastly, I would like to thank all my teachers, friends and family for their tireless contribution and consistent support in every part of the journey.

Priyanka Chakraborty

Table of contents		
Sl no.		Page no.
	Certificates	2-8
	Abstract	9
	Acknowledgement	10
	Table of contents	11
	List of figures	12
	List of tables	13-14
	List of abbreviations	14
CHAPTER 1	Introduction	15-16
1.1	Aim	16
1.2	Objective	16
CHAPTER 2	Review of literature	17-18
CHAPTER 3	Methodology	18
CHAPTER 4	Results	19-33
CHAPTER 5	Discussion	34
CHAPTER 6	Conclusion	35
CHAPTER 7	Recommendation	36
CHAPTER 8	Appendix	37-56
8.1	Pictorial Journey	37-41
8.2	Informed Consent	42-43
8.3	Questionnaires	44-52
8.4	Plagiarism Report	53-56
CHAPTER 9	Bibliography	57

List of Figures		
Sl no.		Page no.
1	Figure1: Knowledge percentage on BC among rural women	22
2	Figure 2: Community-wise comparison chart	23
3	Figure 3: Women taking action in seeking prompt medical treatment	25
4	Figure 4: Count of Manifestations	26
5	Figure 5: Percentage of rural women thinking Breast feeding practices can prevent breast cancer in future	27
6	Figure 6: Percentage of women thinking stressful lifestyle can increase the risk of breast cancer	28
7	Figure 7: Percentage of rural women thinking regular exercise can reduce the risk of breast cancer	29
8	Figure 8: Percentage of rural women thinking healthy diet can prevent the risk of breast cancer occurrences	30
9	Figure 9: Percentage of rural women think breast cancer as a social stigma	31
10	Figure 10: Rural women aware of the age from which the BSE practices should be started	33

List of Tables		
Sl no.		Page no.
1	Table 1: Community groups assessed at Jharkhand	19
2	Table 2: Mean score of age of the participants	19
3	Table 3: Percentage of women attained school education in their lifetime	20
4	Table 4: Percentage of women did not complete their education	20
5	Table 5: Factors effected women in not completing their school education	20
6	Table 6: Mean score of the knowledge level on breast cancer among the rural women	21
7	Table 7: Percentage of knowledge level on breast cancer among the rural women	21
8	Table 8: Percentage of knowledge level on breast cancer among the different community groups	22
9	Table 9: Percentage of knowledge level on breast cancer symptoms	24
10	Table 10: Factors responsible for delay in seeking medical help among the rural women	25
11	Table 11: Percentage of women had breast cancer earlier	26
12	Table 12: Percentage of breast cancer survivors facing psychological problems	26
13	Table 13: Percentage of rural women thinking Breast feeding practices can prevent breast cancer in future	27
14	Table 14: Percentage of women thinking stressful lifestyle can increase the risk of breast cancer	28
15	Table 15: Percentage of rural women thinking regular exercise can reduce the risk of breast cancer	29
16	Table 16: Percentage of rural women thinking healthy diet can prevent the risk of breast cancer occurrences	30
17	Table 17: Percentage of rural women think breast cancer as a social stigma	31
18	Table 18: Percentage of rural women aware about the breast self-examination practices	32
19	Table 19: Percentage of rural women considering breast self-examination as an important tool for breast cancer detection	32
20	Table 20: Percentage of rural women aware of the BSE practices schedules	32
21	Table 21: Percentage of rural women aware of the age from which	33

	the BSE practices should be started	
--	-------------------------------------	--

List of Abbreviations		
Sl no.	Abbreviation	Full Form
1	BC	Breast Cancer
2	BSE	Breast Self-Examination
3	SPSS	Statistical Package of Social Sciences
4	PHS	Perceived Health related stigma
5	NCR	National Cancer Registry
6	WHO	World Health Organization

CHAPTER 1 Introduction

Breast cancer is one of the most common cancers among women and one of the leading causes of death worldwide. The global burden of this disease has projected an increase of two million cases by 2030. Developing countries are expected to experience a growing proportion of breast cancer cases in the coming years. (1) The estimated number of new breast cancer cases diagnosed annually is over 100,000 in India. Recent reports have also suggested that India reports 35% of the world's population, suffering from the breast cancer. It is not only a disease for the high-income countries but is also affecting the individuals in the low- and middle-income countries. (2) Breast cancer is a type of disease which majorly takes place in the breast cells of the women and comparatively less in men. It occurs when the cells inside the breasts start growing abnormally and uncontrollably, forming a tumor. There are several risk factors which results in an increased risk of incidence cases such as, age, family history, lifestyle behaviors, gene mutations, obesity and a certain hormonal treatment. (3) Breast cancer has become one of the major global public health concerns and identifying factors that may impede early detection is crucial in combating such a disease. However, in countries like India, breast cancer is still considered to be as a social stigma due to certain cultural beliefs and the lack of community awareness will eventually leads to the delayed diagnosis and treatment. (4) The fear of getting excluded from the community, fear of facing the economic burden for the medical treatment and lack of knowledge for the disease, may prevent the individuals from seeking medical help and it may lead to the negative social consequences and health outcomes. Restoring physical and psychological health becomes very challenging for the breast cancer patients and they often start suffering from the PHS (Perceived health related stigma).(5)

The PHS exerts adverse effects on both the mental and physical health of the patients suffering from the breast cancer. It also affects the quality of life of the patients. To fight off these challenging negative stereotypes, it is important to raise community awareness, promote health education and provide cultural competency training to the healthcare providers, about this specific disease and to create a supportive environment for the people with these health conditions.(6) The uplift of the cultural competence training sessions within the healthcare settings will ensure a better access to treatment and help the healthcare providers to recognize the various social and cultural differences among the women population. It will also contribute to the betterment of the physician- patient interactions. (7)

In countries like India, about 53.4% of women are aware of the various aspects of breast cancer. The awareness and attitudes of breast cancer depends on a number of the economic, cultural, social and personal experiences. Understanding these individuals' attitudes will help the healthcare providers build a support network and environment for the people suffering from this disease and create a sense of positive motivation and hope. (8)

Breast cancer awareness, early identification and advancement in treatment protocols have significantly improved the health outcomes for many individuals. It is very important for women to stay proactive in knowing about breast health, understanding the risk factors, practicing breast self-examinations and undergoing regular screenings to prevent an early onset of the disease. Breast self-examination cannot reduce the burden of cancer mortality but using this method on a regular basis helps in early detection of the cancer at an initial stage. (9)

1.1 Aim

The main purpose of this study is to conduct a pilot study and focus on understanding the level of knowledge and awareness of the rural women about breast cancer and BSE practices in Jharkhand.

1.2 Objective

- The principal objective of this study is to assess the level of knowledge awareness and breast self-examination practices in the community among women of the rural areas of Jharkhand.
- To describe the socio demographic profile of the selected sample size.

CHAPTER 2 Review of Literature

Non communicable diseases such as cardiovascular diseases, diabetes, respiratory illness and cancers contribute to a substantial growth in the mortality and morbidity globally. This exerts great impact upon the people across different geographical locations, age groups and socio-economic backgrounds. It affects the physical and psychological wellbeing of the individuals and reduces the quality of life. These diseases require specialized treatments and supportive care. Recent studies have investigated that the epidemiological and demographical transitions impact the occurrence of the cancer. The study results most likely involved the trends of cancer incidence rates over the time. Understanding the influence of the demographical and epidemiological transitions has its implications for the planning of public health and health policy interventions. It will also help in identifying the target population, developing preventive strategies & healthcare services and prioritize resource allocation that aligns with the upcoming disease burden. (10)

The incidence cases of the occurrence of breast cancer differ from place to place in accordance to the changing lifestyles of the people, urbanization, reproductive patterns and so on. According to the NCR 'National Cancer Registry', breast cancer has been considered as the most common of all the prevalent cancer cases, among women in India and it rationalizes for 27% of all cases. The risk of occurrence of such diseases is much higher in rural areas than that of the urban areas. Early identification, screening facilities and treatment is very important and needful. (11) By the year of 2020, 2.3 million women were diagnosed with this disease and 685000 deaths took place widely. According to the WHO 'World Health Organization', by the end of the year 2020, 7.8 million women were diagnosed with breast cancer making it the world's most prevalent cancer disease. (12)

According to the latest statistics of breast cancer in India, for the year of 2020, the breast cancer is merely common among the women aging from 25-49 years and 50-69 years. It then starts reducing from the age group of 70 years and above. Nearly the women of 40-60 years of age group must be targeted for breast cancer education, awareness programs and early screening facilities. Breast cancer is not a disease only for the elderly but can also occur among the younger population. This disease tends to be more hostile in the age group of the younger population and a long-term management is needed along with surgeries and other specialized treatment facilities. (13)

One of the major reasons for a higher number of young populations getting affected by this disease is the population pyramid which denotes the distribution of the population with respect to their age group. According to it, India is having a huge population in the younger age group than that of the older ones.

However, as compared to the incidence rate of breast cancer in India, the death rate of breast cancer is relatively very less overall. This is because people usually tend to seek late medical treatment due to lack of awareness, fear of getting rejected from the community, facing societal discrimination, lack of the availability of the cancers care centers and sometimes the cost burden of treatment. (14) According to a recent survey conducted by TATA Steel foundation, over non communicable diseases, the assessment of knowledge level of breast cancer in the TSF operational areas of Orissa has been estimated to be 78.6%.

CHAPTER 3 Methodology

A small-scale pilot study was conducted in the three blocks of Jharkhand including Boram, Patamda and Gamarhia. The study was conducted within a span of three months to assess the level of awareness on breast cancer and breast self-examination practices among the women population and to describe their socio-economic, socio demographical profile, in the rural areas. A total of 108 (n=108) women were assessed, aging from 18 to 55 years, who all provided consent.

The population included both tribal and other minority communities. The independent variable was the socio- economic, socio- demographic and educational profile of the targeted population while the level of knowledge and awareness was dependent on their demographical profile.

The study respondents were selected on the basis of convenient sampling method. The categories of self- administered questionnaires were refined on the basis of a pilot testing at the field. The data was collected with the help of revised structured self-administered questionnaires used as a data collection tool. The data management, cleansing, analysis and interpretation was done in the Microsoft advanced excel spreadsheet and the SPSS (Statistical Package of Social Sciences) software version 25 using descriptive statistics.

CHAPTER 4 Results

A total of 108 (n=108) women from the rural areas of Jharkhand were included in the study, with a distribution of 25% of tribal community and 75% of other minority communities. The age of the respondents was ranged from 18 to 55 years with a mean age of 31.8 years (SD =8.12). The demographical characteristics of the participants are summarized in table mentioned below:

Table 1: Community groups assessed in Jharkhand					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Jan (Caste)	81	75.0	75.0	75.0
	Janjaati (Tribal)	27	25.0	25.0	100.0
	Total	108	100.0	100.0	

Table 2: Mean score of the age of the respondents		
Age of the participant		
N	Valid	108
	Missing	0
Mean		31.87
Std. Deviation		8.122

Among the 108 respondents, 73.1% of the population have attended school education in their lifetime and 26.9% of the women did not attended school. About 91.7% of the sample population have not completed their school education due to early marriage and domestic responsibilities as a factor. The details of the data are summarized below:

Table 3: Percentage of women attained school education in their lifetime					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	No	29	26.9	26.9	26.9
	Yes	79	73.1	73.1	100.0
	Total	108	100.0	100.0	

Table 4: Percentage of women completed their education					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	No	99	91.7	91.7	91.7
	Yes	9	8.3	8.3	100.0
	Total	108	100.0	100.0	

Table 5: Factors effected women in not completing their education				
		Responses		Percent of Cases
		N	Percent	
Factors affecting rural women in not completing their school/ college education	Are you currently attending school? (If yes, mention in completed years)	2	1.5%	2.0%
	[Expensive]	17	12.5%	17.0%
	[Domestic Responsibilities]	47	34.6%	47.0%
	[Difficulties in travelling]	17	12.5%	17.0%
	[Pregnancy]	17	12.5%	17.0%
	[Early Marriage]	36	26.5%	36.0%
Total		136	100.0%	136.0%

It is found that 72.2% of the women population had heard about breast cancer and 27.8% of women did not hear about the disease. The mean score of the knowledge level is 0.72 (SD=0.45).

Table 6: Mean score of the knowledge level on breast cancer among the rural women		
Do you know about Breast Cancer?		
N	Valid	108
	Missing	0
Mean		.72
Std. Deviation		.450

Table 7: Percentage of the knowledge level on breast cancer among the rural women					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0	30	27.8	27.8	27.8
	1	78	72.2	72.2	100.0
	Total	108	100.0	100.0	

The data is summarized in the figure listed below:

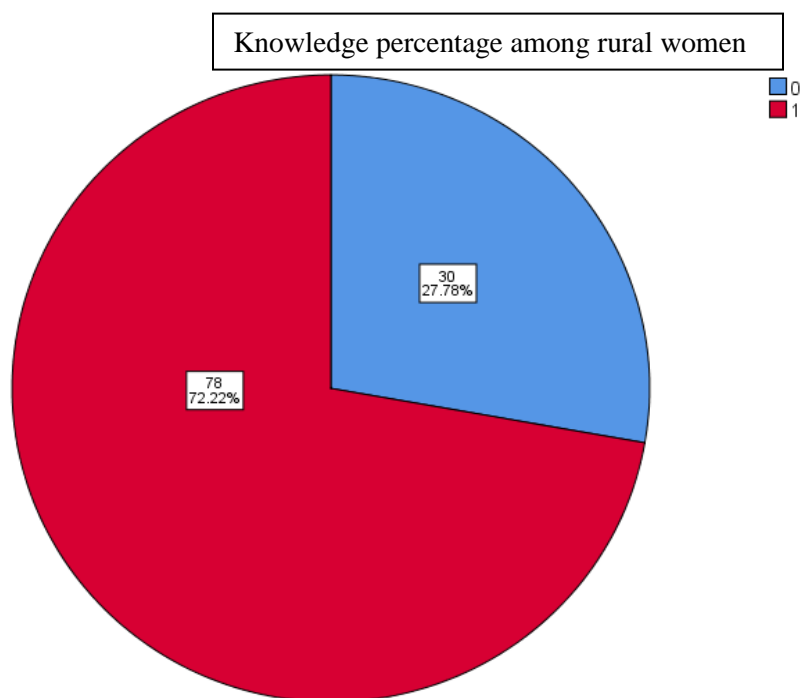
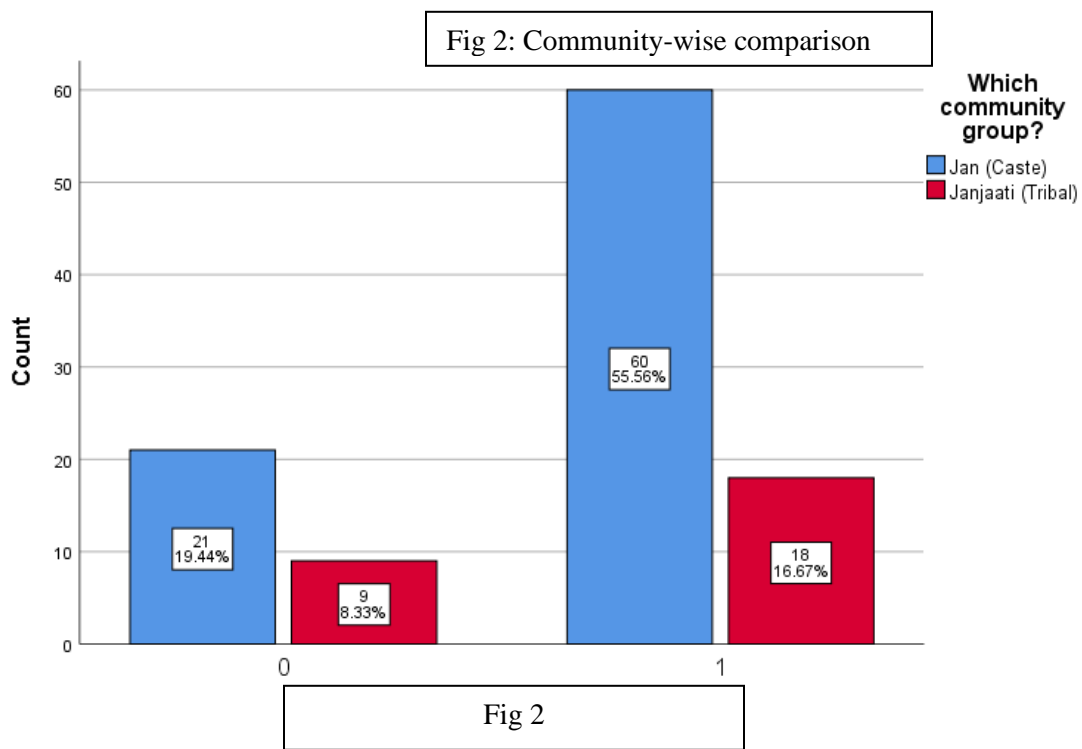


Fig: 1

The tribal community had less knowledge with 16.6% on breast cancer as compared to that of the other minority groups with a knowledge percentage of 55.5%. The data is summarized in the listed table and figure below:

Table 8: Knowledge level on breast cancer among the different community groups				
		Which community group?		Total
		Jan (Caste)	Janjaati (Tribal)	
Knowledge level on breast cancer	0= No	21	9	30
	1= Yes	60	18	78
Total		81	27	108



We have also found out that, 60.3% of the women population know that one of the symptoms of breast cancer is redness of the skin of the breast and the nipples, and 43.1% knew that a mass lump under the skin of the breast which may feel like a pea, can be a symptom. The details of the data and distribution of responses are mentioned below:

Table 9: Percentage of people having knowledge on the breast cancer symptoms

		Responses		Percent of Cases
		N	Percent	
Level of knowledge on the symptoms of breast cancer	Are you aware of the symptoms of breast cancer?	58	33.9%	100.0%
	[A lump or thickening in or near the breast or in the underarm that persists through the menstrual cycle]	7	4.1%	12.1%
	[A mass or lump, which may feel as small as a pea]	25	14.6%	43.1%
	[A change in the size, shape, or contour of the breast]	23	13.5%	39.7%
	[A blood-stained or clear fluid discharge from the nipple]	23	13.5%	39.7%
	[Redness of the skin on the breast or nipple]	35	20.5%	60.3%
Total		171	100.0%	294.8%

An assessment of attitude was conducted to get an overview of the rural women towards seeking prompt medical treatment. About 14.8% of the women in rural areas delay actions in seeking medical help. Only 44.4% of women share their body difficulties with their friends and family. The data is summarized in the figure mentioned below:

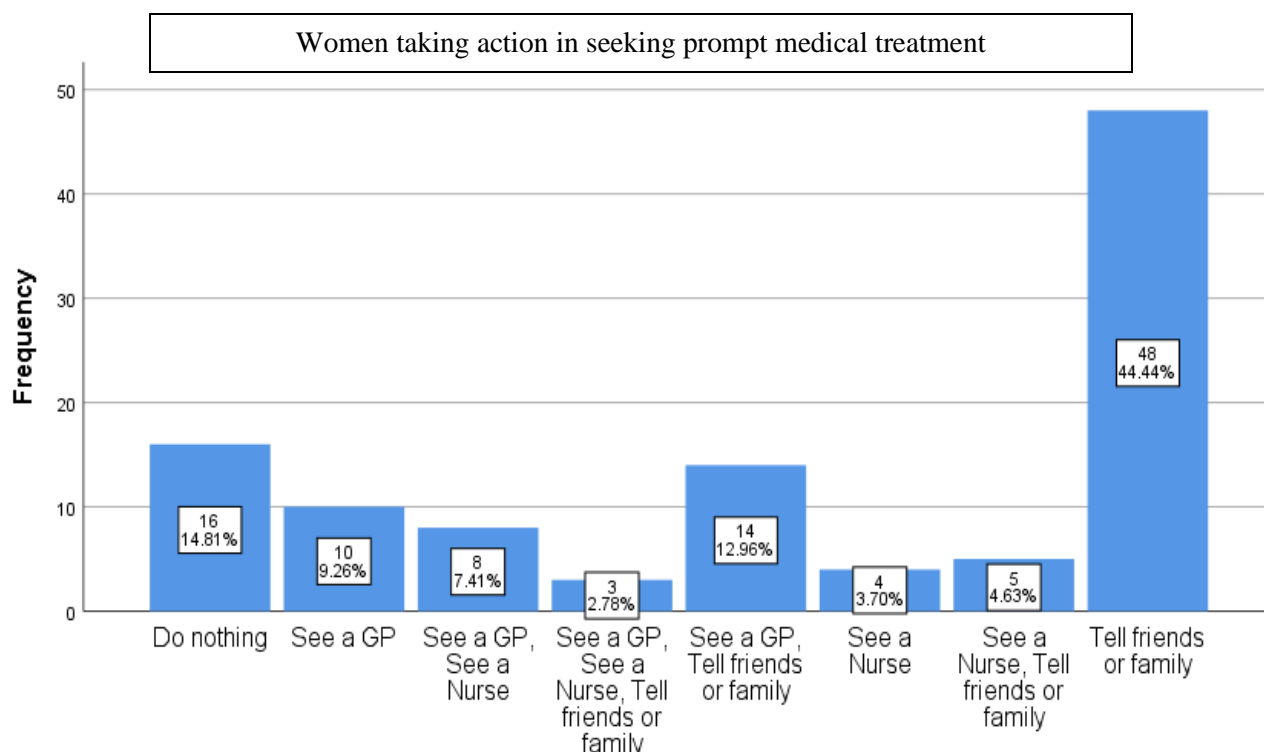


Fig: 3

The rural women face difficulties in sharing their problems with the healthcare provider. This mindset is triggered by certain socio- cultural factors such as lack of awareness, fear and anxiety and other cultural and social stigma. The data is summarized in the following tables below:

Table 10: Factors responsible for delay in seeking medical help among the rural women				
		Responses		Percent of Cases
		N	Percent	
Factors effecting women in not sharing problems with the healthcare provider	Lack of awareness	8	14.8%	28.6%
	Fear and Anxiety	19	35.2%	67.9%
	Economic Burden	9	16.7%	32.1%
	Lack in Access of treatment	6	11.1%	21.4%
	Cultural and social stigma	11	20.4%	39.3%
Total		54	100.0%	192.9%

Nearly 5.6 % women had breast cancer earlier among which 4.6% of breast cancer survivors faced adverse psychological effects due to cancer diagnosis. Most of them manifested societal discrimination, fear of getting rejected and body image difficulties. The data is summarized in the following tables and figure below:

Table 11: Percentage of women had breast cancer earlier					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0= No	102	94.4	94.4	94.4
	1= Yes	6	5.6	5.6	100.0
	Total	108	100.0	100.0	

Table 12: Percentage of breast cancer survivors facing psychological problems					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0= No	1	.9	16.7	16.7
	1= Yes	5	4.6	83.3	100.0
	Total	6	5.6	100.0	
Missing	System	102	94.4		
Total		108	100.0		

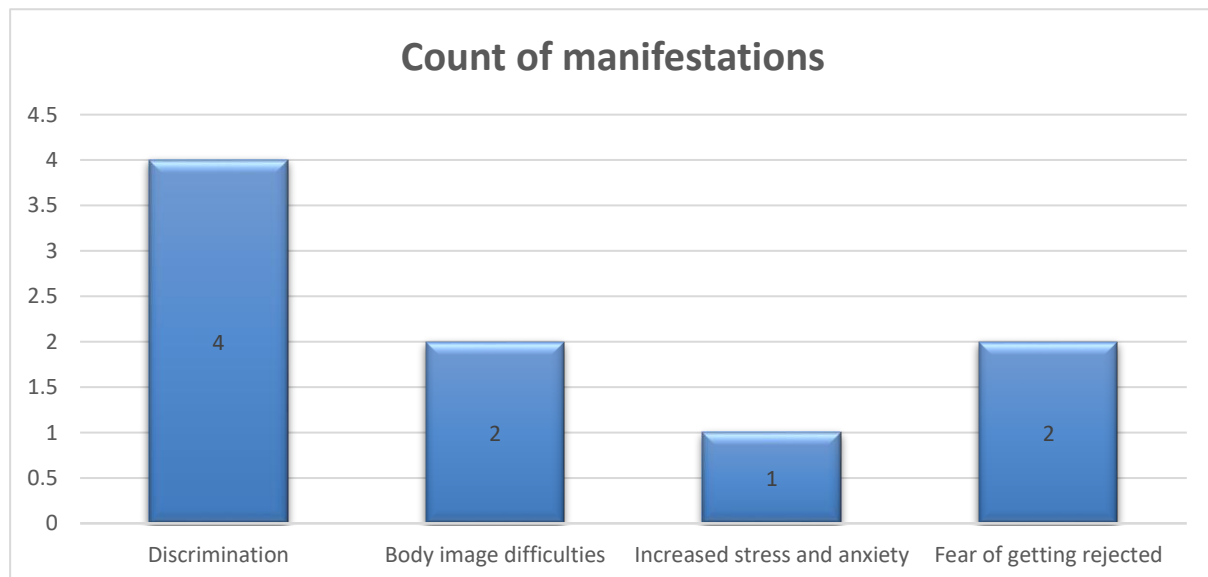


Fig: 4

It is found out that 9.3% of rural women strongly disagree with the fact that breast feeding practices can prevent breast cancer in future whereas 31.5% of women both agree and disagree over it. The data is summarized in the following tables and figure below:

Table 13: Percentage of rural women thinking Breast feeding practices can prevent breast cancer in future					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1= Strongly Disagree	10	9.3	9.3	9.3
	2= Disagree	34	31.5	31.5	40.7
	3= Neutral	25	23.1	23.1	63.9
	4= Strongly Agree	34	31.5	31.5	95.4
	5= Agree	5	4.6	4.6	100.0
	Total	108	100.0	100.0	

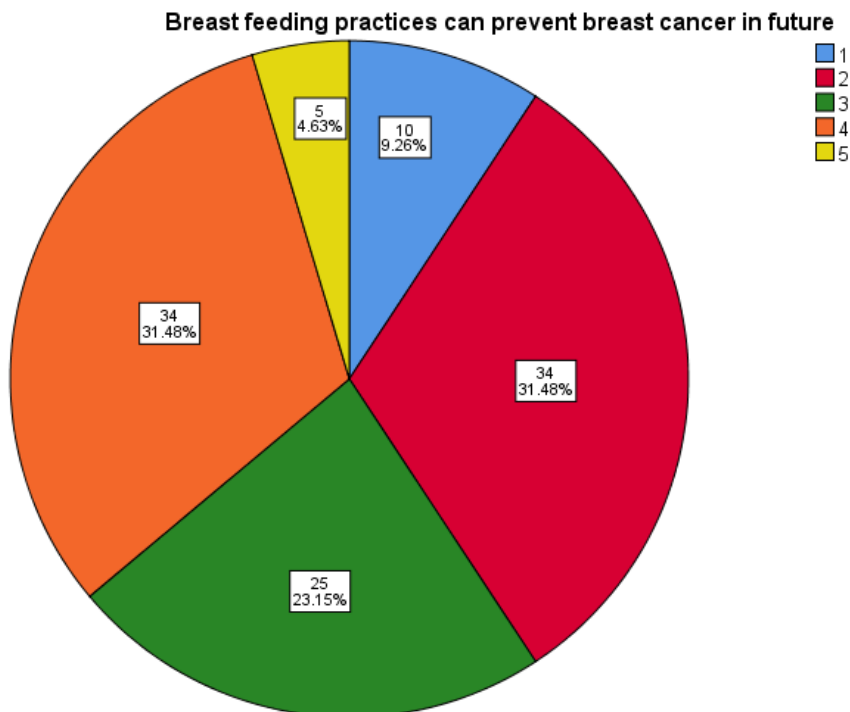


Fig: 5

It is also found out that 38% of rural women disagree with the fact that stressful lifestyle practices can increase the risk of breast cancer in future whereas 28.7% of women both agree over it. The data is summarized in the following tables and figure below:

Table 14: Percentage of women thinking stressful lifestyle can increase the risk of breast cancer					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1= Strongly Disagree	14	13.0	13.0	13.0
	2= disagree	41	38.0	38.0	50.9
	3= Neutral	21	19.4	19.4	70.4
	4= Agree	31	28.7	28.7	99.1
	5= Strongly Agree	1	.9	.9	100.0
	Total	108	100.0	100.0	

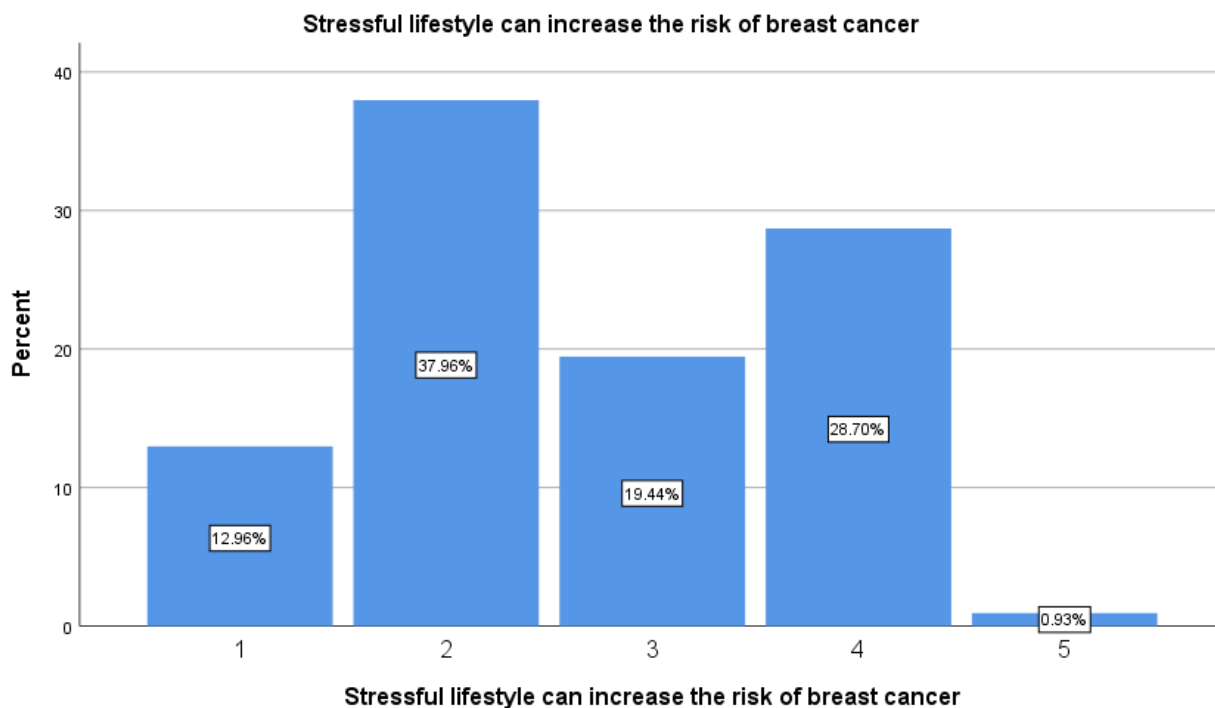
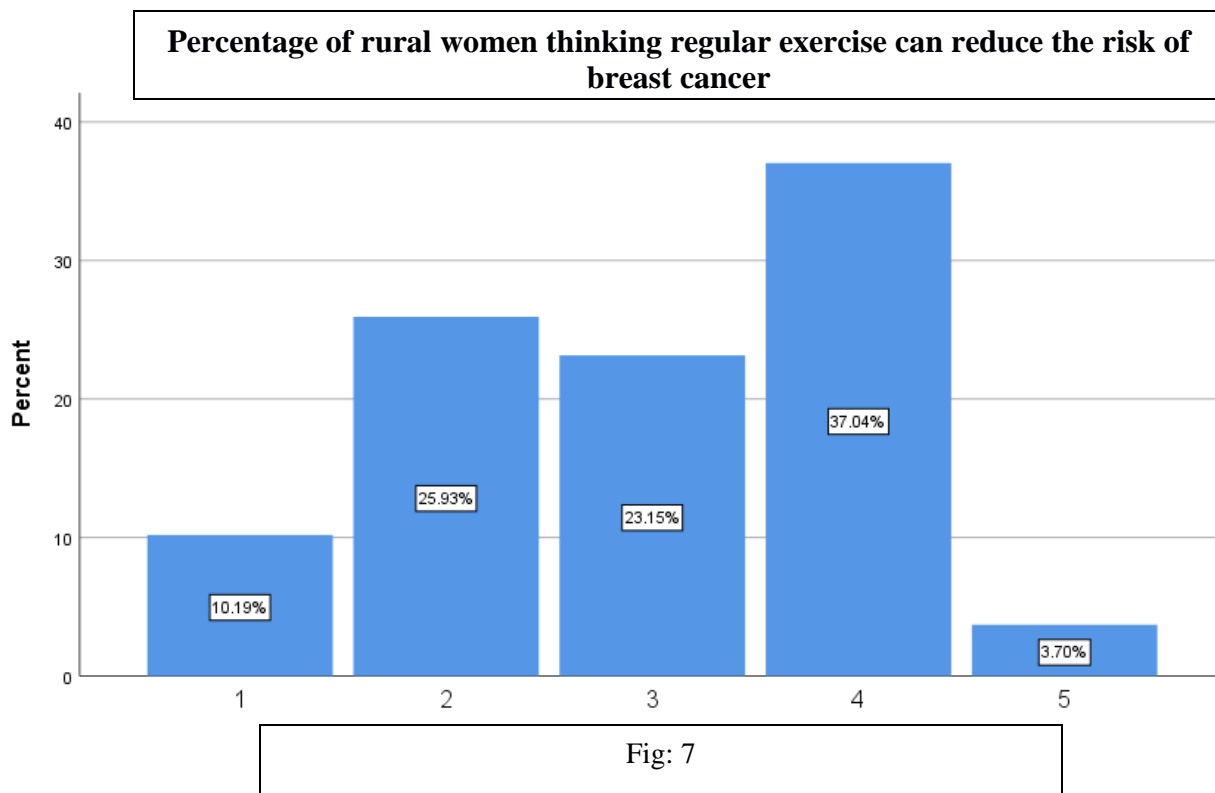


Fig:6

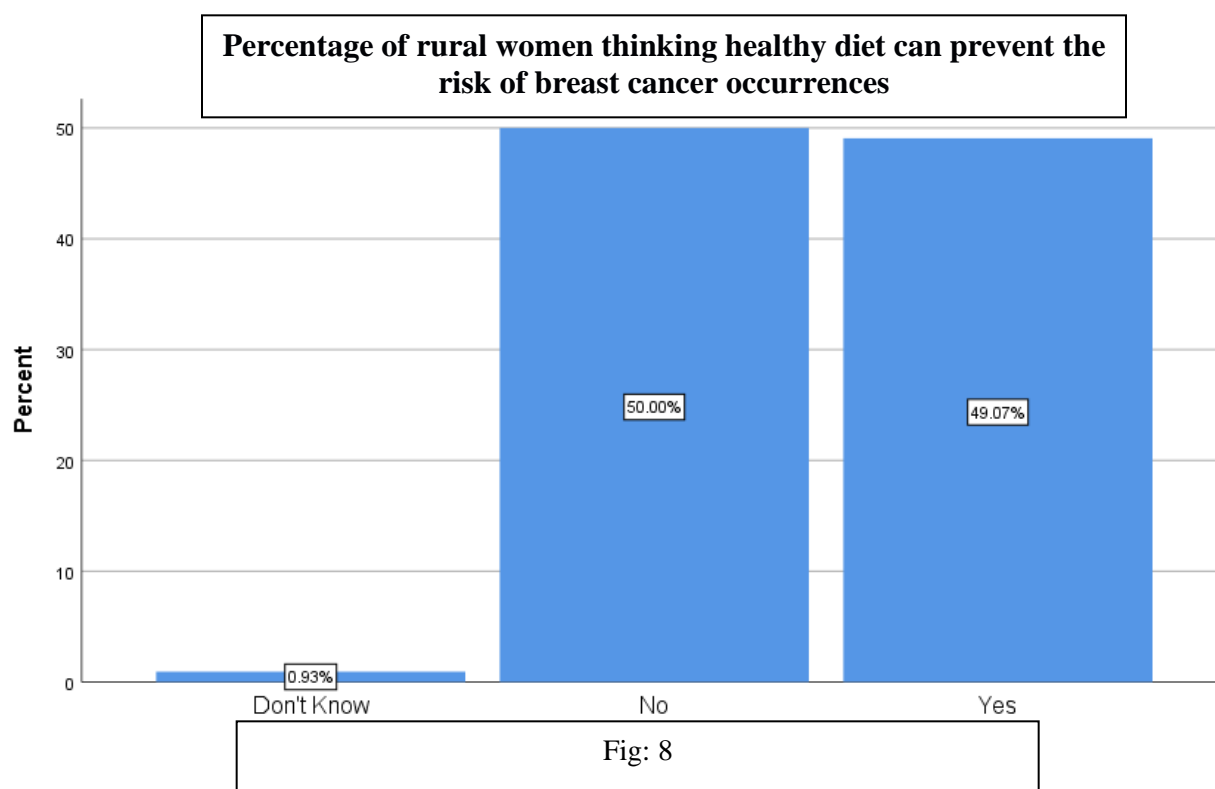
Nearly 37% of rural women agree with the fact that regular exercise can reduce the risk of breast cancer in future whereas 10.2% of women both strongly disagree over it. The data is summarized in the following tables and figure below:

Table 15: Percentage of rural women thinking regular exercise can reduce the risk of breast cancer					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	11	10.2	10.2	10.2
	2	28	25.9	25.9	36.1
	3	25	23.1	23.1	59.3
	4	40	37.0	37.0	96.3
	5	4	3.7	3.7	100.0
	Total	108	100.0	100.0	



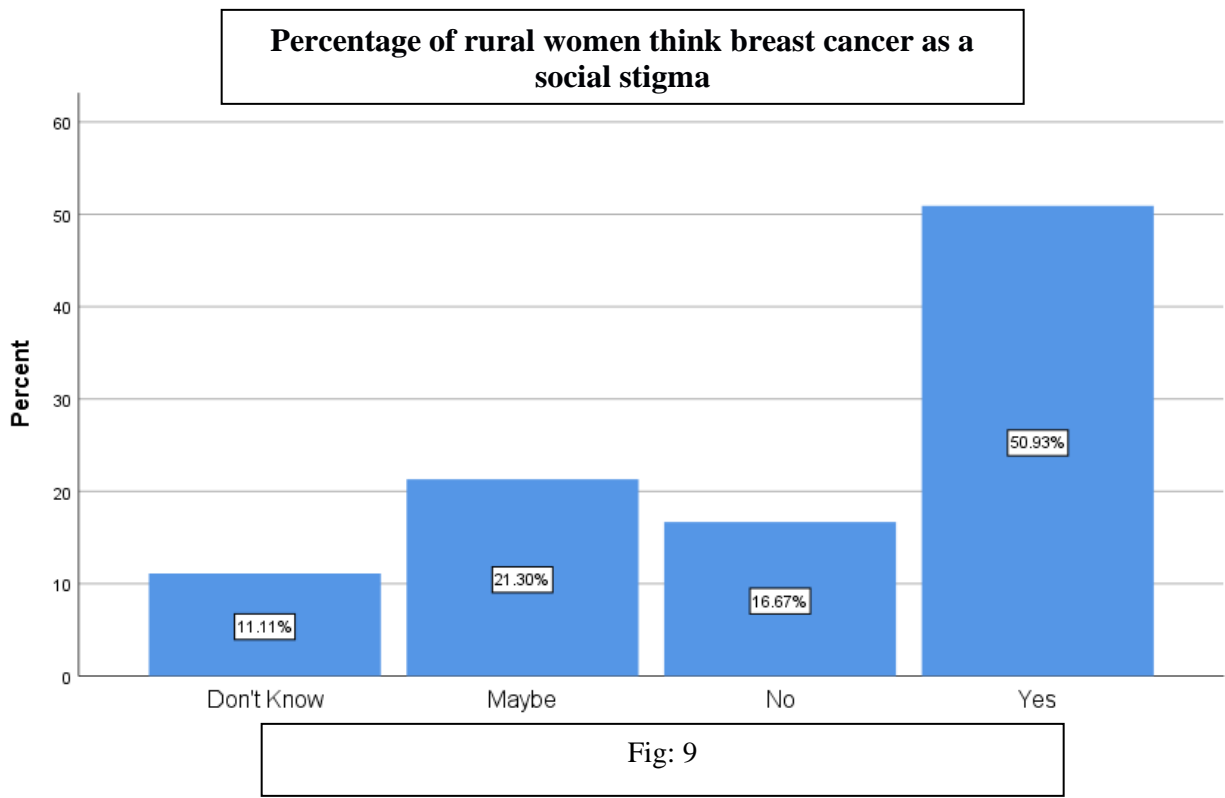
About 50% of rural women do not think that a healthy diet can prevent the risk of breast cancer occurrences in future whereas 49.1% of women strongly believe that it does. 0.9% of the women population is not aware about it. The data is summarized in the following tables and figure below:

Table 16: Percentage of rural women thinking healthy diet can prevent the risk of breast cancer occurrences					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Don't Know	1	.9	.9	.9
	No	54	50.0	50.0	50.9
	Yes	53	49.1	49.1	100.0
	Total	108	100.0	100.0	



About 50.9% of rural women consider breast cancer as a societal and cultural stigma whereas 16.7% of women do not. 11.1% of the women population is not aware about it. The data is summarized in the following tables and figure below:

Table 17: Percentage of rural women think breast cancer as a social stigma					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Don't Know	12	11.1	11.1	11.1
	Maybe	23	21.3	21.3	32.4
	No	18	16.7	16.7	49.1
	Yes	55	50.9	50.9	100.0
	Total	108	100.0	100.0	



We have found out that 60.2% of the women in the rural population of Jharkhand are not aware about the breast self-examination practices whereas 39.8% of the women population are aware about it. Only 34.3% of the women consider breast self-examination as an important tool for breast cancer detection. The data is summarized in the following tables and figure below

Table 18: Percentage of rural women aware about the breast self-examination practices					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	No	65	60.2	60.2	60.2
	Yes	43	39.8	39.8	100.0
	Total	108	100.0	100.0	

Table 19: Percentage of rural women considering breast self-examination as an important tool for breast cancer detection					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Don't Know	60	55.6	55.6	55.6
	No	11	10.2	10.2	65.7
	Yes	37	34.3	34.3	100.0
	Total	108	100.0	100.0	

At least 18.5% of the women population practice BSE on a regular basis whereas 66.7% of the rural women are unaware about BSE practice measures. About 15.7% of women had the exact knowledge of the age from when the BSE practices should be started whereas 68.5% of women did not have any knowledge for the same. The data is summarized in the following tables and figure below

Table 20: Percentage of rural women aware of the BSE practices schedules					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Don't Know	72	66.7	66.7	66.7
	Monthly	1	.9	.9	67.6
	Regularly	20	18.5	18.5	86.1
	Weekly	11	10.2	10.2	96.3
	Yearly	4	3.7	3.7	100.0
	Total	108	100.0	100.0	

Table 21: Percentage of rural women aware of the age from which the BSE practices should be started					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	After Menopause	1	.9	.9	.9
	Don't Know	74	68.5	68.5	69.4
	From 20 years	17	15.7	15.7	85.2
	From 30 years	10	9.3	9.3	94.4
	From puberty	6	5.6	5.6	100.0
	Total	108	100.0	100.0	

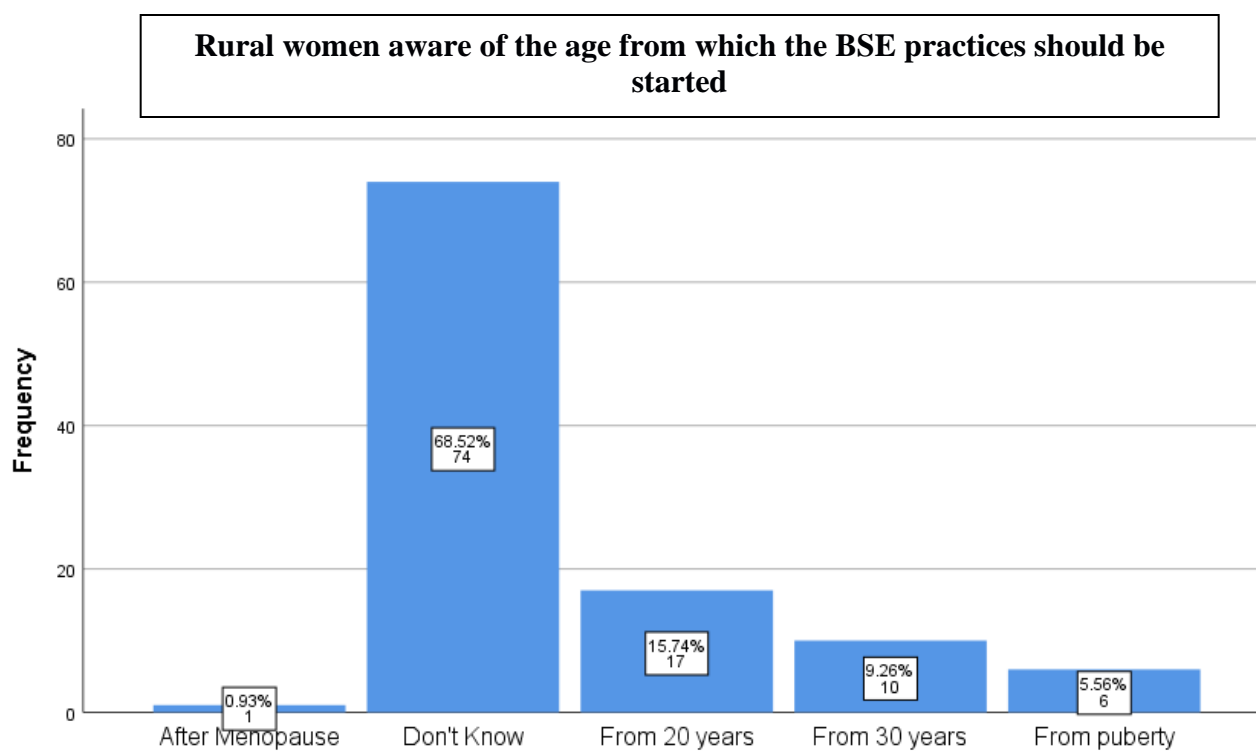


Fig: 10

CHAPTER 5 Discussion

The small-scale pilot study on the assessment of knowledge level of the rural women on breast cancer and breast self-examination was conducted with a sample size of 108 women. The study results depicted that among 73.1% of the women who attended school/ college education in their lifetime, only 8.3% of them could actually complete their education. Most of them could not complete their education due to early marriages and burden of domestic responsibilities. Most of the population had their yearly household income, less than Rs 9000 which led to an issue of high economic burden.

Despite of having a sound knowledge of what breast cancer is, its symptoms and risk factors, women population tend to seek late medical treatment due to societal discrimination and the fear of getting rejected. Nearly 5.6% suffered from breast cancer and 4.6% of the women faced psychological problems due to cancer diagnosis. Previous studies have stated that PHS or the 'perceive health related stigma' effects the quality of life of the breast cancer survivors at an adverse level. In this study we found out that most of the breast cancer survivors suffered from societal or cultural stigma and body image difficulties.

Majority of the women who are breast feeding believe that it can prevent breast cancer in future. They also believe that regular exercises can reduce the chances of occurrence of breast cancer. However, majority of them do not believe that a healthy diet can prevent the risk of breast cancer occurrence.

Although, among the sample population, 34.3% of the women think that the BSE is an important tool for breast cancer detection but majority of the population with 55.6% of women lack knowledge regarding the same. Overall, we have assessed that the rural women possess knowledge regarding breast cancer, its symptoms and risk factors but lack knowledge on the BSE practices.

CHAPTER 6 Conclusion

In conclusion, the study aimed in assessing the level of knowledge awareness on breast cancer and breast self-examination practices among the rural women in Jharkhand and to describe the socio demographical profile of the population. Through a complete review of literature and a small-scale pilot study, I have made out several findings. Firstly, the majority of the population had received basic education in their lifetime. They possessed knowledge regarding breast cancer, its symptoms and risk factors but lacked knowledge over BSE practices and the measures of early detection of breast cancer. We also found out that majority of the population tend to seek late medical treatment due to the factors related to societal discrimination, fear of getting excluded from the society and other body image difficulties.

The findings have significant implications for the researchers and public health specialists to address the major issues of the individuals, related to high economic burden, lack in access to cancer treatment centers, societal discrimination and lack of awareness.

However, it is important to focus upon the limitations of the study as it was a small-scale self-reported pilot study, the sample size of the assessed population was very less ($n= 108$). Therefore, it requires much more care to generalize the findings of the study. Also, it may overestimate or underestimate the prevalence of the study. The study also had a limited time constraint of three months. A full-scale study is required to focus upon the key areas of problems which includes addressing the issues of high economic burden, lack in access to treatment and lack of awareness.

CHAPTER 7 Recommendation

- ❖ This study highlights the ground level problems among the rural community. The healthcare providers, public health specialists and researchers should encourage an integrated approach towards promoting several community awareness programs to increase the level of knowledge of the women on the measures of early detection of breast cancer and BSE practices.
- ❖ Behavior changes sessions should be conducted among the community to facilitate an open discussion and identify the stigmatizing beliefs and misconceptions about breast cancer and to address these challenges in the society.
- ❖ Access to cancer centers and treatment facilities should be increased.
- ❖ Major focus should be given on the capacity building of the ground level health workers such as ASHA workers and village peer leaders in cultural competency training so that they can assist and provide supportive care and motivation to the breast cancer patients and survivors throughout the journey.

CHAPTER 8 Appendix



Distribution of mosquito nets during NCD and VBD program



TSF Team



Survey on the knowledge assessment of breast cancer



Capacity building of the peer leaders on Breast self-examination



Capacity building on Breast self-examination



With the team of village peer leaders and medical officer





ASHA workers learning to operate glucometers



ASHA workers learning to operate BP Apparatuses

A pilot study to assess the level of awareness on Breast Cancer and Breast Self-Examination practices, among the rural women of Jharkhand

CONSENT FORM

Warm greetings, I am Priyanka Chakraborty and I'm working with TATA Steel Foundation. I am conducting a survey to assess the knowledge, perceptions and awareness level on breast cancer and the BSE practices for an early detection and screening of breast cancer cases in the rural areas of Jharkhand. The information collected from you will help the government in health service planning. I will be asking you few questions related to your understanding about the breast cancer disease and what measures you think should be taken for an early detection. The interview will take up to 10-15 minutes. Anonymity will be maintained throughout the study. Your participation in this survey will be voluntary. If you wish to not answer any specific question, I will skip onto the next one or you can stop the interview at any time.

If you have any query, you may ask me. If you get any further queries, feel free to contact our team members.

Yes
No

Signature

सहमति पत्र

हार्दिक बधाई, मैं प्रियंका चक्रवर्ती हूँ और मैं टाटा स्टील फाउंडेशन के साथ काम कर रही हूँ।

मैं झारखंड के ग्रामीण इलाकों में स्तन कैंसर के बारे में ज्ञान, धारणा और जागरूकता के स्तर और स्तन कैंसर के मामलों की शुरुआती पहचान और जांच के लिए बीएसई प्रथाओं का आकलन करने के लिए एक सर्वेक्षण कर रहा हूँ। आपसे एकत्रित की गई जानकारी सरकार को स्वास्थ्य सेवा नियोजन में मदद करेगी। मैं आपसे स्तन कैंसर की बीमारी के बारे में आपकी समझ से संबंधित कुछ प्रश्न पूछूंगा और आपको लगता है कि शुरुआती पहचान के लिए क्या उपाय किए जाने चाहिए।

साक्षात्कार 10-15 मिनट तक का होगा। पूरे अध्ययन के दौरान गुमनामी बनाए रखी जाएगी। इस सर्वेक्षण में आपकी भागीदारी स्वैच्छिक होगी। यदि आप किसी विशिष्ट प्रश्न का उत्तर नहीं देना चाहते हैं, तो मैं अगले प्रश्न पर जाऊंगा या आप किसी भी समय साक्षात्कार रोक सकते हैं।

यदि आपका कोई प्रश्न है, तो आप मुझसे पूछ सकते हैं। यदि आपको कोई और प्रश्न मिलता है, तो बेझिझक हमारी टीम के सदस्यों से संपर्क करें।

क्या आप इस सर्वेक्षण में भाग लेने के लिए सहमत हैं?

हाँ

साइन करें-

नहीं

SOCIO DEMOGRAPHIC PROFILE			
SL NO.	QUESTIONS	CATEGORY	SKIP
1	State (राज्य)		
2	Name of the district? (जिले का नाम?)		
3	Name of the block? (ब्लॉक का नाम?)		
4	Name of the Village? (गांव का नाम?)		
5	Number of household members? (घर के सदस्यों की संख्या?)		

GENERAL INFORMATION			
SL NO.	QUESTIONS	CATEGORY	SKIP
1	What is your name? (आपका क्या नाम है?)		
2	How old are you? (आपकी आयु कितनी है?)	_____ [In completed years] _____ (पूर्ण वर्षों में)	
3	What is your current place of residence? (आपका वर्तमान निवास स्थान क्या है?)	(a) Rural (ग्रामीण)	
		(b) Urban (शहरी)	
4	Marital Status (वैवाहिक स्थिति)	Single, never married (अविवाहित कभी शादी नहीं की)	
		Married (विवाहित)	
		Widowed (विधवा)	
		Separated (अलग किए)	
5	Which community group you belong to (आप किस समुदाय समूह से संबंधित हैं)	_____ [Caste/ Tribal group] _____ (जाति / जनजाति समूह)	

EDUCATION			
SL NO.	QUESTIONS	CATEGORY	SKIP
1	Have you ever attended school? (क्या आप कभी स्कूल गए हैं?)	Yes (हाँ)	
		No (नहीं)	
2	Are you currently attending school/ college? (क्या आप वर्तमान में स्कूल जा रहे हैं?)	Yes (हाँ)	
		No (नहीं)	
3	If yes, (यदि हां,)	_____ [In completed years] (_____ पूर्ण वर्षों में)	
4	If No, why? (यदि नहीं, तो क्यों?)	Expensive (महँगा)	
		Domestic Responsibilities (घरेलू जिम्मेदारियाँ)	
		Difficulties in travelling (यात्रा में कठिनाइयाँ)	
		Pregnancy (गर्भावस्था)	
		Any health-related issues (स्वास्थ्य संबंधी कोई समस्या)	
		Other (अन्य)	

SOCIO ECONOMIC PROFILE			
SL NO.	QUESTIONS	CATEGORY	SKIP
1	Current level of household income per year (प्रति वर्ष घरेलू आय का वर्तमान स्तर)	Less than Rs 9,999 (9,999 रुपये से कम)	
		Rs 10,000- Rs 29,999 (10,000 रुपये- 29,999 रुपये)	
		Rs 30,000- Rs 59,999 (30,000 रुपये- 59,999 रुपये)	
		60,000 and above (60,000 और ऊपर)	
2	Occupation (पेशा)	Unskilled (अकुशल)	
		Semi- skilled (अर्द्ध कुशल)	
		Skilled (कुशल)	
		Professional (पेशेवर)	
		Unemployed (बेरोज़गार)	
		Housewife (गृहिणी)	

QUESTIONNAIRE (BREAST CANCER)

(Women and ASHA workers)

SL NO.	QUESTIONS	CATEGORY	SKIP
1	Weight (in kg)		
2	Do you know about breast cancer?	Yes	
		No	
3	Have you ever had breast cancer?	Yes	(If no, please skip question 7)
		No	
4	If 'Yes' how did you discover you had breast cancer?	Found a lump while examining myself	
		Had a mammogram done	
		Had bleeding, discharge or other symptoms	
		As a result of another test or investigation	
		Other	
5	As a breast cancer survivor, did you face any adverse psychological effects due to cancer diagnosis?	Yes	(Only for breast cancer survivors/ If No, please skip to question 7)
		No	
6	If Yes, what did you manifest?	Body Image difficulties	
		Fear of getting rejected	
		Increased stress and anxiety	
		Discrimination	
		Other	
7	Are you aware of the symptoms of breast cancer?	Yes	(If no, please skip question 7)
		No	
8	If Yes, Mention some	A lump or thickening in or near the breast or in the underarm that persists through the menstrual cycle	
		A mass or lump, which may feel as small as a pea	
		A change in the size, shape, or contour of the breast	
		A blood-stained or clear fluid discharge from the nipple	
		Redness of the skin on the breast or nipple	
9	Do you know early identification can help in avoiding breast cancer?	Yes	
		No	
10	Do you think any adult women can	Yes	

	develop breast cancer?	No	
		Don't Know	
11	Do you think breast cancer is a disease for elderly women?	Yes	
		No	
		Don't Know	
12	Do you have a history of breast cancer in your family (i.e immediate blood relatives, grandparents, parents, siblings)	Yes	
		No	
		Don't Know	
13	If you found a lump or something you weren't sure about, what would you do? (Please tick all that apply)	See a GP	
		See a ASHA	
		Tell friends or family	
		Do Nothing	
14	Stressful lifestyle can increase the risk of breast cancer	Strongly Agree	
		Agree	
		Neutral	
		Disagree	
		Strongly Disagree	
15	Do you breast feed?	Yes	(Only mothers)
		No	
16	Breast feeding practices can prevent breast cancer in future	Strongly Agree	
		Agree	
		Neutral	
		Disagree	
		Strongly Disagree	
17	Are you aware of the risk factors leading to breast cancer?	Older Age	
		Family History	
		Alcohol Usage	
		Overweight/ Obese	
		Menopause	
		Don't Know	
18	Do you think regular exercise can reduce the risk of breast cancer?	Strongly Agree	
		Agree	
		Neutral	
		Disagree	
		Strongly Disagree	
19	Can a healthy diet prevent the occurrence of Breast Cancer?	Yes	
		No	
20	Do you think that breast cancer is a social stigma?	Yes	
		No	
		May be	
		Don't Know	

QUESTIONNAIRE (BREAST CANCER) (HINDI)

क्रम सं.	प्रश्न	श्रेणी	छोड़ें
1	वजन (किग्रा में)		
2	क्या आप ब्रेस्ट कैंसर के बारे में जानती हैं?	हाँ नहीं	
3	क्या आपको कभी स्तन कैंसर हुआ है?	हाँ नहीं	(यदि नहीं, कृपया प्रश्न 5 छोड़ें)
4	यदि 'हाँ' तो आपको कैसे पता चला कि आपको स्तन कैंसर है?	खुद की जांच करने पर गांठ मिली मैमोग्राम कराया था रक्तस्राव, निर्वहन या अन्य लक्षण थे किसी अन्य परीक्षण या जांच के परिणामस्वरूप अन्य	
5	एक स्तन कैंसर उत्तरजीवी के रूप में, क्या आपको कैंसर के निदान के कारण किसी प्रतिकूल मनोवैज्ञानिक प्रभाव का सामना करना पड़ा?	हाँ नहीं	(केवल स्तन कैंसर से बचे लोगों के लिए / यदि नहीं, तो कृपया प्रश्न 7 पर जाएं)
6	यदि हाँ, तो आपने क्या प्रकट किया?	शारीरिक छवि कठिनाइयाँ रिजेक्ट होने का डर तनाव और चिंता में वृद्धि भेदभाव अन्य	
7	क्या आप ब्रेस्ट कैंसर के लक्षणों से वाकिफ हैं?	हाँ नहीं	(यदि नहीं, कृपया प्रश्न 7 छोड़ें)
8	यदि हां, तो	स्तन के अंदर या बगल में या अंडरआर्म में कुछ गांठ या गाढ़ा होने का उल्लेख करें जो मासिक धर्म चक्र के दौरान बना रहता है एक द्रव्यमान या गांठ, जो मटर के दाने जितना छोटा लग सकता है स्तन के आकार, आकृति या रूपरेखा में परिवर्तन निप्पल से खून से सना या साफ तरल पदार्थ निकलना स्तन या निप्पल पर त्वचा का लाल होना	
9	क्या आप जानते हैं कि शुरुआती पहचान स्तन कैंसर से बचने में मदद कर सकती है?	हाँ नहीं	
10	क्या आपको लगता है कि कोई वयस्क महिला स्तन कैंसर विकसित कर सकती है?	हाँ नहीं	

		पता नहीं	
11	क्या आपको लगता है कि स्तन कैंसर बुजुर्ग महिलाओं के लिए एक बीमारी है?	हाँ नहीं पता नहीं	
12	क्या आपके परिवार में स्तन कैंसर का इतिहास है (यानी दादा-दादी, माता-पिता, भाई-बहन, रिश्तेदार)	हाँ नहीं पता नहीं	
13	अगर आपको कोई गांठ या कोई ऐसी चीज मिली जिसके बारे में आप निश्चित नहीं थे, तो आप क्या करेंगे? (जो लागू हो कृपया उन सभी पर निशान लगाएं)	जीपी देखें एक नर्स देखें दोस्तों या परिवार को बताएं कुछ भी नहीं है	
14	तनावपूर्ण जीवनशैली से बढ़ सकता है ब्रेस्ट कैंसर का खतरा पूरी तरह	दृढ़तापूर्वक सहमत सहमत तटस्थ असहमत दृढ़तापूर्वक असहमत	
15	क्या आप स्तनपान कराती हैं?	हाँ नहीं	(केवल माताएं)
16	स्तनपान के अभ्यास से भविष्य में स्तन कैंसर को रोका जा सकता है इस बात से पूरी तरह सहमत हूँ	दृढ़तापूर्वक सहमत सहमत तटस्थ असहमत दृढ़तापूर्वक असहमत	
17	क्या आप स्तन कैंसर के लिए अग्रणी जोखिम कारकों से अवगत हैं?	बड़ी उम्र परिवार के इतिहास शराब का सेवन अधिक वजन / मोटापा रजोनिवृत्ति पता नहीं	
18	क्या आपको लगता है कि नियमित व्यायाम से स्तन कैंसर का खतरा कम हो सकता है?	दृढ़तापूर्वक सहमत सहमत तटस्थ असहमत दृढ़तापूर्वक असहमत	
19	क्या एक स्वस्थ आहार स्तन कैंसर की घटना को रोक सकता है?	हाँ नहीं	
20	क्या आपको लगता है कि स्तन कैंसर एक सामाजिक कलंक है?	हाँ नहीं शायद पता नहीं	

QUESTIONNAIRE (BREAST SELF EXAMINATION)

SL NO.	QUESTIONS	CATEGORY	SKIP
1	Are you aware of about Breast Self-Examination?	Yes	Both women and ASHA worker
		No	
2	Is BSE an important tool for the early detection of breast cancer?	Yes	Both women and ASHA worker
		No	
		Don't Know	
3	BSE should be started from which age?	From puberty	Both women and ASHA worker
		From 20 years	
		From 30 years	
		After Menopause	
		Don't Know	
4	When should the Breast self-examination should be done?	Regularly	Both women and ASHA worker
		Weekly	
		Monthly	
		Yearly	
		Don't Know	
5	What is the best time to do a Breast Self-Examination?	During menstrual flow	Both women and ASHA worker
		A week after period	
		During pregnancy	
		During breastfeeding	
		Don't Know	
6	Do you regularly observe/feel your breasts for any changes?	Yes	Only for women
		No	
7	Do you feel confident that you know what to look for when feeling/observing/checking your breasts?	Yes	Only for women
		No	
		Don't Know	
8	Do you feel comfortable sharing your problems with the healthcare provider?	Yes	Only for women, If yes, skip to question 10
		No	
9	If No, what factors prevent you from seeking early medical attention?	Lack of Awareness	Only for women
		Fear and anxiety	
		Economic burden	
		Lack of access to treatment	
		Cultural and social stigma	
10	A BSE practice should be done by	Doctor	Both women and ASHA worker
		Trained Nurse	
		Individual/ You	
11	According to you, what are the factors involves in addressing the problems of the individuals, for seeking a late medical help?	Health education	Only for ASHA worker
		Community awareness campaigns	
		Increased access to the screening facilities	

		Addressing cost burden	
		Cultural competency training to the primary healthcare provider	

QUESTIONNAIRE (BREAST SELF EXAMINATION) (HINDI)

क्रम सं.	प्रश्न	श्रेणी	छोड़ें
1	क्या आप ब्रेस्ट सेल्फ एग्जामिनेशन के बारे में जानती हैं?	हाँ नहीं	महिला और आशा कार्यकर्ता दोनों
2	क्या बीएसई स्तन कैंसर का जल्द पता लगाने के लिए एक महत्वपूर्ण उपकरण है?	हाँ नहीं पता नहीं	
3	बीएसई को किस उम्र से शुरू करना चाहिए?	यौवन से 20 साल से 30 साल से रजोनिवृत्ति के बाद पता नहीं	
4	ब्रेस्ट सेल्फ एग्जामिनेशन कब करवाना चाहिए?	नियमित रूप से साप्ताहिक महीने के सालाना पता नहीं	महिला और आशा कार्यकर्ता दोनों
5	ब्रेस्ट सेल्फ एग्जामिनेशन करने का सबसे अच्छा समय क्या है?	मासिक धर्म प्रवाह के दौरान पीरियड के एक हफ्ते बाद गर्भावस्था के दौरान स्तनपान के दौरान पता नहीं	महिला और आशा कार्यकर्ता दोनों
6	क्या आप किसी भी बदलाव के लिए नियमित रूप से अपने स्तनों को देखती/महसूस करती हैं?	हाँ नहीं	केवल महिलाओं के लिए
7	क्या आप आश्वस्त महसूस करती हैं कि आपको पता है कि अपने स्तनों को महसूस करते/देखते/जांचते समय किन बातों का ध्यान रखना चाहिए?	हाँ नहीं पता नहीं	केवल महिलाओं के लिए
8	क्या आप स्वास्थ्य सेवा प्रदाता के साथ अपनी समस्याओं को साझा करने में सहज महसूस करते हैं?	हाँ नहीं	केवल महिलाओं के लिए, यदि हाँ, प्रश्न 10 पर जाएँ

9	यदि नहीं, तो कौन से कारक आपको प्रारंभिक चिकित्सा ध्यान देने से रोकते हैं?	जागरूकता की कमी	केवल महिलाओं के लिए
		भय और चिंता	
		आर्थिक बोझ	
		उपचार तक पहुंच का अभाव	
		सांस्कृतिक और सामाजिक कलंक	
10	बीएसई द्वारा अभ्यास किया जाना चाहिए	चिकित्सक	महिला और आशा कार्यकर्ता दोनों
		प्रशिक्षित नर्स	
		व्यक्तिगत / आप	
11	आपके अनुसार, देर से चिकित्सा सहायता प्राप्त करने के लिए व्यक्तियों की समस्याओं का समाधान करने में कौन से कारक शामिल हैं?	स्वास्थ्य शिक्षा	केवल आशा कार्यकर्ता के लिए
		सामुदायिक जागरूकता अभियान	
		स्क्रीनिंग सुविधाओं तक पहुंच में वृद्धि	
		लागत के बोझ को संबोधित करना	
		प्राथमिक स्वास्थ्य सेवा प्रदाता को सांस्कृतिक योग्यता प्रशिक्षण	

Priyanka Chakraborty D

ORIGINALITY REPORT

15%

SIMILARITY INDEX

14%

INTERNET SOURCES

2%

PUBLICATIONS

7%

STUDENT PAPERS

PRIMARY SOURCES

1

eureka.teithe.gr

Internet Source

1%

2

healthremedy247.blogspot.com

Internet Source

1%

3

vdocuments.mx

Internet Source

1%

4

www.jeehp.org

Internet Source

1%

5

repository.unhas.ac.id

Internet Source

1%

6

repository.sustech.edu

Internet Source

1%

7

www.scribd.com

Internet Source

1%

8

Submitted to The University of Law Ltd

Student Paper

1%

9

journal.ipb.ac.id

Internet Source

1%

10	my.clevelandclinic.org Internet Source	1%
11	Submitted to University of Malaya Student Paper	<1%
12	www.waterloo.ca Internet Source	<1%
13	polynoe.lib.uniwa.gr Internet Source	<1%
14	www.researchgate.net Internet Source	<1%
15	123dok.com Internet Source	<1%
16	dtr.ky.gov Internet Source	<1%
17	etd.cput.ac.za Internet Source	<1%
18	repository.cardiffmet.ac.uk Internet Source	<1%
19	pdfs.semanticscholar.org Internet Source	<1%
20	web.grcc.cc.mi.us Internet Source	<1%
21	hydrolicensing.smud.org Internet Source	<1%

22	ntnuopen.ntnu.no Internet Source	<1%
23	Submitted to Regenesys Business School Student Paper	<1%
24	www.jpma.org.pk Internet Source	<1%
25	Submitted to Mancosa Student Paper	<1%
26	mdhi.org Internet Source	<1%
27	www.wisconsin.edu Internet Source	<1%
28	bmcpediatr.biomedcentral.com Internet Source	<1%
29	susan-myjourney.blogspot.com Internet Source	<1%
30	vestnik-avicenna.tj Internet Source	<1%
31	medforum.pk Internet Source	<1%
32	uobrep.openrepository.com Internet Source	<1%
33	www.int-e.net Internet Source	<1%

Exclude quotes Off

Exclude matches Off

Exclude bibliography On

CHAPTER 9 Bibliography

- 1) A. Gupta, K Shridhar et al. A review of breast cancer awareness among women in India: Cancer literate or awareness deficit? 2015
- 2) Mithilesh Kumar, Vivek Kashyap: Awareness about breast cancer among women attending obstetrics and gynecology department in a tertiary care hospital of Jharkhand, India. 2017
- 3) Agnieszka Kolak , Marzena Kamińska et al. Primary and secondary prevention of breast cancer DOI: [10.26444/aaem/75943](https://doi.org/10.26444/aaem/75943)
- 4) Sultan Kayan , Ilgun Ozen Cinar : An examination of variables associated with breast cancer early detection behaviors of women, 2022
- 5) Qian-Xin Wang, Yan Bai et al. Perceived health related stigma among patients of breast cancer. 2017
- 6) Kayalvizihi Arivalan: Breast cancer and social stigma: How it affects one's mental health? 2021
- 7) Richard C Palmer, Raquel Samson et al. Development and evaluation of a web-based breast cancer cultural competency course for primary healthcare providers 2011
- 8) Subhojit Dey, Arti Mishra et al. Breast Cancer Awareness at the Community Level among Women in Delhi, India 2015;16(13):5243-51. doi:10.7314/apjcp.2015.16.13.5243.
- 9) P Šašková, D Pavlišta Breast self-examination. Yes or no? 2016 Winter;81(6):463-469.
- 10) Global Burden of Disease Cancer Collaboration; Christina Fitzmaurice et al. Global, Regional, and National Cancer Incidence, Mortality, Years of Life Lost, Years Lived With Disability, and Disability-Adjusted Life-Years for 29 Cancer Groups, 1990 to 2017: A Systematic Analysis for the Global Burden of Disease Study 2019 Dec 1;5(12):1749-1768. doi: 10.1001/jamaoncol.2019.2996.
- 11) Dr Vasundhra Atre: Rise and prevalence of Cancer in India Updated: Feb 4, 2017
- 12) World Health Organization: Breast cancer; 26 March 2021 <https://www.who.int/news-room/fact-sheets/detail/breast-cancer>
- 13) https://www.breastcancerindia.net/statistics/latest_statistics_breast_cancer_india.html
- 14) The Pink Initiative: Trends of Breast Cancer in India; 26th May 2020 <https://www.breastcancerindia.net/statistics/trends.html>

