

AN ASSESSMENT OF PERCEIVED RISKS OF BREAST CANCER AND SCREENING ATTENDANCE AMONG WOMEN IN OGUN STATE, NIGERIA

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Abstract

This study examined the perceived risks of breast cancer and its influence on breast cancer screening attendance among 992 women in 5 selected Local Government Areas in Ogun state, Nigeria. A cross-sectional survey of women aged 15 – 69 years was performed using the multi-stage sampling technique. Opinions were sampled based on their general knowledge and awareness of breast cancer, if they think they may be at risk of getting breast cancer and if they will go for a voluntary breast cancer screening. A total of 10 in-depth-interviews was also conducted to complement the survey method. Opinions were sampled from women residing in rural, urban and semi-urban communities in the 5 LGAs. The test of relationship using the Binary Logistic Regression (BLR) showed that women's decision towards breast cancer screening is not determined by perceptions of risk, but are rather determined by religious and socio-cultural beliefs in the study area. Risk perception although an important component of behavioural change, is not a sufficient enough variable that is capable of impacting on women's behaviour and disposition towards breast cancer screening. Future policies and programs of the government and major stakeholders may be structured in a religious and culturally sensitive manner to correct wrong and uneducated beliefs about breast cancer screening in order to help women make accurate and informed risks assessment for prompt preventive action aimed at reducing breast cancer morbidity and mortality in Nigeria. Additionally, women's life experiences and personal beliefs about breast cancer should be put into consideration when designing policies and programs so as to make these programs yield desired result which is behavioural modification.

Keywords: Perceived risks, Women, Screening attendance, Breast cancer

1 INTRODUCTION

Breast cancer (BC) has been considered to be one of the most commonly diagnosed, and leading cause of cancer-related deaths among women globally (MacDonald, Sarna, Uman, Grant & Weitzel 2005; Norman & Brain 2005). In the past, deaths among Nigerian women was often attributable to obstetric complications and communicable diseases while cancer related death was less common. Today, breast cancer has become the commonest form of cancer morbidity and mortality among these women (Globocan 2002; Okobia &

Aligbe, 2005).

Approximately 45% of breast cancer diagnosis and 60% of breast cancer deaths occurred in middle to low income countries in 2008, and current statistics for African countries like Nigeria, Kenya, South Africa and the rest revealed that breast cancer has steadily surpassed cervical cancer as the most fatal cancer among women (Jemal, Bray, Center, Ferlay, Ward, & Forman, 2006; Parkin & Fernandez, 2006). In Nigeria today, breast cancer has been reported to have accounted for 56.6% of all cancer diagnosis from 1995-2002, (over a period of 8 years) (Mandong, Madaki & Manasseh, 2004), with about 70% of Nigerian women presenting late with advanced stage of the disease. The estimated 5year survival rate of breast cancer is still less than 10% in Nigeria when compared with Western Europe and North America that have been enjoying over 70% survival rate (Anyanwu, 2000; Okobia & Osime, 2001; Ihekwaba & Ihekwaba, 1992).

The burden of breast cancer in Nigeria is however unknown and this is largely due to missed diagnosis and inaccurate data from poorly funded cancer registries that produce mainly hospital based data (Akinkugbe, Lucas, Onyemelukwe, Yahaya & Saka, 2010; Abdul-Kareem, 2009). Nonetheless, existing data from different parts of the country revealed a growing increase in female cancers with breast cancer taking the lead (Mohammed, Ezino, Ochicha, Gwarzo & Samaila, 2008; Okobia & Aligbe, 2005). Women's perception of the risk of breast cancer is also inaccurate either in the form of overestimation or underestimation (Black, Nease & Tosteson, 1995; Brenes, Case & Paskett, 2001; Buxton, Bottorff, Balneaves & Richardson, 2003; Hopwood, 2000; Hopwood, Howell, Lalloo & Evans, 2003; Hopwood, Shenton, Lalloo, Evans & Howell, 2001; Iglehart, Miron, Rimer, Winer, Berry & Shildkraut, 1998). It is also sometimes misguided, erroneous and often shrouded in anxiety about cancer (Hopwood, 2000).

This study, conducted in 5 South-western Nigerian communities set out to examine women's perception of the risk of breast cancer and its influence on their behavioural disposition to breast cancer screening, with a view of investigating how Nigerian women experience and respond to the incidence of breast cancer.

1.1 Methods

1.1.1 Study Population

The area under investigation with regard to this study is Ogun State. Ogun State, also known as the "Gateway State" is located in the South-western region and is one of the 36 states in the Federal Republic of Nigeria. Often ranked as the 24th largest state out of the 36 states in Nigeria in terms of land mass, Ogun State consist of 3 senatorial districts, 9 Federal constituencies, 27 state constituencies and 20 Local Government Areas (Oke, 2012).

The population of interest constituted pre-menopausal and post-menopausal women selected from over 880,970 regular households distributed unevenly across the 20 LGAs in Ogun state (National Population Commission, 2006). The sample was drawn from 5 Wards located in 5 randomly selected LGAs out of the 20 identified LGAs in Ogun State using the multi-stage sampling technique. The selected LGAs include: Ado-Odo Ota, Abeokuta South, Sagamu, Obafemi Owode and Ijebu Ode, while the wards visited in these LGAs include: Sango Ota, Ake, Ogijo, Mowe and Irewon. Opinions were sampled from women residing in rural, urban and semi-urban areas in these 5 wards.

Sampling was done using a multistage stratified sampling technique. The study area was first stratified into LGAs, and then into wards, streets within each ward and households. The number sampled from each LGAs was proportional to the female population size of each LGAs

1.1.2 Instrument

A 58-item, study specific, self-administered questionnaire was used to elicit quantitative data from the population of interest, and, in a situation where respondents could not read or write, the interviewer-administered method was adopted. A pre-test was conducted on the research instrument before its final adoption. A total of 10 in-depth-interviews was also conducted to complement the survey method. The questionnaire administration was done by a team of research assistants who were trained before the commencement of the study and could communicate fluently and effectively in both English and Yoruba languages depending on the preference of respondents.

The questionnaire gathered information on socio-demographic characteristics of respondents, their general knowledge and awareness of breast cancer, if they think they may be at risk of getting breast cancer and if they will go for a voluntary breast cancer screening.

1.1.3 Key variables

The dependent variable for this study is “behavioural disposition to breast cancer screening”, while the independent variable is “perception of breast cancer risk”. The key variables in use are: ever worry about BC, view BC as threat, know someone that have had BC, would go for BC screening, and, at risk of getting BC.

1.1.4 Analysis

Quantitative data analysis was done using the Statistical Package for the Social Sciences (SPSS) 16.0. Univariate analysis was conducted with the use of frequency tables to assess and describe the socio-demographic characteristics of respondents and other variables of interest while the Binary Logistic Regression (BLR) was used to estimate the log of likelihood $\log\left(\frac{p}{1-p}\right)$ on the independent variable.

Information from the in-depth interview sessions was transcribed, edited and organized. Relevant striking statements were noted and used to support results from the quantitative data analysis.

2 RESULT

2.2.1 Socio-demographic Profile of Respondents

A total of 1,100 questionnaire was administered on the study population with 992 adjudged suitable for analysis. The attrition rate was 9.8%.

A total sum of 992 women were thus surveyed across the 5 selected LGAs and wards: 306 from rural areas, 547 from urban and 139 from semi-urban areas. Wards that are seemingly urban were visited in Ado-odo Ota and Abeokuta South, those that have some rural characteristics were visited in Sagamu and Ijebu Ode, and those having semi-urban features were targeted in Obafemi Owode LGA. The selection was done based on size, population density, social distance and economic activities in these areas.

A larger percentage of the sampled population are of the Yoruba Ethnic group, their mean age are: 30.8 for rural, 31.8 for urban and 27.89 for semi-urban. Most of the respondents had some form of education with only 8.6% having no formal education at all. They are mostly single and married women and majority belonged to the Christian faith (rural: 69.0%, urban: 67.8%, semi-urban: 74.8%) as listed in table 1 below.

Table 1. Percentage Distribution of Respondents by Socio-Demographic Characteristics						
	Rural		Urban		Semi-Urban	
Summary Statistics	Freq.	%	Freq.	%	Freq.	%
Sample (N)	306		547		139	
Mean Age	30.83		31.88		27.89	
Mean no. of Children ever born	2.69		2.89		2.19	
LGA						
Ado-Odo Ota LGA	-	-	363	66.4	-	-
Abeokuta South LGA	-	-	184	33.6	-	-
Sagamu LGA	176	57.5	-	-	-	-
Ijebu-Ode LGA	130	42.5	-	-	-	-
Obafemi Owode LGA	-	-	-	-	139	
Ethnicity						
Yoruba	181	59.2	333	60.9	84	60.4
Igbo	51	16.7	104	19.0	27	19.4
Hausa	25	8.2	32	5.9	4	2.9
Others	49	16.0	78	14.3	24	17.3
Total	306	100.0	547	100.0	139	100.0
Age						
< 25 years	87	28.4	168	30.7	58	41.7
25-39 years	147	48.0	277	50.6	70	50.4

40 & above	72	23.5	102	18.6	11	7.9
Total	306	100.0	547	100.0	139	100.0
Marital Status						
Single	107	35.0	200	36.6	78	56.1
Married	160	52.3	259	47.3	52	37.4
Divorced	10	3.3	24	4.4	3	2.2
Widowed	17	5.6	31	5.7	5	3.6
Separated	12	3.9	33	6.0	1	.7
Total	306	100.0	547	100.0	139	100.0
Education						
No formal education	34	11.1	49	9.0	12	8.6
Primary education	92	30.1	132	24.1	21	15.1
Secondary education	94	30.7	185	33.8	66	47.5
Tertiary education	86	28.1	181	33.1	40	28.8
Total	306	100.0	547	100.0	139	100.0
Religion						
Christianity	211	69.0	371	67.8	104	74.8
Islam	82	26.8	136	24.9	31	22.3
Traditionalist	4	1.3	25	4.6	3	2.2
Others	9	2.9	15	2.7	1	.7
Total	306	100.0	547	100.0	139	100.0

Source: Field survey, 2016

2.2.2 Breast Cancer Knowledge and Awareness

Almost all the respondents in the study area have heard about breast cancer: rural = 90.55%, urban = 90.7%, semi-urban = 83.5%, with only a fraction admitting otherwise. An appreciable number have also heard of Breast Self-Examination (BSE): 70.6% in the rural area, 72.8% in urban, and 64.0% in semi-urban. However, when asked about how to carry out the BSE procedure, just about half of the total respondents answered in the affirmative: rural = 56.2%, urban = 57.6% and semi-urban = 40.3%. This result revealed that, although a higher proportion of the study population have heard about breast cancer and BSE, the knowledge about the performance of the BSE procedure is still low. (See Table 2).

	Rural		Urban		Semi-Urban	
	Freq.	%	Freq.	%	Freq.	%
Ever Heard of Breast Cancer						
Yes	277	90.5	496	90.7	116	83.5
No	29	9.5	51	9.3	23	16.5
Total	306	100.0	547	100.0	139	100.0
Ever Heard of BSE						
Yes	216	70.6	398	72.8	89	64.0
No	90	29.4	149	27.2	50	36.0
Total	306	100.0	547	100.0	139	100.0
Know How to Perform BSE						
Yes	172	56.2	315	57.6	56	40.3
No	134	43.8	232	42.4	83	59.7
Total	306	100.0	547	100.0	139	100.0

Source: Field survey, 2016

Corroborating this report is the response of one of the IDI participant:

“I have heard of breast cancer, my mother had it but we lost her, going to 7 years now, but I don't know how to do a Breast Self-Examination o” (Close acquaintance of a BC patient from Abeokuta South)

2.2.3 Respondent's Perceived Risk of Breast Cancer

Respondent's perceived risk of breast cancer was analysed in this section. It was assumed that a woman's perception of her risk of getting breast cancer may prompt her into taking steps that may protect her from the disease.

	Rural		Urban		Semi-Urban	
	Freq.	%	Freq.	%	Freq.	%
Know Someone that have had Breast Cancer						
Yes	90	29.4	165	30.2	34	24.5
No	196	64.1	346	63.3	100	71.9
Total	286	93.5	511	93.4	134	96.4
View BC As Threat						
Yes	114	37.3	204	37.3	35	25.2
No	124	40.5	223	40.8	79	56.8
Total	238	100.0	427	100.0	114	100.0
Ever Worried About BC						
Yes	50	16.3	88	16.1	16	11.5
No	227	74.2	417	76.2	123	88.5
Total	327	90.5	505	92.3	139	100.0
At risk of getting Breast Cancer						
Yes	54	17.6	83	15.2	17	12.2
No	227	74.2	415	75.9	122	87.8
Total	281	100.0	498	100.0	139	100.0

Source: Field survey, 2016

Respondents' opinion were sampled based on their 'knowledge of someone that have had breast cancer, if they viewed breast cancer as threat, if they ever worried about getting breast cancer and if they think they may be at risk of getting breast cancer'.

Given the fatality of the disease, many respondents took offence when asked all of these questions and only a fraction hesitantly answered the question. Analysis revealed that, 29.4% of the total respondents from rural areas knew someone who have had breast cancer: 30.2% knew from urban areas, and 24.5% knew from semi-urban areas. Additionally, of the total respondents sampled in the rural area, 37.3% viewed breast cancer as threat, 37.3% also viewed it as threat in the urban area, while 25.2% saw breast cancer as threat in the semi-urban area.

For those respondent that claimed to have ever worried about getting diagnosed with breast cancer, 16.3% are from rural areas, 16.1% are from urban, and 11.5% are from the semi-urban area. When asked if they think they could be at risk of being diagnosed with breast cancer, respondents that answered in the affirmative from the rural area are 17.6%, 15.2% are from the urban area, while 12.2% are from the semi-urban area. Going by all of these responses, it is clear that majority of the respondents do not perceive themselves as being vulnerable to breast cancer. These findings may have a negative implication for the curtailment of the disease as feelings of non-vulnerability may reduce the propensity to engage in preventive and protective action against the disease as espoused by the 'Fear Appeal theory' of Maddux and Rogers, (1983).

2.2.4 Respondents Behavioural Disposition to Breast Cancer Screening

The behaviour of respondents towards breast cancer screening was presented in this section. Respondents were asked two key questions: 'What would be the first thing you will do if you discovered an unusual change and discomfort in your breasts?' and 'If there is a free breast cancer screening center in your area, would you go for screening?' Presented below are the responses according to areas sampled.

	Rural		Urban		Semi-Urban	
	Freq.	%	Freq.	%	Freq.	%
1st Thing to do when Unusual Change and Discomfort is Felt in Breasts						
Will visit hospital	190	62.1	378	69.1	108	77.7
Will pray	53	17.3	62	11.3	18	12.9
Will take herbal mixture	28	9.2	58	10.6	11	7.9
Self-Medication	35	11.4	49	9.0	2	1.4
Total	306	100.0	547	100.0	139	100.0
Would go for Free BC screening						
Yes	229	74.8	397	72.6	97	69.8
No	62	20.3	124	22.7	39	28.1
Total	291	95.1	521	95.2	136	97.8

Source: Field survey, 2016

Majority of the respondents said they will visit the hospital when asked about the first thing they will do if they discovered an unusual change and discomfort in their breasts: rural = 62.1%, urban = 69.1%, and semi-urban = 77.7%. A few said they will pray, while a handful said they will take herbal mixture and engage in self-medication. As regards attendance of free screening program, majority of the respondents claimed they will go for the screening: rural = 74.8%, urban = 72.6% and semi urban = 69.8%.

2.2.5 Respondent's Perceived Risk of Breast Cancer and Behavioural Disposition towards Breast Cancer Screening Using Binary Logistic Regression (BLR)

This model tested respondent's behavioural disposition to 'screening attendance' against some selected independent variables: 'at risk of getting BC', 'age', 'locality', 'religion', 'marital status', 'education' and 'occupation'.

The hypothesis estimated the log of likelihood $\log\left(\frac{p}{1-p}\right)$ on the independent variable.

$$\log\left(\frac{p}{1-p}\right) = \alpha + X_1\beta_1 + X_2\beta_2 + X_3\beta_3 \dots X_n\beta_n$$

β = Coefficient. It is interpreted by the signs -ve or +ve, and it is equivalent to correlation definitions. It defines the type and the magnitude of relationship; SE = Standard Error; Wald = interpreted by its magnitude. The bigger the 'Wald', the more likely the variable is significant; d.f = Degree of freedom, calculated as $n - 1$; Sig. = P value/significance level; Exp (β) = Odd ratio indicating the likelihood of the occurrence of the independent variable (<1 is less likely, >1 is more likely); C.I = Confidence Interval. It expresses the confidence level of the parameter estimated to show the level of certainty that the true mean lie within the range between upper and lower boundary, RC = Reference Category.

Model 1								
Table 5. Binary Logistic Regression Illustrating Relationship between Respondent's Perceived Risk of Breast Cancer and their Behavioural Disposition to Breast Cancer Screening								
Selected Variables	B	S.E.	Wald	df	Sig.	Exp(B)	95% C.I. for EXP(B)	
							Lower	Upper
At Risk of BC								
No	RC							
Yes	.411	.323	1.616	1	.204	1.508	.800	2.841
Not sure	.330	.275	1.448	1	.229	1.391	.812	2.383
Age								
<25years	RC							
25-39 years	.015	.304	.003	1	.960	1.015	.559	1.843
40 & above	-.435	.222	3.845	1	.050	.647	.419	1.000
Locality								
Urban	RC							
Semi-Urban	.168	.242	.482	1	.488	1.183	.736	1.899
Rural	.136	.222	.378	1	.539	1.146	.742	1.769
Religion								
Christianity	RC							
Islam	.313	.475	.434	1	.510	1.368	.539	3.469
Traditionalist	.079	.487	.026	1	.871	1.082	.417	2.808
Other	-.669	.609	1.206	1	.272	.512	.155	1.691
Marital Status								
Single	RC							
Married	.893	.411	4.726	1	.030	2.442	1.092	5.461
Divorced	.614	.350	3.089	1	.079	1.848	.932	3.667
Widowed	.789	.509	2.404	1	.121	2.201	.812	5.966
Separated	-.047	.439	.012	1	.914	.954	.403	2.256
Education								
No formal Education	RC							
Primary	.479	.296	2.626	1	.105	1.615	.905	2.883
Secondary	.371	.206	3.237	1	.072	1.450	.967	2.172
Tertiary	.122	.186	.426	1	.514	1.885	.615	1.276
Occupation								
Unemployed	RC							
Farming	-.887	.446	3.950	1	.047	.412	.172	.988
Trading	-.552	.415	1.775	1	.183	.576	.255	1.297
Skilled	-1.316	.416	10.021	1	.002	.268	.119	.606
Clerical and allied	-.887	.370	5.745	1	.017	.412	.200	.851
Professional	-.796	.365	4.752	1	.029	.451	.220	.923
Constant	.716	.740	.936	1	.333	2.046		
Overall Percentage = 73.2, Cox & Snell R Square = 0.050, Nagelkerke R Square = 0.072								

Model 1 measured behavioural disposition of respondents towards 'breast cancer screening', and their perceived risk of breast cancer. As illustrated in table 5, there is a positive association between respondents that think they can be at risk of BC and screening attendance ($\beta = 0.411$). That is, women that think they can be at risk of BC will be 1.508 times more likely to attend BC screening compared to women that think differently. The association is however not statistically significant, P-value = 0.204 {95% C.I (0.800 – 2.841)}. This indicates no significant relationship between respondent's behaviour towards screening attendance and

the risk of getting BC.

Looking at the age of respondents, a +ve relationship can be observed between women aged 25-39 years and screening attendance ($\beta = 0.015$). They will also be 1.015 times more likely to go for BC screening when compared with women <25years. The relationship is not statistically significant, p-value = 0.96, {95% C.I (0.559 – 1.84)}.

In the same vein, locality showed a +ve association in relation to screening attendance ($\beta = 0.168$ and 0.136), meaning women residing in semi-urban and rural areas are 1.649 and 1.658 times more likely to go for BC screening when compared to those residing in urban areas, but the relationship is not significant at p-value = 0.49 and 0.54. There is therefore no significant relationship between locality and screening attendance.

As regards religion, there exists a +ve relationship between screening attendance and Islamic and traditional religion, ($\beta = 0.313$ and 0.079), meaning, women belonging to these categories of religion will be 1.368 and 1.082 times more likely to go for breast cancer screening compared to Christians. The relationship is not significant at p-value = 0.510 and 0.871. Although other religion is showing a -ve relationship, but the relationship is not statistically significant, p-value = 0.272. It can therefore be said that, no significant relationship exist between religion and screening attendance.

With reference to marital status, a +ve association could be detected between screening attendance and women belonging to all categories of marriage (0.893, 0.614 and 0.789), 'except 'separated' ($\beta = - 0.047$). This is suggesting that, women belonging to these categories except 'separated' will be 2.442, 1.848 and 2.201 times more likely to go for breast cancer screening when compared to single women, while separated women will be 0.954 times less likely to go for BC screening. The relationship between married women and screening attendance is statistical significant at p-value = 0.030, while the remaining categories did not reflect any statistical significance p-value = 0.079, 0.121 and 0.914.

A +ve association was also noted in all the categories of education ($\beta = 0.479$, 0.371 and 0.122) implying that, they will all be 1.615, 1.450 and 1.885 times more likely to attend a BC screening program compared to women without a formal education, but there was no statistical significance observed in all the categories, p-value = 0.105, 0.072 and 0.514, suggesting that there is no significant relationship between education and BC screening attendance.

With respect to occupation, a –ve relationship was detected in all categories of occupation as shown in table 31, implying that women engaged in all the listed occupation will be 0.412, 0.576, 0.268, 0.412 and 0.451 times less likely to go for BC screening when compared to unemployed women. Statistical significance was also noted under farming, p-value =0.04, skilled, p-value = 0.002, clerical and allied, p-value = 0.02, and professionals p-value = 0.03. No statistical significance was however noted, as regards women engaged in trading activities, p-value = 0.18.

The model summary indicated overall percentage of 73.2, indicating that the model is 73.2% sufficient to capture the hypothesis. However, the Cox & Snell R Square and Nagelkerke R Square are 0.050 and 0.072 implying the independent variable could only explain between 0.05 and 0.07 percent of the variation in respondent's breast cancer screening attendance.

It therefore suffice to conclude that there is no enough evidence to validate the assumption that women's behavioural disposition to breast cancer is determined by their perception of vulnerability given the result of analysis as revealed in the two models. Consequently, it can be said that women's behavioural disposition to breast cancer is not determined by their perception of vulnerability.

Looking at the result from some of the IDI sessions conducted to support the quantitative method for this study, an interviewee has this to say to buttress these findings:

...many people think that they cannot get the disease. They see it as a disease of the rich because of all the junks that rich people eat... (Close acquaintance of a breast cancer patient from Sango Ota).

Another interviewee had this to say:

...women around here are more influenced by their religion. They belief breast cancer is an attack, they don't know much about health, but they belief there are forces responsible for it. You see these people from polygamous homes, they will say it is one

woman that is after them. They don't normally believe that it is something medical...(Close acquaintance of a breast cancer patient from Ijebu Ode).

3 DISCUSSION

According to Rosenstock (1974), in order to engage in a healthy lifestyle behaviour, there is a need for a perception of personal risk or vulnerability, and in order to accurately measure vulnerability, individuals should be able to feel susceptible to a particular threat and must also perceive the threat as severe. This will inform the actions they take in order to salvage or treat a health condition. This study on the contrary found that, perception of vulnerability, although an important component of behavioural change, is not a sufficient enough variable that is capable of impacting on women's behaviour and disposition towards breast cancer in the study area. Considering the results from the IDI conducted to support the quantitative method for this study, issues surrounding cultural/traditional beliefs and religion stood out as major determinants of behavioural disposition towards breast cancer. Other issues raised by interviewees include cost, time and discouraging long queues at screening centers.

In a similar study that examined beliefs and attitudes about breast cancer and screening practices among Arab women living in Qatar, it was reported that many complex beliefs, values and attitudes influence Arab women's behavioural disposition towards breast cancer (Donnelly, Al Khater, Al Bader, Al Kuwari, Al-Meer, Malik, Singh, Chaudhry & Fung, 2013). Cultural values, beliefs and attitudes were seen as major determinants of perception of breast cancer vulnerability, and having a cancer diagnosis was often accompanied by social stigma. In some societies, a cancer diagnosis was seen as carrying a significant amount of stigma, myth and taboos, while culture was also viewed as having a major influence on patients' and communities' perceptions of cancer risks (Daher, 2012; Kagawa-Singer, Dadia, Yu & Surbone, 2010).

In another related study that adopted a Focused Group study to examine the determinants of breast cancer screening behavior among women in the United Arab Emirates, the impact of a "significant other" was emphasized. It was reported in the study that some male relatives who objected to breast cancer screening were mentioned by some study participants as an important factor that impacted on their behavioural disposition towards breast cancer (Bener, Honein, Carter, Da'ar, Miller & Dunn, 2002).

Other interesting findings from literature have also recounted how many women particularly in Sub-Saharan Africa often live in denial of their risk majorly because of fear of death and deformation from mastectomy and chemotherapy treatment and thus evade diagnosis and delay treatment (Fregene & Newman, 2005; Mdongolo, de Villiers & Ehlers 2004; Clegg-Lampthey, Dakubo & Attobra, 2009).

4 CONCLUSION AND RECOMMENDATION

It can be concluded that how women behave when faced with an incidence of breast cancer rather than being determined by how they perceive their risk of breast cancer is on the contrary influenced by issues surrounding cultural taboos, traditional health beliefs and spirituality. Issues that bother around how women perceive their risk of developing breast cancer and their attitude towards screening are thus better understood from a socio-cultural, socio-economic and spiritual dimension rather than from a psycho-analytical and bio-medical perspective.

Based on the findings from this study, the following have been recommended for policy:

1. Future policies and programs of the government and major stakeholders may be structured in a religious and culturally sensitive manner to correct wrong and uneducated beliefs about breast cancer in order to help women make accurate and informed risk assessment for prompt preventive action aimed at reducing breast cancer related morbidity and mortality.
2. Women's life experiences and personal beliefs about breast cancer should be put in consideration when designing policies and programs so as to make these programs yield the desired result which is behavioural modification.

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