Short report

Socio-demographic factors and reasons associated with delay in breast cancer presentation: A study in Nigerian women

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Abstract

We evaluated the effects of selected socio-demographic factors on late presentation and reasons why our breast cancer patients delay reporting for treatment. All female breast cancer patients referred to one of the general surgery out-patient clinics of Lagos State University Teaching Hospital between January 2009 and December 2010 were interviewed. Relevant socio-demographic and clinical data were obtained and reasons for patient delay documented. Univariate and multivariate logistic regression analyses were conducted to calculate odd ratio for delay. A total of 201 patients were enrolled. Mean duration of symptoms was 12.12 months (SD ± 5.18). Delay for more than 3 months before initial medical consultation was observed in 164 patients (81.6%). Increased risk of late presentation was associated with single women (OR = 2.054), primary level of education (OR = 3.059), negative history of benign breast disease (OR = 1.648) and pre-menopause (OR = 1.861). Ignorance of the nature of illness, belief in spiritual healing, fear of mastectomy and belief in herbal treatment were the leading reasons for delay. Women with higher risk of late presentation should be the target group during interventions aimed at raising breast cancer awareness. Reasons for patient delay should also be addressed.

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Introduction

Breast cancer is the most common female cancer in Nigeria.1 In developing countries, including Nigeria, late presentation with advanced disease when treatment offers little or no benefit is common.1,2 Low level of awareness and knowledge about breast cancer is associated with delayed presentation.3 In addition, socio-demographic factors such as level of education, age, marital status, history of breast disease, family history of breast cancer among others are also related to delayed presentation.2,3 Other reasons for late presentation include fear of mastectomy, belief in prayer houses and herbal treatment, economic reasons, ignorance of the nature of ailment and denial of illness.3,4

Studies on delay among Nigerian breast cancer patients have not examined the influence of socio-demographic factors on late presentation. It is, therefore, desirable to assess the effect of these factors on late reporting and also review the reasons for delay among our patients. Findings may assist in developing appropriate strategies in breast cancer public education initiatives aiming at reducing delay. This study is designed to evaluate the influence of selected socio-demographic factors on late presentation and to know the reasons for delayed reporting of breast cancer patients in Lagos State University Teaching Hospital, Ikeja, Lagos, Nigeria.

Patients and methods

All female breast cancer patients referred to one of the general surgery out-patient clinics of Lagos State University Teaching Hospital between January 2009 and December 2010 were prospectively studied. They were interviewed using a structured socio-demographic questionnaire to document age, marital status, occupation, level of education and religion. Additional information documented were family history of breast cancer, history of previous breast lump, parity and menopausal status. Duration of symptoms were obtained and patient were classified into those that presented early i.e. interval of ≤3 months from time of symptoms commencement and first medical consultation and those that presented late i.e. after 3 months. Reason(s) for late presentation were also documented. Clinical stage of the tumour in each patient was determined and diagnosis of breast cancer confirmed by fine needle aspiration cytology or core-needle biopsy. Data was analysed employing SPSS version 15.0. Frequency
distributions were produced and logistic regression analysis (univariate/multivariate) was conducted to examine the effect of socio-demographic factors on delay in presentation. Predictor variables were age, marital status, religion, level of education, menopausal status, parity, history of previous benign breast disease and family history of breast cancer.

Results

A total of 201 patients were enrolled into the study. The mean age was 49.82 (SD ± 13.59) while age range was from 23 to 104 year. Mean duration of symptoms was 12.12 months (SD ± 5.18). Range of symptoms duration was from 1 week to 96 months. One hundred and sixty four patients (81.6%) delayed for more than 3 months before initial medical consultation. Ignorance of the nature of illness, belief in spiritual healing, fear of mastectomy and belief in herbal treatment were the leading causes of late presentation. Table 1 shows the characteristics of the breast cancer patients.

In the logistic regression test, univariate analysis showed that there was higher risk of late presentation in women who were unmarried (OR = 2.054, 95% CI: 0.252–16.759), those with primary level of education (OR = 3.059, 95% CI: 0.962–9.731) and those who did not have previous benign breast disease (OR = 1.648, 95% CI: 0.756–3.593). In the multivariate analysis, being pre-menopausal (OR = 1.861, 95% CI: 0.383–9.039) was the additional factor associated with increased risk of late presentation.

Discussion

In this study, more than 80% presented late. This finding is similar to what was reported in previous studies among breast cancer patients in Nigeria. Late presentation is associated with advanced stages of tumour before treatment and poor prognosis. This condition is now a leading cause of cancer deaths among women. Nigerian women would not readily discuss issues concerning their breast symptoms with someone else immediately. This phenomenon is recognised as a contributory factor to delay in seeking help. It is also shown that breast cancer patients who had low level of formal education were at higher risk of late presentation. Similar finding was reported in studies from other parts of the world. Although, awareness about breast cancer is low in Nigeria, women with higher level of education were found to have better knowledge of the disease. They were also more likely to carry out regular breast self examination and accept mastectomy when necessary. Patients who did not have previous benign breast disease had increased risk of late presentation among our study participants. Strong association between late stage breast cancer and history of benign breast disease has been reported. Women who have had previous breast disease may be more breast aware and less afraid of treatment, therefore seeking help early. There was no association between age, parity, religion and positive family history of breast cancer and delayed presentation by patients in this study.

Ignorance of the seriousness of breast symptoms was the most common reason for delay in our patients. Other prominent reasons were fear of mastectomy, belief in traditional herbal medicine and belief in spiritual healing. Studies have shown that knowledge of this disease is poor among Nigerian women especially the less educated and rural dwellers. Two decades ago, fear of mastectomy was the most frequent cause of late presentation among breast cancer patients in Lagos, Nigeria. Furthermore, a recent study among Nigerian female health care professionals showed that more than half believed that breast cancer can disappear following prayer. A significant proportion also believed in traditional herbal cure for breast cancer.

Conclusion

Health education and other interventions aimed at raising breast cancer awareness should focus more on the groups of women with higher risk of delay. Information on reasons for delay could be used in the design of health talks and programmes to increase awareness and knowledge of breast cancer in our communities.

Conflict of interest statement

The authors declare that they have no conflict of interest.

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Ethical approval

The institution’s research ethics committee approved conduct of the study.

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References


