

**COMMUNITY SENSITIZATION ON WOMEN'S CANCERS THROUGH
AWARENESS CUM SCREENING PROGRAMMES USING MOBILE CLINIC: A
PILOT STUDY IN DELHI-NCR FOR DETECTING WOMEN WITH
ABNORMALITIES IN CERVIX AND BREAST**

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ABSTRACT

World Healthal Trust focused on community outreach activities for the prevention of women's cancers through early detection and timely treatment, mainly targeting the underprivileged populations. The main objective was to spread awareness about the causes, risk factors, precautions and importance of early screening and timely treatment for the four cancers that only affect women. A cross-sectional study was done involving women attending the cancer awareness and screening camps where random screening using primary screening methods of women for breast and cervical cancers were done. Out of around 1400 women 107 were screened for cervical and breast cancer in a well equipped mobile clinic. Out of 107 women screened, 18.7% and 8.4 % were observed to be positive with VIA & early signs of breast tumors respectively. Out of those found to be positive for VIA, 80% were from rural community. Vaginal infections were reported in 42.4% women and 65% women having abnormalities in cervix had got married before age 18. Specially designed IEC material (leaflets, brochures and posters) was distributed, besides popular talks and direct interaction with communities. This study showed low uptake of screening test and low level of knowledge on prevention of breast and cervical cancer. It thus warrants urgent extensive health education programmes especially for underprivileged rural women.

KEY WORDS: Cervical/Breast Cancer, WOW Cancer Express, Awareness, Screening

INTRODUCTION

Women are adept at assuming myriad roles in a family as they may multi-task to be a bread winner and a perfect homemaker all in one. Sure, a woman could be quite likened to the root of a plant, for she has an inherent ability to take care of everyone at home to bring balance

and harmony in the fabric of life. However, for most women, their own health in general and reproductive health in particular takes a back seat. Indian women are, therefore, at a very high risk for breast and gynecological cancers (cervical cancer, ovarian cancer and endometrial cancer). Cancer is an important cause of increased mortality and morbidity rates in the world. Independent of present and future measurements, it is estimated that the number of new cancer cases will increase from 12.7 million in 2008 to 21.4 million by 2030 (WHO,2007,2011). Cervical Cancer is the most common women's cancer in India. It has been estimated that over 80,000 women die from cervical cancer in India every year, (Sankaranarayanan R et al 2008, IARC. GLOBOCAN, 2008) with an age-standardized incidence rate of 27 per 100,000 women and age standardized mortality 15.2 per 100,000 (IARC GLOBOCAN, 2008). Over a 25-years period, the number of cases of cervical cancer has steadily increased in India, with over 80% of cases occurring amongst rural women (Chhabra S et al, 2010). Breast cancer is second most prevalent cause of cancer death in women, but on timely detection followed by proper treatment, the spread of cancer cells from the breast to other parts of the body can be prevented. Cervical cancer occurs in women between 28-45 years, though younger women do present full blown cancer. The tragedy of cervical cancer is that while a woman dies every 7 minutes from it, this is a completely preventable cancer. Cervical cancer is very rarely seen in women less than 20 years of age, but approximately 20% of cases occur in women over 65, demonstrating the necessity of continued screening procedures. According to the World Health Organization (WHO), most cases of cancer are detected only in the advanced stages, when they are untreatable. Cervical cancer and Breast cancer are the two most common cancers in India but awareness about them is quite low amongst Indian women (Shah V et al, 2012), although there are proven screening methods to diagnose the disease at an early stage when it is curable. The problem is that the patient at this stage is totally asymptomatic and most Indian women do not consult a doctor till the disease is in its advanced stage.

Basically, women do not go for preventive screening of these cancers due to their low educational level, family income status, ability to access healthcare services and similar socio-demographic and economic features, besides their personal health-related beliefs and attitudes, (Whitman S et al, 2007, Goel MS et al, 2010) shyness and lack of adequate facilities for screening and treatment of these cancers in primary health centers of the country and, most importantly, lack of organized screening programmes by the Govt. Sure then, the need of the hour is to create public awareness on the importance of preventive screening of

cancers that affect only women as these cancers are fully treatable in the early stages while they become malignant and untreatable in the advanced stage.

There is more than sufficient evidence to show that early detection and screening for cervical cancer reduces morbidity and mortality, even in low-resource settings (Garland SM et al, 2008, Juneja A et al, 2007, Christie DM et al, 2008, Cuzick J et al, 2008). One-time screening with VIA reduces the life-time risk of invasive cervical cancer by 25-30% and this would cost less than 0.5% of GDP if introduced in India (Sankaranarayanan R et al, 2007a, 2007). Thus there is a need to sensitize women through awareness campaigns to undergo cervical cancer screening at regular intervals. It is suggested that written and visual campaigns should be used to educate a larger population, thus increasing the participation rates for cancer screening programs (Guvenc Gulden et al, 2012). In this paper we have determined the level of awareness, the role of IEC material and the uptake of breast and cervical cancer screening in Delhi-NCR region as a pilot study.

MATERIALS AND METHODS

To prevent the high occurrence of cancers among rural women, several community awareness programmes and screening health camps have been conducted by World Health Trust (WHT) in Delhi-NCR region, with facilities of registration, counseling, screening and referral. The main objective was to spread awareness about the causes, risk factors, striking symptoms, precautions, importance of early screening and timely treatment of the four cancers that only affect women, while screening the registered women for early signs of breast and cervical cancer using primary screening methods. The ultimate goal was to promote cancer prevention among the women community, reduce the number of deaths caused due to these cancers and providing timely treatment to those affected.

Several public awareness/advocacy programmes for women was organized in different blocks of Greater Noida: PHC, Bisrakh; PHC, Jewar; PHC, Dankaur; CHC, Dadri; CHC, Baldalpur and Awareness cum screening camps in Delhi-NCR region: GRC-URIDA (Old Palam Colony, New Delhi); GRC-MANCH (Raghubeer Nagar, New Delhi); Community centre, Old Rajender Nagar; CHC, Bhangel, Sector-110, Noida; RWA Community Centre, Sector 11, Noida and Sector Gamma-II, Greater Noida. In all the camps, scientists from World Health Trust addressed the gathering and sensitized women about the prevalence of the four women's cancers in our country, their risk factors and symptoms associated with each of the cancers and importance of early screening and timely treatment. Munnadi (mike

announcement) was conducted a day prior to the camp in the near-by areas of camps for inviting as many people as possible. Specially designed, easy-to-understand leaflets (in Hindi) on all the four women's cancers were also distributed among the audience. All queries of the general public related to the four women's cancers were answered by scientific staff along with the gynecologists (Figure: I). Posters on cervical cancer (size= 23" × 36", four colour) for the general public (in both English & Hindi) and pamphlets for disseminating key messages on cancer prevention & management (in both English & Hindi) on women's cancers specially developed by WHT were also pasted at multiple locations for easy readability.

After the advocacy round, the women were requested to register themselves for getting screened for cervical and breast cancers. The screening was performed inside the fully equipped WOW Cancer Express (Mobile Gyne Clinic) (Figure: I). The screening of cervical cancer was done by Gynecologists on-board using Visual Inspection with Acetic Acid (VIA) method for the detection of pre-cancerous lesions in the cervix, which turn aceto-white by the application of freshly prepared 3-5% acetic acid to the cervix area. For breast cancer detection, the screening method used was breast physical examination (BPE). In each camp more than 100 women were counseled, out of which around 25 women in each camp were screened inside the WOW Cancer Express.

RESULTS

Women actively participated on the days of camps as prior publicity of the event was done covering all near-by areas. A total of 125 women who registered for screening, 107 women were screened during all the camps conducted for detecting any signs of both cervical cancer and breast cancer. In this group of screened women, twenty women (18.7 %) showed aceto-white lesions that were visually observed on the application of 5% of acetic acid on cervix. They were in the age group of 30-50 yrs and were recommended to get the Pap smear test done. Out of the 107 women screened for breast cancer, nine (8.4 %) were observed to be positive with a firm lump or abnormal changes like the discharge from nipples which are early signs of breast tumors (Table: I). White discharge, irregular periods and pain in lower abdomen were the most common complaints reported by 25 (23.4%), 32 (29.9%) and 18 (16.8%) women, respectively (Figure: II). Vaginal infection (cervical erosion, acute cervicitis and foul smell etc.) was reported by 53 (42.4%) women. This can be attributed to poor genital hygiene and presence of sexually transmitted diseases (STDs) especially among the rural

women. Personal cleanliness, on the part of both men and women, appears to be a crucial factor in the development of cervical cancer. Results also showed that early marriage, or more specifically intercourse before the age of 18 years, is associated with increased risk of cervical cancer. It was observed that 65% of women with abnormal changes in cervix had got married before age 18 (Figure: III). Some other studies have also reported a significant association of cancer cervix with these risk factors (Dutta PK et al, 1990, Caplash N, Sobti C. 1999, Prabhakar AK, Menon GR. 1995, Sharma P et al, 2010). Studies have revealed conflicting results over whether or not pregnancy or childbearing have any effect on eventual cervical cancer. It is not certain whether the disease is associated with repeated pregnancies, or method of delivery.

We found lack of awareness to be a major factor that contributes to high burden of these cancers among Indian women. All women presented in the study were married. Only few women had ever heard of cervical cancer, none of them reported exact purpose of the VIA test. The male partner was the sole decision maker of the family for a majority of women. About one-tenth women (107/1000) from the awareness camps availed the on-site screening test due to shyness, hesitation and fear of getting abnormal findings. There was, however, no significant difference between the respondents from Rural (56 %) and urban areas (44%) who attended the camps and got screened (Figure: IV) but results showed that 80% women observed to be VIA positive were from rural areas as compared to those from the urban areas, which can be attributed to poor genital hygiene and lack of awareness.

A majority of women were aware of the word 'cancer' irrespective of the location of cancer in the body. About more than half of the participating women knew about the objective of conducting the camps as they had received information through mike announcement (Munnadi) and pamphlets/leaflets distributed in their areas. This reinstates the fact that similar screening drives should be conducted on a regular basis so that lives of many women can be saved from preventable cancers.

CONCLUSION

Cancer of the cervix is associated with a number of related factors, none of which have been proven to be the only cause of this disease. No one factor is universally present in all cases of cervical carcinoma. Many of these factors tend to be based on socio-economic conditions relating to poverty, poor personal hygiene and general health, multiple sex partners, and beginning sexual activity at an early age. For the present, the most effective means of

controlling cervical and breast cancer is widespread screening by detection with regular primary screening methods namely, VIA/Pap test and BPE respectively, for all women. Awareness lectures were organized out of the realization that most of the fear associated with breast and cervical cancer is due to lack of knowledge. People needed to be told that cancer was preventable, if detected at an early stage, and treated promptly.

In this study, the awareness about screening and available facilities was increased by mobile cancer screening using advertisement methods (mike announcements), and distribution of leaflets, brochures and posters. Mobile cancer screening facility can act as an important tool in cancer prevention and control especially among rural, underprivileged women having low socio-economic background. Mike announcement is an oral communication method which has been found to be very useful in creating awareness among uneducated, rural communities. These findings indicate that the right use of advertizing methods appreciably influences the spread of awareness among different communities.

Our result shows that vaginal infection was reported by 53 (42.4%) women, and 80% women observed to be VIA positive were from rural areas. The level of uptake of screening test was very low (around 1/10th), indicating that urgent extensive health education programmes for women should be pursued. Our findings observe that implementation of such educational programmes in rural communities could result in major change in the country's clinical scenario for these cancers. These findings highlight the utility and need of cancer screening at regular intervals through community based camps. Mobile cancer screening may be a feasible option in a developing country like India where cancer of cervix and breast are serious public health problems. However, compliance to future screening with mobile facility needs to be studied to incorporate such a method in the National screening policy, if developed in future.

Table 1: Clinical Findings of women screened with area wise respondents

| No of Women Screened | Observations | Abnormalities | Suspect Cases | Rural / Urban R/U |
|-----------------------|----------------------|--|---------------|-------------------|
| 107 | Cervical Abnormality | VIA +ve | 20 | 16R |
| | | | | 04U |
| | Breast Abnormality | Lumps etc | 09 | 06R |
| | | | | 03U |
| | Vaginal Infections | Cervical erosion, acute cervicitis, foul smell | 53 | 32R |
| | | | | 21U |
| | Common Complaints | White discharge | 25 | 15R |
| | | | | 10U |
| | | Irregular periods | 32 | 20R |
| | | | | 12U |
| Pain in lower abdomen | | 18 | 14R | |
| | | | 04U | |

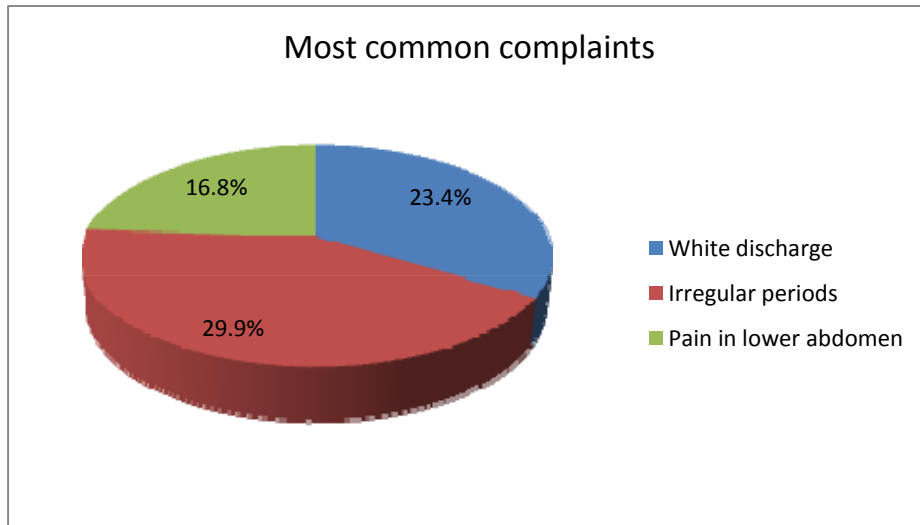


Figure II: Distribution of most common complaints reported by women

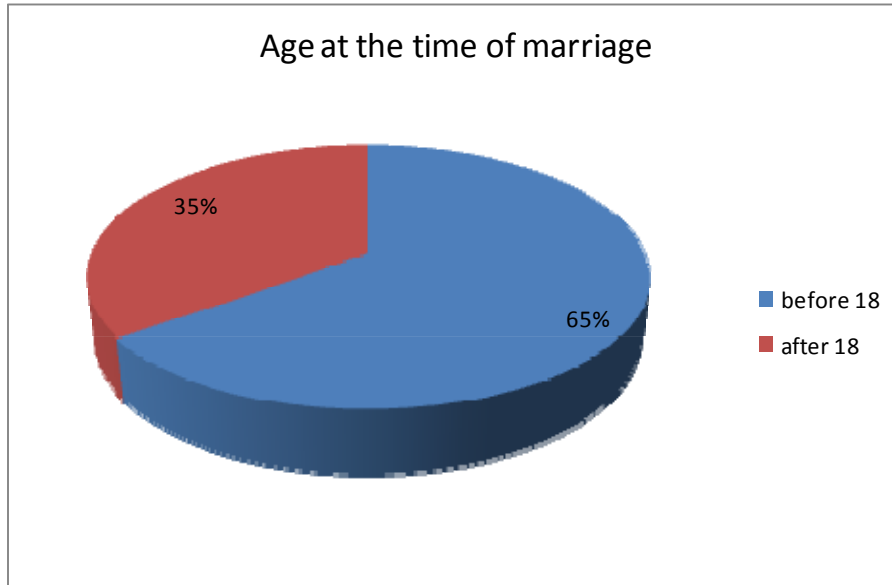


Figure III: Distribution of cervical cancer reported according to age at the time of marriage

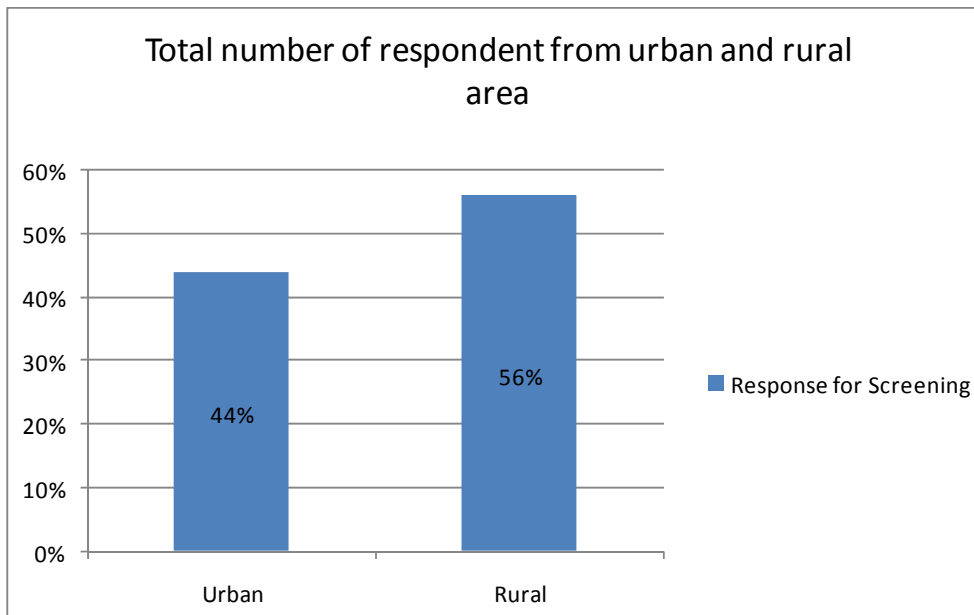


Figure IV: Area wise distribution of respondents for screening



Figure I : Different activities during the camps: (A) Image of WOW Cancer Express (WHT's mobile Gyne Clinic) (B) Experts addressing the gathering (C) Group discussion with women (D) Registration for screening (E) Screening inside the cancer express by gynecologist (F) Woman coming out after screening.

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