Women Health Outreach Program; a New Experience for all Egyptian Women

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ABSTRACT

The global health community faces a challenge with breast cancer being the most common cause of cancer related death among women around the globe. Since breast cancer’s pathogenesis is poorly understood, primary prevention is still a distant goal. Thus secondary prevention through early detection is the only feasible approach at present. With this strong conviction, the launching of the first Egyptian national screening program “Women Health Outreach Program” (WHOP), was announced on October 30th, 2007. This project is a government-funded program that offers free breast screening for all Egyptian women above the age of 45 years. In addition to free mammograms, the program gives the participants a chance to be screened for diabetes, hypertension and obesity as well. Positively detected cases are also offered the option of free management. During the period from October 30th, 2007, up to February 9th, 2009, 20,098 women in Cairo, Alexandria and Suez governorates were screened for breast cancer, diabetes, hypertension and obesity through the program. In this article we will represent the achievements, challenges and services delivered by WHOP.

Key Words: Breast cancer – Breast screening – Early detection – Breast biopsy.

INTRODUCTION

The global health community faces a challenge with breast cancer being the most common cause of cancer related death among women.
around the globe [1] accounting for more than 1.6% of all female deaths [2,3].

Incidence, mortality and survival rates vary across the world. One common feature across the world’s regions is that in many countries, breast cancer incidence rates are increasing. There is also an emerging disparity in long-term mortality trends, with mortality rising in parallel with incidence in some countries and declining in others, a difference likely attributed to the combined effect of earlier detection and effective therapy [4], which play synergistic roles in creating improved outcome [5].

The Arab world is facing similar and even more challenges, knowing that Arab women are affected younger than their counterparts in industrialized nations [6]. The National Cancer Institute in Cairo Registry reported breast cancer to represent 35.1% of female cancers in Egypt [7]. Extensive disease was also reported at presentation with stages III and IV representing 80-90% of detected cases. This means that many women in the community with early but palpable breast cancer fail to seek medical attention until their cancer is advanced [8].

Since breast cancer pathogenesis is poorly understood, primary prevention is still a distant goal. Thus, secondary prevention through early detection is the only feasible approach at present [9]. Early breast cancer detection is a core area of focus, because early cancers have a better prognosis with treatments that are more affordable and less resource-intensive to provide with much better outcomes [10].

With this strong conviction, the launching of the first Egyptian national screening program "Women Health Outreach Program" (WHOP), was announced on October 30th, 2007. This project is a government-funded program that offers free breast screening for all Egyptian ladies above the age of 45 years. In addition to free mammograms, the program gives these ladies a chance to be screened for diabetes, hypertension and obesity as well. Positively detected cases are also offered the option of free management.

During the period from October 30th, 2007 up to February 9th, 2009, 20,098 women in Cairo, Alexandria and Suez governorates were screened for breast cancer, diabetes, hypertension and obesity through the program.

Eligible women:

Breast cancer screening has been proven to be most effective in women between the ages of 50 and 70 years, with a 20 to 35 percent reduction in mortality due to breast cancer [11]. This equates to approximately one life saved for every 500 women screened. It is for this reason that most national breast cancer screening programs target women aged 50 to 69 years. Women aged 40 to 49 years have also been shown to benefit from breast cancer screening, but the advantage is less than that seen in older age groups. This decreased advantage can be explained by denser breast tissue in younger women, decreased sensitivity of the mammograms and by cancers which are less frequent but faster growing [12]. Therefore, the higher growth rate of these cancers requires more frequent screening [9,12].

Many differences with respect to age, stages at presentation, and biological characteristics exist among various countries. While 50% of all women with newly diagnosed breast cancer are older than 63 years in most developed countries, in many so-called developing countries almost half of the women with newly diagnosed breast cancer are younger than 50 years. In-situ disease has become more common in the developed world yet locally advanced and metastatic diseases at presentation remain very common in the developing countries. In view of younger ages at presentation in Arab countries, it is reasonable to adopt recommendations to start at the age of 40 years in those countries with adequate resources and where setups for benefit from early detection are available [6]. The Egyptian National screening Program (WHOP) invites women aged 45 years and older with the following specifications:

- No personal history of breast cancer.
- Have not had a mammogram within the past 12 months.
- Should carry a National Identification Card and should be a resident of the same location where the vans set.
There is a higher frequency of BIRADS 2 (definite benign) among women 70 years and older. There is also a higher frequency of BIRADS 4 (probably malignant) among women 60 years and older. There is increasing trend of BIRADS 5 by age.

Services offered:

Since the launching of WHOP, we were determined to ensure that attendants of the program receive the utmost care and services. To efficiently implement these services WHOP has initiated an actively running closed medical circuit including highly qualified radiologists, breast surgeons, pathologists as well as oncologists.

1- Screening for obesity:

The weights and heights of all screened women are measured and accordingly their body mass index (BMI) is calculated in order to compare weight and height. Though it does not actually measure the percentage of body fat, the BMI is a useful tool to estimate a healthy body weight based on how tall a person is [13]. The WHO regards a BMI of less than 18.5 as underweight, a BMI greater than 25 as overweight and above 30 as obese.

Amongst the screened population we had a very high incidence of over-weight and obese women (10215–74.4% and 2692–19.1%, respectively), yet no significant correlation was detected between obesity and breast cancer in the screened population (p value: 0.8188). 9.5% of detected BIRADS 4 and 5 cases were overweight and 30.5% were obese.

2- Screening for diabetes and hypertension:

Hypertension and diabetes mellitus are chronic medical conditions that frequently co-exist. There may be a causal relationship between hypertension and diabetes. Ladies joining our program are also given the opportunity to be screened for diabetes and hypertension as well.

There has been a worldwide increase in the prevalence of diabetes mellitus over the past 40 years worldwide. The epidemic of diabetes will continue to rise as there is growing prevalence of obesity in children, which predisposes to diabetes. There is considerable evidence for an increased prevalence of hypertension in diabetic patients as well. Moreover, each pathophysiological disease entity serves to exacerbate the other [14]. Obesity may be a precipitating factor for both hypertension and non-insulin-dependent diabetes mellitus [15].

A higher incidence of BIRADS 4 among diabetic women has been detected in the screened population. Also, a slightly higher BIRADS 4&5 among hypertensive women has been detected in the screened population.

Table (1): Correlation between the different age groups and BIRADS classification in the screened population (20,000 women).

<table>
<thead>
<tr>
<th>Birads Classification</th>
<th>&lt;50 yrs</th>
<th>50-59 yrs</th>
<th>60-69 yrs</th>
<th>&gt;70 yrs</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2793</td>
<td>3251</td>
<td>764</td>
<td>103</td>
<td>6911</td>
</tr>
<tr>
<td>2</td>
<td>3004</td>
<td>5587</td>
<td>2331</td>
<td>691</td>
<td>11613</td>
</tr>
<tr>
<td>3</td>
<td>311</td>
<td>449</td>
<td>145</td>
<td>35</td>
<td>940</td>
</tr>
<tr>
<td>4</td>
<td>98</td>
<td>148</td>
<td>79</td>
<td>20</td>
<td>345</td>
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<tr>
<td>5</td>
<td>14</td>
<td>40</td>
<td>21</td>
<td>9</td>
<td>84</td>
</tr>
<tr>
<td>Total</td>
<td>6220</td>
<td>9475</td>
<td>3340</td>
<td>858</td>
<td>19893</td>
</tr>
</tbody>
</table>

(N.B. Missing data: 205 cases)
316

Women Health Outreach Program

Table (2): The distribution of measured blood pressure among the different BIRADS cases.

<table>
<thead>
<tr>
<th>Birads classification</th>
<th>High RBS</th>
<th>Normal RBS</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>1151</td>
<td>5601</td>
<td>6752</td>
</tr>
<tr>
<td></td>
<td>27.91%</td>
<td>36.47%</td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>2691</td>
<td>8704</td>
<td>11395</td>
</tr>
<tr>
<td></td>
<td>65.25%</td>
<td>56.68%</td>
<td></td>
</tr>
<tr>
<td>3</td>
<td>179</td>
<td>517</td>
<td>918</td>
</tr>
<tr>
<td></td>
<td>4.34%</td>
<td>4.81%</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>91</td>
<td>178</td>
<td>333</td>
</tr>
<tr>
<td></td>
<td>2.21%</td>
<td>1.58%</td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>12</td>
<td>43</td>
<td>83</td>
</tr>
<tr>
<td></td>
<td>0.29%</td>
<td>0.45%</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>4124</td>
<td>15357</td>
<td>19481</td>
</tr>
</tbody>
</table>

(N.B. missing data: 617 cases)

Table (3): The distribution of measured blood pressure among the different BIRADS cases.

<table>
<thead>
<tr>
<th>Birads classification</th>
<th>High BP</th>
<th>Normal BP</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2638</td>
<td>4197</td>
<td>6735</td>
</tr>
<tr>
<td></td>
<td>31.13%</td>
<td>37.39%</td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>5024</td>
<td>6289</td>
<td>11313</td>
</tr>
<tr>
<td></td>
<td>61.62%</td>
<td>56.03%</td>
<td></td>
</tr>
<tr>
<td>3</td>
<td>397</td>
<td>517</td>
<td>914</td>
</tr>
<tr>
<td></td>
<td>4.87%</td>
<td>4.61%</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>156</td>
<td>178</td>
<td>334</td>
</tr>
<tr>
<td></td>
<td>1.91%</td>
<td>1.59%</td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>38</td>
<td>43</td>
<td>81</td>
</tr>
<tr>
<td></td>
<td>0.47%</td>
<td>0.38%</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>8153</td>
<td>11224</td>
<td>19377</td>
</tr>
</tbody>
</table>

(N.B. missing data: 721 cases)

3- Screening for breast cancer:

Certain criteria for screening are essential. These include methods that are simple, safe, inexpensive and easy to perform, and results that clearly distinguish those with and those without disease. The ideal screening method will detect a cancerous growth in breast tissue at an early stage, allowing earlier treatment of the patient to produce an improved outcome. The mainstay of all current breast screening programs is mammography [16]. For the past 20 years, mammography has been the gold standard for early detection of breast cancer. Two mammographic views of each breast (mediolateral oblique and craniocaudal) have been shown to be the most effective means of screening. This has been proven to significantly improve both sensitivity and specificity for mammographic detection of small breast cancers [17].

4- Pre-operative assessment:

The early and accurate diagnosis of breast cancer is important for optimizing treatment. Compared with the treatment of more advanced breast cancer, the treatment of early breast cancer is less resource-intensive and generally has superior outcomes.

The diagnostic process entails both initial diagnosis (to establish the presence or absence of breast cancer) and, when cancer is present, staging (to determine the extent of disease, the latter may include an examination to ascertain whether a patient has metastases). Knowledge of the stage of the disease is important for estimating prognosis and making choices between curative and palliative therapy [18].

The incidence of recall in WHOP is 433 cases (2.1%). With a strong belief that success and effectiveness of our screening program goes hand in hand with providing effective therapy, patients with BIRADS 4 or 5 mammograms are subjected to a sequence of assessment procedures in predetermined well equipped health service centers or university hospitals for more advanced evaluation.

According to the mammography reported BIRADS cases, we have 2 false negative cases, 110 false positive cases, 86 true positive cases, and 237 cases with no reported feedback.
A- Clinical assessment:

Clinical diagnosis refers to a diagnosis based on a combination of the history, findings on a clinical breast examination (CBE), and results of breast imaging studies (mammography and ultrasound). These findings may suggest a benign or malignant diagnosis.

Correct diagnosis is a prerequisite for successful cancer treatment. The diagnosis of breast cancer relies on a combination of clinical examinations, pathology tests, and imaging studies that provide the clinician with relevant prognostic and predictive information to counsel patients and initiate cancer treatment [19].

In addition to complementary breast ultrasound examination, a bone scan, chest X-ray and a liver ultrasound assessment are ordered for these women as well.

B- Tissue sampling:

Accurate histologic diagnosis is necessary to ensure that women with breast cancer may be given optimal treatment and that healthy women are not erroneously treated. The availability of resources to provide accurate histologic diagnosis and accurate assessment of prognostic and predictive factors, such as the presence or absence of estrogen receptors (ERs) and progesterone receptors (PRs) in a tumor, is crucial for making decisions regarding systemic therapy and for providing cost-effective breast cancer care.

Pathology diagnosis, also called tissue diagnosis, refers to a diagnosis based on the microscopic features of cells or tissues, which allow a lesion to be properly categorized pathologically. The interpretation of these microscopic findings is the definitive diagnosis (i.e., the final word) [19].

In countries with limited resources, it is recommended to introduce fine needle aspiration cytology (FNAB) at the basic level, provided the accompanying requirement for a quality cytopathology service is also met. (IARC, 20).

Core needle biopsy is also commonly used to obtain tissue samples from breast lesions, particularly non-palpable and image-detected abnormalities [21]. We perform core biopsy using a cutting needle (usually 14-gauge) and an automated gun. We usually take at least 5 specimens to ensure accurate diagnosis.

We perform FNAB as a first line management in suspicious cases. Core biopsy is usually reserved for inconclusive cases. Regardless of the type of tissue sampling that is performed for diagnosis, the pathology results are re-correlated with recorded clinical findings and the findings of imaging studies (mammography and ultrasound), to assess for concordance and thus reassuring accurate diagnosis. Discordant results (according to the project’s chief consultants) are considered an indication for re-biopsy.

5- Operative intervention:

The goal of earlier breast cancer detection and prompt appropriate therapy is clear enough, and there is little need to entirely reinvent the wheel [4]. The treatment of breast cancer requires an integrated, multidisciplinary approach using multiple resources in a focused, disease-oriented manner [22]. Therefore, wherever the vans set, our first priority is to provide place facilities for prompt clinical diagnosis and surgical treatment.

The treatment of localized invasive breast cancer involves an assessment of the clinical and pathologic features of the tumor and of the health status of the patient, the application of therapy aimed at eradicating local disease in the breast, the chest wall, and the regional lymph nodes, the potential application of systemic therapy aimed at eradicating subclinical, micrometastatic disease, and the follow-up of women after treatment for evidence of recurrent disease [22].

Modified radical mastectomy was performed for 31 ladies. It may be performed alone or in
association with reconstruction. A number of breast reconstruction techniques are available that differ greatly in the extent of surgery, complication rates, technical difficulty for the surgical team, and recovery [23].

An alternative treatment to mastectomy is breast-conserving therapy, that is, breast-conserving surgery (a lumpectomy or a "quadrantectomy") followed by radiation therapy [24,25]. Twenty-one women joining the program with pathologically-proven breast cancer performed breast-conserving therapy which entails complete excision of the tumor in the breast, surgical axillary staging, and radiation therapy to the whole breast and potentially to the regional lymph node-bearing areas. Under appropriate conditions, breast-conserving therapy allows preservation of the breast and provides survival equivalent to that of a modified radical mastectomy. The main benefit of breast-conserving surgery for many women is the preservation of body image, which greatly improves their quality of life.

Eleven more women performed excision biopsy for benign lesions after mismatching mammography and pathology results. Twenty-five more women performed private operations with unavailable operative data.

6- Post operative care:

Post-mastectomy irradiation and/or chemotherapy were necessary in BIRADS 4 and 5 cases [26]. Many breast cancers are also responsive to a wide variety of endocrine therapies. Benefit from such therapies may be predicted by the presence of ER or PR in breast cancer [27].

Screening interval:

The frequency of mammography for national screening is under debate. Many of the trials proving screening programme efficacy involved annual screening. However, recent evidence from a screening program study using a screening interval of two years showed a 37 percent reduction in breast cancer mortality in participating women [11,12].

Work plan design:

The work plan design of the programme includes 5 phases with a 1-year pilot phase that started in October 2007 and terminated in October 2008.

This was preceded by a small scale 1-year project demonstration study which was carried out in the "Women Imaging Unit", in Kasr El Aini Hospital by screening women referred from a small village in Giza, "Rawdat Abou Ghaleb". The demonstration project aimed to show how the project could be applied on a small scale while the pilot study aimed to field test and validate the field plan of the project, test citizen’s response to the program, and validate manpower capabilities. Guided by this pilot study, the business plan was amended.

Multidisciplinary team work:

The working team comprises a multidisciplinary group of trained, experienced and professional radiologists, radiographers, surgeons, oncologists, pathologists, nursing staff, data managers, engineers, and clerks, all working under one mission statement: "Our goal is to reduce mortality from breast cancer in Egyptian women and provide an utmost quality of life for discovered cases".

Work field design:

- Mammography units:

  With the belief that a program with limited accessibility to the population will never reach its objectives, we have chosen to deliver our services through mobile vans exclusively designed to fulfill the project requirement. These vans roam through different districts according to a pre-planned time schedule in order to minimize travelling time and distances to participating women.

  In addition to mobile units there is only one fixed unit up till now present in the ‘Women Imaging Unit’ in ‘Kasr Al Aini Hospital’.

- Mammography units are equipped with:

  - Full field digital mammography machine.
  - Dedicated computer system.
  - Sphygmomanometer.
  - Blood glucose level measuring kit.
  - A spring scale to measure weight.
  - Meter to measure patient’s height.
  - Patient ID and result "card printer"

- Centre of excellency:

  Mammography images are transferred to the centre of Excellency were reporting is carried...
out by three different individual professional radiologists.

• Communication system:
  Mammography units are linked to the "Centre of Excellence" through ADSL and satellite systems.

Database development:
  Database development with ongoing improvement has been a priority of our screening program. Collecting data on breast cancer is imperative for deciding how best to apply resources and for measuring progress [10].

  We have implemented a self designed, co-apt structured reporting system where all patient data (demographic, mammographic and operative) are recorded by clicking check boxes. This system allows easy data accessibility. Patient names and unique medical record number, dates, clinical findings, imaging findings, and results of surgical intervention are all documented in the system.

  Permanent, quality medical records are essential for documenting diagnostic findings, treatments given, and patient outcomes, and for communicating this information to other health care providers. In addition, well-kept medical records are useful for generally assessing the prevailing patterns of breast cancer presentation and care, which can be helpful for planning resource allocation and monitoring changes as additional resources are applied [19].

Website:
  In May 2008, WHOP launched its website www.whop.gov.eg as a one-stop store for all information related to the program. The website includes the latest information about the program’s activities. A valuable function on the website is the online form allowing users to submit queries, the most popular of which are answered in the frequently asked questions (FAQs) section.

Call center – 19507:
  A call center has been initiated to allow the general public to communicate and connect directly with the program. It started functioning beginning June 2008. Trained medical personnel are working on the system to provide information and answer inquiries about the screening process. Results are also delivered through the call center to women attending the program.

The National Foundation for Breast Cancer Elimination:
  In 2008, the National Foundation for Breast Cancer Elimination has been established to oversee the overall implementation and performance of the program. Members of the board will mainly be responsible for all medical policy issues related to the delivery of clinical care in the framework of the program.

Population response:
  Timely diagnosis of symptomatic disease relies on breast health awareness among the potential patient population and primary health care professionals, and thus increased breast health awareness is a key element of interventions at all resource levels. Although awareness is an elusive concept, it clearly has great potential for improving the outcome of breast cancer patients. It is important to be mindful that the great majority of women in the world in whom breast cancer is diagnosed each year are symptomatic at the time of diagnosis, and that the majority of women in the world do not have access to screening mammography. Thus, based on the observation of the association between tumor size and prognosis, it should be clear that the goal of earlier detection is not simply detecting a greater proportion of breast cancers when they are asymptomatic, but also downsizing symptomatic breast cancers as well. An important aspect of awareness is dissemination of the knowledge that breast cancer is not rapidly fatal if diagnosed early and is, in many cases, "curable" [28].

Since the launching of the project, we were determined to increase the number of screened women per month. We have succeeded to increase our total screening capacity to reach 3825 cases/month by February 2009 (Fig. 1).

With a strong belief in the value of providing a supportive environment for women to seek medical care on a regular checkup basis, or even with the appearance of early breast symptoms, together with supplying affordable and easily accessible diagnostic and therapeutic procedures, we have been determined to outreach Egyptian Women within their local communities. Breast health awareness and clinical care delivery at all levels from diagnosis,
treatment and post treatment care are provided for women joining the project within their local communities. In spite of these facilities, we are still facing several socio-economic and non-economic challenges that hinder the delivery of these services ranging from reluctance, cultural beliefs, and misconceptions that breast cancer is a rapidly fatal incurable condition to self denial or in-acceptance of presence the disease process itself.

Collaboration between all those with an interest in breast cancer is needed to encourage women to have a correct understanding of the disease and to understand who is at greatest risk, as well as understanding the likely symptoms and the need for breast awareness.

**Challenges:**

Obstacles to improving cancer care arise from multiple sources, including deficits in public knowledge and awareness, social and cultural barriers, challenges in organizing health care, and insufficient resources [10].

Although financial constraints are one obvious barrier to improving breast cancer outcomes, health care ministries in limited-resource countries face a variety of other barriers, including a lack of scientific and epidemiologic information to guide resource planning, a shortage of trained professionals to provide necessary clinical care, competing healthcare crises, and social and cultural factors that obstruct the timely and effective delivery of care [29]. Other constraints include inadequate facilities, insufficient funding for equipment and supplies, and inequity of access to care between rural and urban populations [30].

Today, with the rising interest and increased awareness of breast cancer early detection we are facing a critical shortage of well trained technical and professional workforce including both radiologists and radiographers. In order to keep pace with the demands of offered services, special attention should be paid to increase the number of qualified workforce.

This shortage also extends to include an inadequate number of well trained pathologists. In spite of the established fact that the key determinant of decisions about prognosis and management of breast cancer require careful examination of the FNAC, core biopsy or surgical resection specimens, pathology evaluation of specimens is frequently incomplete, inaccurate, and often incomprehensive.

We have not yet reached an adjusted balance between reducing recall rates so that small cancers are not missed and recall rates which cause anxiety and may reduce re-attendance. Up till now, we have a reasonable recall rate (2.1%) compared to 4-5% in other screening programs. Many women who have a positive mammography result will, on further investigation, turn out to have benign or normal findings. We hope we can reduce the false positive rates in subsequent runs. We are planning to involve all 3 level mammography readers in regular meetings and supply them with regular reports to each member of the team with information on their performance. We have also designed regular training programs for mammography...
technicians and co-technicians who have joined WHOP.

In fact, this summarizes the numerous constraints and challenges that WHOP is actually facing, but our faith and ambitions are far beyond our challenges. Awareness campaigns at the occasion of October Breast Cancer Month were held. We are trying to raise funds to overcome financial barriers, organize training and upgrading programs to provide adequate trained professionals, and raise breast health awareness in hand with public education in order to improve the program outcome. Incorporation of advocacy groups within the project can certainly affect the attitude, response and acceptance of the public to the delivered services. We also believe that if we succeed in planning a wide media campaign including television and radio advertisements, as well as poster campaigns on transport vehicles and in streets and shopping and leisure centers this will no doubt improve the screening outcome.

We also intend to plan phone call surveys to attendants who have refused or escaped from our post mammography services aiming to improve delivered services and evaluate performance.

Introductory, refresher and upgrading courses are being organized for both technical and medical project staff members in order to maintain and upgrade delivered services.

**Screening method-associated benefits and drawbacks:**

There are a number of associated benefits as well as drawbacks for screening breast cancer. The most obvious benefit is decreased mortality. Also, for a woman with normal screening results there is the reassurance of a negative outcome [9]. The screening procedure itself causes anxiety, pain and discomfort.

Other disadvantages include false positive results, which can cause increased anxiety, as well as require unneeded further investigations, and could possibly lead to an unnecessary biopsy. There has been much debate over the extent of over diagnosis of breast cancer as a result of screening [31]. A report by the Advisory Committee on Breast Screening in England has estimated that one in eight women would not have had their breast cancer diagnosed if they had not gone for screening.

Another issue to be considered is that irradiation from mammography is questioned to be carcinogenic. A calculation of benefit-to-harm ratio indicates that for every life lost due to radiation exposure from mammography, fifty lives are saved due to early detection of breast cancer [32]. This benefit-to-harm ratio is augmented as the prevalence of cancer increases with age. Other concerns of tumor dissemination following biopsy have arisen, however the clinical significance is unclear [12].

**REFERENCES**