

# The National Breast and Cervical Cancer Early Detection Program —

## Reducing Mortality Through Screening



**The National Breast and Cervical Cancer Early Detection Program**, administered by the Centers for Disease Control and Prevention (CDC), helps low-income, uninsured, and underserved women gain access to lifesaving screening programs for early detection of breast and cervical cancers.

Many deaths from breast and cervical cancers could be avoided by increasing cancer screening rates among women at risk. Deaths from these diseases occur disproportionately among women who are uninsured or underinsured. Mammography and Papanicolaou (Pap) tests are underused by women who have less than a high school education, are older, live below the poverty level, or are members of certain racial and ethnic minority groups.

Studies show that early detection of breast and cervical cancers saves lives. Timely mammography screening among women aged 40 years or older could prevent approximately 16% of all deaths from breast cancer. Pap tests can find cervical cancer

at an early stage when it is most curable, or even prevent the disease if precancerous lesions found during the test are treated.

**Mammography** is the best available method to detect breast cancer in its earliest, most treatable stage—an average of 1 to 3 years before a woman can feel a lump. Women aged 40 years or older should have

a screening mammogram every 1 to 2 years.

**Cervical cancer screening** using the Pap test detects not only cancer but also precancerous lesions. Women should begin getting a Pap test within three years of onset of sexual activity or age 21, whichever comes first and screening at least every three years.

### The Facts

#### Breast Cancer

*Except for skin cancer, breast cancer is the most commonly diagnosed cancer among American women.*

*It is second to lung cancer as the leading cause of cancer-related death among women.*

*In 2003, an estimated 211,300 new cases of invasive breast cancer will be diagnosed among women.*

*In 2003, an estimated 39,800 women will die of this disease.*

*If detected early, the 5-year survival rate for localized breast cancer is 97%.*

#### Cervical Cancer

*The incidence of invasive cervical cancer has decreased significantly over the last 40 years, in large part because of screening for and treatment of precancerous cervical lesions.*

*In 2003, an estimated 12,200 new cases will be diagnosed.*

*In 2003, an estimated 4,100 women will die of this disease.*

*Routine screening for cervical cancer can prevent the disease.*

Source: American Cancer Society, *Cancer Facts and Figures 2003*.



**CDC Activities Target Early Detection**

To help improve access to screening for breast and cervical cancers among underserved women, Congress passed the Breast and Cervical Cancer Mortality Prevention Act of 1990, which created CDC’s National Breast and Cervical Cancer Early Detection Program (NBCCEDP). This program, funded at \$200.6 million for fiscal year 2003, provides both screening and diagnostic services, including

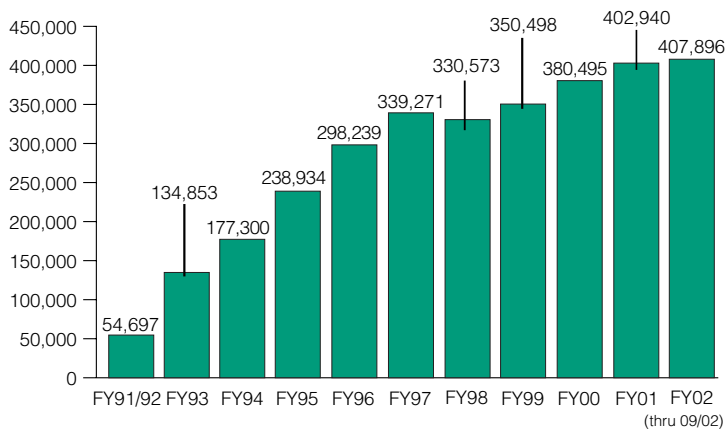
- Clinical breast examinations.
- Mammograms.
- Pap tests.
- Surgical consultation.
- Diagnostic testing for women whose screening outcome is abnormal.

Since it was established in 1991, the program has been implemented in all 50 states, 6 U.S. territories, the District of Columbia, and 15 American Indian/Alaska Native organizations. To date, it has

- Screened almost 1.75 million women.
- Provided over 4 million screening examinations.
- Diagnosed approximately 14,446 breast cancers; 55,210 precancerous cervical lesions; and 1,020 cervical cancers.

NBCCEDP continues to support an array of strategies that work together synergistically to achieve these results. Examples of some of these strategies are described in the sections that follow.

**Number of Women Served in the NBCCEDP for Fiscal Years 1991 – 2002**



Total number of women ever served - 1,748,149

Served indicates that a woman received at least one NBCCEDP Pap test, mammogram, or CBE in the fiscal year.

Source: Minimum Data Elements through 09/30/2002 paid with NBCCEDP funds, National Breast & Cervical Cancer Early Detection Program.

**Coalitions and Partnerships: Reaching Underserved Women**

The success of NBCCEDP depends on the complementary efforts of a variety of national organizations and other partners. CDC has joined with many such partners to help strengthen and maintain the infrastructure needed to implement NBCCEDP and other health programs targeting underserved women.

One partnership effort involves the Bureau of Primary Care (a division of the federal Health Resources and Services Administration [HRSA]) and the community health centers that it funds; the Institute of Healthcare Improvement; the National Cancer Institute (NCI); CDC; and other organizations. This project is focused on increasing screening for breast, cervical, and colorectal cancers within the populations served by community, migrant, and homeless health centers, as well as on improving follow-up for patients with abnormal screening results. Health center personnel are learning how small, incremental changes in clinic practices (e.g., linking screening to nonroutine clinic visits) can lead to improved health outcomes for the populations they serve. They are being taught how to plan and pilot-test such changes as well as how to assess and use test results in implementing effective changes.

Another important CDC partner, Avon, makes available about \$5 million every year to help community-based organizations recruit women for breast cancer screening. During 2003, Avon is working to improve links between these organizations and NBCCEDP grantees. Also, through the Avon-CDC Foundation Mobile Access Program, a grant of more than \$4 million will fund at least four mammography vans to expand services for medically underserved women through NBCCEDP.

NBCCEDP grantee organizations in many states have joined with nontraditional partners, including Native American tribal leaders, councils on aging, and church groups, to offer education and outreach in community settings. Diverse partners and varied intervention strategies have successfully brought screening services to women living on American Indian reservations and in rural and inner-city areas.

For example, with grants from NBCCEDP and added support from Avon and the Susan G. Komen Foundation, the Native Women’s Wellness Program of the South Puget Intertribal Planning Agency has steadily expanded its outreach to women in the five tribal communities of Washington State. Native American



outreach workers and tribal health care providers have built relationships of mutual trust and respect with these women, and their work continues to increase the number of women who receive screening through this program.

### **Public Education and Outreach: Eliminating Barriers to Access**

NBCCEDP provides support to a variety of organizations to further the development and implementation of effective outreach programs. These programs help women overcome barriers to screening, such as a lack of transportation or child care, linguistic and cultural differences, inadequate access to physician referrals, and fears or concerns about the discomfort, costs, or outcomes that may be associated with screening tests. With assistance supplied by CDC through NBCCEDP, significant progress has been made in teaching women about the benefits of screening and early detection.

An example of such progress was provided by the nation's first statewide Asian-language, breast cancer hotline, which was established by the Every Woman Counts Program of the California Department of Health (an NBCCEDP grantee). This service provided information in Chinese (Mandarin and Cantonese dialects), Korean, and Vietnamese languages. (Assistance was already offered in English and Spanish.) A public awareness campaign employed radio and print public service announcements in Mandarin, Cantonese, Korean, and Vietnamese to publicize the hotline. The number of calls to the hotline subsequently increased by more than 200%.

### **Professional Education: Enhancing Health Care at the Source**

NBCCEDP's state, territorial, and tribal grantee programs educate a wide range of health care professionals, including physicians, nurses, radiologic technologists, and cytologists, on the key roles they play in the early detection of breast and cervical cancers. For example, the Alabama Breast and Cervical Cancer Early Detection Program (ABCCEDP) produces multiple professional education conferences by satellite every year. In September 2001, ABCCEDP sponsored a videoconference on the Alabama Medicaid Breast and Cervical Cancer Treatment Program. This broadcast reached hundreds of health professionals with information about the treatment program, and ABCCEDP continues to receive inquiries related to the broadcast.

### **Screening, Follow-Up, and Case Management**

NBCCEDP provides national guidance on screening, diagnostic follow-up, and case management to ensure that current techniques and best practices are used in caring for

women served by the program. Case management services help to ensure that women are screened at appropriate intervals, that they access appropriate diagnostic services in the event of abnormal test results, and that they receive appropriate medical treatment as needed. Case managers also may help women navigate the health care system (e.g., make sure transportation is available, work with physicians to obtain free or reduced-cost services).

A recent example which illustrates the role of case managers involved a Missouri woman with breast cancer who was unemployed, depressed, and in need of chemotherapy. Case managers with the Breast and Cervical Cancer Control Program (BCCCP) of the Missouri Department of Health and Senior Services work with various organizations to assist individuals and families affected by breast cancer. In this instance, a BCCCP case manager sought help from several organizations, including the Breast Cancer Foundation of the Ozarks, which paid the woman's rent and utilities for 3 months. The American Cancer Society provided a wig and other support. The woman finished treatment and is doing well in her own home.

### **Quality Assurance for Screening and Follow-Up**

Health agencies that participate in NBCCEDP use mammography facilities certified by the American College of Radiology and cytology laboratories that follow the Clinical Laboratory Improvement Amendments of 1988. CDC provides screening and diagnostic guidelines to all NBCCEDP grantees and helps them evaluate their clinical services. Under CDC's guidance, all grantee programs develop strategies to ensure that women receive the best care possible.

In the New York Breast and Cervical Cancer Early Detection Program, health care providers are recruited by local Healthy Women Partnerships to supply breast and cervical cancer screening and diagnostic services. Providers must meet standards set by CDC and the state health department and must be certified by the U.S. Food and Drug Administration to conduct mammography screening and diagnostic follow-up. An interdisciplinary quality-assurance team reviews screening data received from almost 800 providers across the state, comparing each provider's aggregate test results with expected results based on state and national data. These reviews alerted program officials to a quality-assurance issue in one facility where the number of breast cancers detected was less than 25% of the number expected.

## Improving Access to Treatment

In 2000, Congress passed the Breast and Cervical Cancer Treatment and Prevention Act to help make treatment services more accessible to women enrolled in NBCCEDP. This landmark legislation gives states the option to provide Medicaid coverage for treatment of women enrolled in NBCCEDP who have a diagnosis of

breast cancer, cervical cancer, or a related precancerous condition. CDC's partnership with the Centers for Medicare & Medicaid Services has helped states obtain approval for this Medicaid option from the U.S. Department of Health and Human Services. (For a current list of approved states, see the NBCCEDP Web site at <http://www.cdc.gov/cancer/nbccedp/law106-354.htm>.)

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## CDC Research Activities

CDC conducts research to develop effective strategies for improving communications, education, outreach, and outcomes associated with its breast and cervical cancer control activities. Below are some recent examples of this research.

- *Case-Control Study of Mammography Efficacy*—An adjunct to a large case-control study of risk factors for breast cancer among women 35 to 64 years of age, this project is designed to assess the efficacy of screening mammography. Because such an assessment depends on the accuracy of women's self-reported mammography histories, an initial validation study has been conducted which compares self-reported histories of mammography to those found in the records of health care providers. CDC is collaborating with the University of Pennsylvania on this research.
- *Cervical Cancer Screening Policy: Clinical and Economic Outcomes*—This study will conduct quantitative evaluations of cervical cancer screening policies and practices involving low-income women enrolled in NBCCEDP. Decision-analysis, cost-effectiveness, and cost-utility modeling will be performed using NBCCEDP data. CDC is working with the University of California on this project.
- *2000 National Health Interview Survey*—Data from this CDC survey are being analyzed to measure the use of breast cancer screening in a representative

sample of U.S. women. These data provide important insights into differences in breast cancer screening practices among varying subpopulations.

- *Economic Barriers to Preventive Cancer Screening*—This study will use data from the Behavioral Risk Factor Surveillance System to examine how income, insurance status, and perceptions of cost as a barrier to medical care affect participation in screening for breast and cervical cancers. Researchers will also look at the role of NBCCEDP in changing the behavior of uninsured women toward breast and cervical cancer screening services.
- *Formative Research on Rarely- or Never-Screened Women*—The purpose of this project is to better understand why Mexican and Mexican-American women living in the United States are rarely screened for breast or cervical cancers. Research activities include 1) a literature review examining barriers to screening among racial and ethnic minorities, and 2) discussions, held in focus groups composed of Mexican women, about such issues as sociodemographic characteristics, general knowledge of breast and cervical cancers and screening tests, and attitudes and beliefs about breast and cervical cancer screening. The results will be of use in planning and implementing behavioral interventions designed to reach these populations.

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## Future Directions

CDC estimates that NBCCEDP services are currently reaching approximately 15% of women aged 50 years or older who are eligible for the program. CDC will continue working—through research, partnerships, and grantee organizations—to increase access to breast and

cervical cancer early-detection and treatment services, to develop strategies for improving rescreening rates among women enrolled in the program, and to implement public education and outreach strategies capable of reaching women who have rarely or never been screened.

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