NATIONAL
Breast & Cervical
Cancer Early Detection Program

SCREENING WOMEN, SAVING LIVES

NBCCEDP Program Guidance Manual

Book 3

Screening and Diagnostic Services
Professional Development
Public Education and Targeted Outreach

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NATIONAL
Breast & Cervical
Cancer Early Detection Program

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NBCCEDP Program Guidance Manual

Screening and Diagnostic Services

Version 2

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I. INTRODUCTION

Overview of the Chapter

This chapter contains the rationale for screening and outlines the core screening, diagnostic, and case management/patient navigation services offered through the National Breast and Cervical Cancer and Early Detection Program (NBCCEDP). This chapter also provides information about how these services work together to result in timely and appropriate clinical services for the program's clients.

Conceptual Framework

The Screening and Diagnostic Services component is represented as the core of the program. Assuring the availability and quality of these services to underserved women is the intent of the NBCCEDP. All other program components are related to and support the delivery of screening and diagnostic services to those most in need.

(See the Introduction to the Manual, NBCCEDP Conceptual Framework.)

Purpose of Screening and Diagnostic Services

The purpose of screening and diagnostic services is to detect precancerous or cancerous lesions at the earliest stage and refer clients promptly for treatment by

- establishing and maintaining a comprehensive provider network for screening and diagnostic services and treatment referrals that will maximize access and quality care for women enrolled in the program.
- assuring that appropriate rescreening is provided at regular intervals for all women enrolled in the program.

Definition of Screening and Diagnostic Services

Screening and diagnostic services can be defined as specific and appropriate clinical services to detect breast and/or cervical abnormalities. For this program, services include screening, diagnosis, case management and patient navigation.

- Screening procedures include clinical breast examination, mammography, pelvic examination, and the Papanicolaou (Pap) test.
- Diagnostic services are the tests designed to confirm or rule out cancer when screening tests yield abnormal results.
- Case management/patient navigation facilitates essential support services for program women who have an abnormal screening result and are assessed to need support services.

Essential Elements of Screening and Diagnostic Services

To meet NBCCEDP's expectations in the area of screening and diagnostic services, a grantee should

- collect essential patient information (i.e., demographics, symptoms, screening history, screening tests results, diagnostic evaluation, final diagnosis, and notation of any treatment referrals) on the women served
- report this information semiannually to the Centers for Disease Control and Prevention (CDC) in a standardized clinical record (i.e., Minimum Data Elements).

Competencies Needed to Implement Screening and Diagnostic Services

Staff members responsible for screening and diagnostic services need the ability to

- budget for screening and diagnostic services,
- recruit and retain a comprehensive provider network,
- develop and promote tracking of clinical results to ensure the timeliness and completeness of follow-up,
- assess relationships between planned care and approved protocols for care,
- assess clients' needs for support to remove barriers to screening and follow-up,
- develop and promote recall systems that include patient reminders, and
- communicate and collaborate effectively with clinical providers.

Staff members responsible for screening and diagnostic services need knowledge in

- cervical cancer prevention;
- breast and cervical cancer early detection;
- breast and cervical cancer screening, diagnostic, and treatment referral services;
- tracking systems for data management;
- client assessments of barriers to follow-up; and
- rescreening reminder systems.

II. THE CASE FOR EARLY DETECTION

The overall mission of the NBCCEDP is to reduce morbidity and mortality from breast and cervical cancer through the early identification of precancerous or cancerous lesions. For cervical cancer, screening is considered to be primary prevention if precancerous lesions are treated before they become cervical cancer. For breast cancer, screening is secondary prevention because it is designed to detect cancer, not prevent it. The goal of breast cancer screening is to identify cancers at their earliest stages, when treatment is most likely to be successful and prognosis is optimal.

Screening and diagnostic services comprise many elements that interrelate to ensure that women receive timely and appropriate care throughout the screening cycle, starting with the initial screening examination or test, through a final diagnosis and referral to treatment if precancerous or cancerous lesions are identified. These elements include the following:

- Screening and rescreening
- Clinical follow-up (diagnostic workup) of abnormal results
- Case management/patient navigation

Tracking is essential throughout the cycle to ensure that women receive timely and complete services. Both human resources and technical systems are required to track data associated with the process of screening and clinical follow-up. The farther grantees are from the delivery of care, the more critical these tracking systems become.

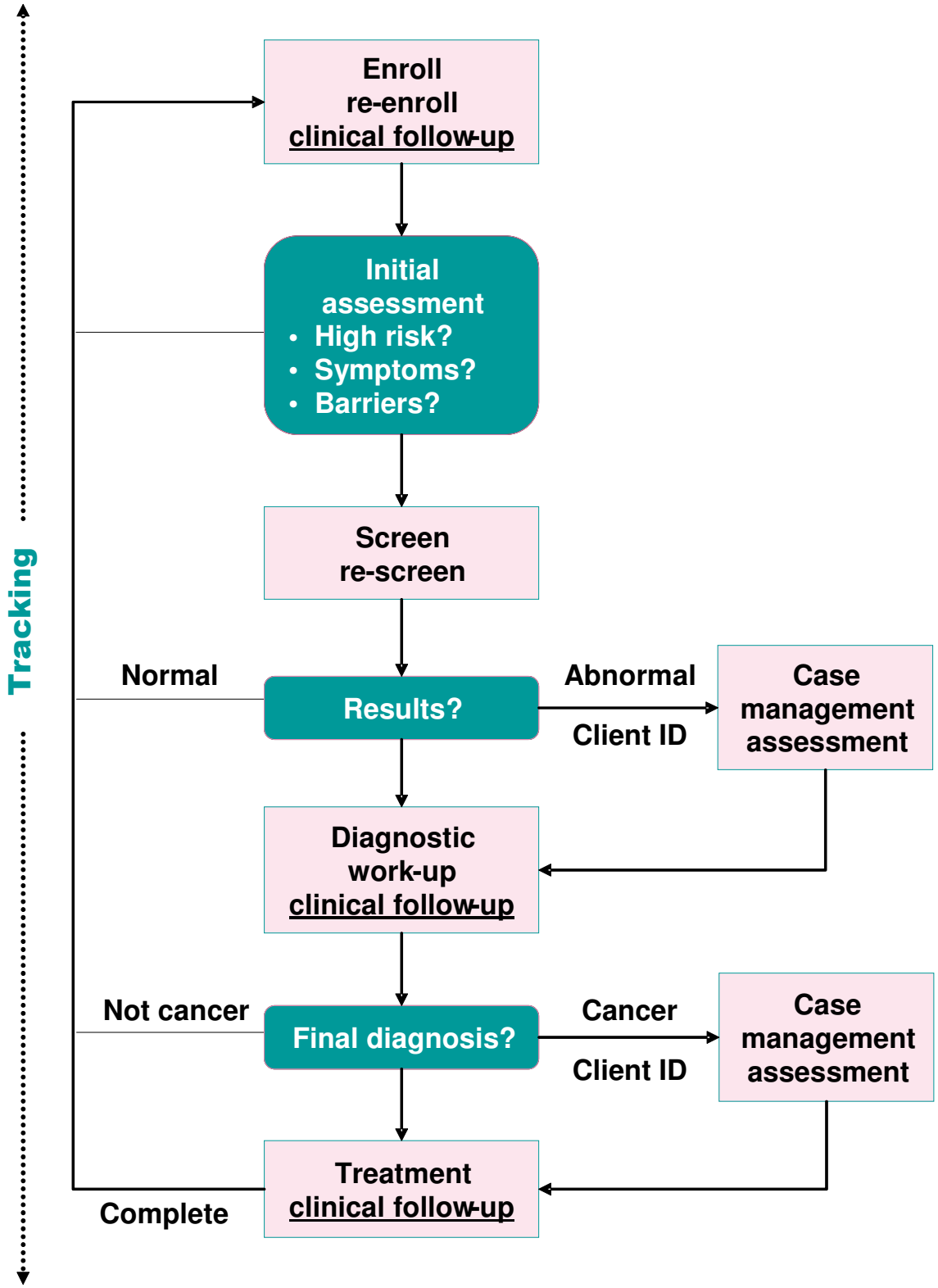
Figure 1 displays the cycle of screening, diagnosis, and treatment, and it includes referral for case management, depending on the results of tests and procedures. To effectively detect cancers early, programs should provide rescreening examinations to clients at appropriate screening intervals.

Key Message

Although the first breast screening examination is critically important to finding cancer that is already existing, regular screening is the real key to early detection.

The timely identification of clients screened, as well as their test results, is extremely important for those program staff members who are coordinating screening and diagnostic services. These activities can be challenging if providers are not clear about the NBCCEDP expectations for notification and reporting.

Figure 1


Tracking
Enroll
re-enroll
clinical follow-up
Initial
assessment
• High risk?
• Symptoms?
• Barriers?
Screen
re-screen
Normal
Results?
Abnormal
Client ID
Case
management
assessment
Diagnostic
work-up
clinical follow-up
Not cancer
Final diagnosis?
Cancer
Client ID
Case
management
assessment
Treatment
clinical follow-up
Complete

Overview of Breast and Cervical Cancer

According to the *U.S. Cancer Statistics*, breast cancer is the most frequently diagnosed cancer among women in the United States and the second leading cause of cancer death. About one in eight (12%) women will develop invasive breast cancer during their lifetime, and her chance of dying from breast cancer is about one in thirty-six (about 3%).

Key Message

Because the science related to breast and cervical cancer is continuously evolving, grantee staff members should use the resources identified in this chapter and consult their medical advisory consultants regularly to keep up to date with key facts about both diseases.

In 2008*, 210,203 women in the United States were diagnosed with breast cancer, and 40,589 women died from breast cancer. There were 42,781 women who were diagnosed with new cases of in situ breast cancer. In situ cancers are thought to represent an early stage of cancer, with the disease still confined to its site of origin. A woman's risk of breast cancer increases with age, especially after age 50; in 2008, about 79% of new cases and 88% of breast cancer deaths occurred in women over age 50.

Also in 2008, 12,410 women were diagnosed with cervical cancer, and 4,008 women died from the disease. Any woman who has a cervix can get cervical cancer, especially if she or her sexual partner has had sex with several partners. Most often, cervical cancer develops in women aged 40 or older. Cervical cancer was once one of the most common causes of cancer death for American women. Today, most deaths from cervical cancer can be avoided if women are screened regularly. When detected and treated early, cervical cancer often can be cured, yet 60% of cervical cancer cases occur in women who have never been screened or have not been screened in the prior 5 years.

Human papillomavirus (HPV) is a small DNA virus associated with the development of cervical cancer. Most women with cervical HPV infection will not develop cervical cancer; however, because HPV sequences are found in more than 99% of all cervical cancers, HPV infection is viewed as a necessary factor in the malignant transformation to cervical cancer. HPV-16 and 18 account for approximately 70% of all cervical cancers, but the distribution of tumor histology is correlated with HPV type: HPV-16 DNA is more commonly found in squamous cell carcinomas, and HPV-18 DNA is more commonly found in adenocarcinomas.

The U.S. Food and Drug Administration approved, for females aged 9–26, quadrivalent and bivalent HPV vaccines that prevent cervical cancer caused by HPV-16 and 18. The Advisory Committee on Immunization Practices of CDC's National Center for Immunizations and Respiratory Diseases recommended routine HPV vaccination for girls aged 11–12. The newly approved vaccines do not directly impact current NBCCEDP activities to help low-income, uninsured, and underserved women gain access to screening services to detect cervical cancer precursors and invasive cervical cancer at its earliest stages. Additionally, the vaccine does not impact current cervical cancer screening recommendations. NBCCEDP funds are not authorized for reimbursement of the HPV vaccine.

*2008 is the most recent year for which statistics currently are available.

Rationale for Screening

The major assumption behind cancer screening is that early detection of breast cancer that will lead to early treatment and preventing the development of cervical cancer that will result in more positive outcomes for the individual and for society (i.e., reducing morbidity and mortality burden from cancer).

Effectiveness

Screening tests for a disease are considered effective if early detection and treatment of the disease have some advantage over later diagnosis and treatment. The ideal method for determining a screening program's effectiveness is a randomized trial. By comparing an intervention group with a control group, the impact of the intervention—whether positive or negative—can be determined. CDC and the NBCCEDP rely on the United States Preventive Services Task Force (USPSTF) to determine what screening tests and procedures have been proven effective.

Key Message

As a public health program, the NBCCEDP approves only those tests and procedures whose costs and effectiveness have been justified in terms of their overall benefit in reducing morbidity and mortality from breast and cervical cancer. Since fiscal resources for this program are limited, inappropriate use of services and reimbursement for more expensive tests and procedures that show little benefit only result in fewer women being screened.

Breast Cancer Screening

Breast cancer screening can take three primary forms:

- **Mammography**—In older women, this type of screening has demonstrated effectiveness as observed in multiple randomized controlled trials. USPSTF concluded that mammography screening every 12 to 33 months significantly reduces breast cancer mortality, especially in women aged 50–69.

- **Clinical breast examination (CBE)**—CBE is intended to detect breast abnormalities or evaluate patient breast symptoms. If used appropriately, it is an important complement to mammography in the early detection of breast cancer. CBE helps to identify some cancers missed by mammography, and it provides an important screening tool for use with women for whom mammography is not recommended or with women who refuse mammography. CBE detects an estimated 16% of breast cancers, and it detects up to 45% of the breast cancers that were missed by mammography. However, surveys have suggested that there is a lack of standard approach to CBE technique by providers. The USPSTF noted there was insufficient evidence to recommend for or against routine clinical breast examination alone to screen for breast cancer.

- **Breast self-examination (BSE)**—BSE is an examination conducted by a woman to check for any changes in her breast. This technique may allow women to note any worrisome changes. USPSTF, however, has recommended against teaching or performing BSE. Therefore, grantees should not consider BSE as a suitable technique around which to establish a screening program. Although women should be encouraged to seek medical attention for any breast changes they notice.

Cervical Cancer Screening

Cervical cancer screening is primarily performed through the use of the Pap test and the HPV DNA test.

- **Pap test**—This test has been shown to reduce the burden of cervical cancer screening. Through years of regular use, the test has produced marked reductions in cervical cancer morbidity and mortality.
- **High-risk HPV DNA test**—Since HPV infection is a necessary factor in the malignant transformation of normal cervical cells to cervical cancer, recent studies have shown that identification of high-risk HPV infection can strongly predict risk of cervical cancer. Because HPV infection is common in young women and effectively cleared spontaneously, HPV testing is only recommended for screening in conjunction with Pap testing among women age 30-65.

Accuracy and Acceptability

Screening examinations are designed to identify precursors to disease or early-stage disease in healthy asymptomatic women. Screening tests must be valid (accurate) and reliable (consistent over time). The validity of a screening test is measured by both the ability of the test to accurately identify disease in people with the disease (sensitivity, or "true positive/false negative rate") and its ability to generate negative results for people who do not have the disease (specificity, or "true negative/false positive rate"). In addition, people must be willing to use the screening test; thus, it must be cost-effective, available, and accepted by the intended screening population and the clinical community.

Breast Cancer Screening

Mammography has a sensitivity of about 70 to 95%, depending on the method used. Mammography sensitivity is lower in women who are younger than 50, have denser breasts, or are taking hormone replacement therapy (51 to 83%). The specificity for mammography ranges from 90 to 98%.

Cervical Cancer Screening

In 1999, the Agency for Health Care Policy and Research (now the Agency for Healthcare Research and Quality) concluded that the sensitivity of the conventional Pap test is about 75%; that is, a single Pap test may produce a false negative result and miss abnormal cells in about one in four women who have abnormal cell growth. The specificity of the Pap test is about 98%; that is, a single Pap test may produce a false positive result for a woman with no abnormal cell growth in approximately 2% of cases. The sensitivity for liquid-based technologies is about 95%; the specificity is about 82%.

Impact and Burden Reduction

A breast and cervical cancer screening program must detect disease early so women can receive timely and appropriate diagnostic testing. Early treatment of cancer or its precursors should prevent the disease or delay its progression. Breast and cervical cancer screening is warranted because early detection improves prognosis, particularly if effective treatment is initiated in a timely manner.

Breast Cancer

Breast cancer, in most instances, develops for many years before it is detected. However, screening advancements have produced a steadily increasing trend in the diagnosis of breast cancer at earlier stages.

Survival rates for women with breast cancer depend on two factors: (1) when the cancer is found (i.e., how early) and (2) the pathology of the lesion (i.e., degree of aggressiveness). Five-year survival rates are 98% for localized breast cancer, 84% for regional cancer, and 24% for distant disease. Recent trends suggest that the number of new cases of breast cancer diagnosed each year (incidence) has remained stable and number of deaths has decreased significantly during the past 10 years. This trend is, in large part, due to improvements in breast cancer detection and treatment.

Cervical Cancer

Cervical cancer, in most instances, takes many years to develop and is preceded by progressive precancerous changes of the cervix. If these changes are detected and treated early, their progression to invasive cervical cancer can be prevented. The Pap test can detect these cervical cancer precursors, as well as cervical cancer at early stages.

High-Percentage Reach

The NBCCEDP has a particular emphasis on reaching 50- to 64-year-old women for breast cancer screening and women never or rarely screened for cervical cancer screening. To serve women who might not otherwise be screened, this program focuses on women who have limited income, no insurance, or no coverage for preventive care, as well as those who are members of minority groups that often experience disparities in health outcomes. Although as of December 2011, the program has screened over 4 million women and provided more than 10 million screening examinations since it was established in 1991. Because of limited resources, it reaches fewer than 15% of eligible women.

Political Backing and Support

The Breast and Cervical Cancer Mortality Prevention Act of 1990 (Public Law 101-354) directed CDC to build a screening program through cooperative agreements to States, tribes, and territories to increase early detection of breast cancer and prevention of cervical cancer among low-income, uninsured, and underinsured women. It also directed CDC to provide the following health services to its clients: physical examinations of the breasts, mammography services, pelvic examinations, and Pap tests. The Nation's health care system must be structured to support the screening program, and the screening program must have political backing and support.

NBCCEDP funds have never been intended for cancer treatment. When the national program began, grantees were required to identify treatment resources for women diagnosed with cancer. As the number of women screened and diagnosed through the NBCCEDP grew, this identification of resources became increasingly more challenging for grantees. The Breast and Cervical Cancer Prevention and Treatment Act of 2000 (Public Law 106-354) gave states a means to provide treatment for women diagnosed with breast or cervical cancer through the NBCCEDP, by allowing treatment services through Medicaid.

(See the Policies and Procedures chapter for additional information.)

Adherence to Clinical Recommendations

An early challenge in establishing the NBCCEDP was the need to follow women with abnormal screening tests. The challenge led to the establishment of case management services in October 1999, when Congress amended the Breast and Cervical Cancer Mortality Prevention Act of 1990 to allow these services to be considered essential client services. The intent of the Act was to ensure that women with abnormal screening results or cancer diagnoses receive timely and appropriate follow-up services. The impact of the NBCCEDP can only be measured by knowing the ultimate outcomes for women with abnormal screening results.

(See the Policies and Procedures chapter for additional information on case management in the NBCCEDP.)

Screening and Diagnostic Services Planning

Grantees have implemented a screening service program consistent with NBCCEDP's mission. Annual planning is necessary to ensure that program funds are used to provide quality screening to as many eligible women as possible. Grantees should set annual goals and objectives that ensure the efficient allocation of funding for clinical services. Grantees may find it helpful to use data reports and input from the medical advisory board and CDC when considering adjustments for annual plans. In addition, grantees can refer to data reviews and assessments when outlining activities and strategies for planning, implementing, and evaluating success in meeting the expectations established by the national program for screening and diagnostic services.

Critical Components to Consider When Planning an Effective Program

Clearly Defined Priority Population

Certain racial and ethnic minority groups have a disproportionately lower screening rate, which creates a wide gap in health outcomes between these and other women in the United States. To address these health disparities, the NBCCEDP has identified specific populations—called "priority populations"—that warrant special attention to increase their participation in the NBCCEDP. Priority populations can be described broadly as women who are racial, ethnic, and/or cultural minorities (such as American Indians/Alaska Natives, African Americans, Hispanics, Asians and Pacific Islanders, and lesbians), women with disabilities, women who have not been screened for cervical cancer in the past 5 years, and women who live in geographically or culturally isolated communities in urban and rural areas.

Each grantee determines the specific priority populations for its program on the basis of surveillance and other data, which include NBCCEDP Eligible Population Estimates.

(See the Program Management and Recruitment chapters for more information on defining priority populations.)

Screening and Diagnostic Services Budget

Screening and diagnostic services are considered part of a grantee's "60%" budget. Each fiscal year, each grantee will determine its budget for clinical expenditures by projecting the total number of women to be served, including the number of office visits and the number of diagnostic procedures, using the Clinical Cost Worksheet (CCW). These forecasts should be developed from recent past performance, projected

work plans, and professional judgment. Forecasts that differ significantly from past performance should be discussed with the grantee's CDC program consultant. However, the CCW may not be useful for comparatively smaller programs with nontraditional methods of paying for clinical services (e.g., methods other than fee for services). For example, a tribal organization that intends to screen fewer than 500 women and provides for clinical services by supporting a clinician position would probably not benefit from the CCW. If the grantee's program is small (with a federal award of less than $750,000), a grantee representative should meet with the program consultant to determine whether or not the CCW would be useful.

Comprehensive Provider Network

The establishment and maintenance of a comprehensive provider network for screening, diagnostic, and treatment referral services are essential for meeting program goals. A comprehensive provider network includes a balance between providers with high volumes of cases and providers who deliver care to specialized subgroups of women (e.g., providers who are multilingual and care for non-English-speaking women).

System to Ensure Follow-up

Following up with each client is essential for ensuring that women who have abnormal results receive appropriate and timely services to obtain final diagnoses. If a woman is diagnosed with cancer, follow-up continues through her referral to treatment.

Clinical Follow-up

Clinical follow-up refers to the procedures necessary to complete a diagnostic workup for an abnormal screening result or the referral of a patient to treatment for a cancer diagnosis. It also can refer to "short-term clinical follow-up" for a BI-RADS 3 category, which generally consists of a follow-up CBE and mammogram at 6 months. The adequacy and timeliness of the clinical follow-up must be consistent with or exceed CDC policy and benchmark indicators. If resources are limited, priority for diagnostic follow-up should be given to women screened by the program.

(See the Data Management and Quality Assurance/Quality Improvement chapters for more information on data quality.)

Case Management/Patient Navigation

Case management/patient navigation services may be needed to ensure that women with abnormal screening results are able to comply with the recommended clinical follow-up. These services are intended to ensure timely and complete clinical follow-up of abnormal screening results for the patient.

Systems for Referral

A system must exist to ensure that women with abnormal screening results are referred to further diagnostic testing and, depending on the diagnosis, subsequent treatment:

Diagnostic testing—When screening results are abnormal, the screening service provider will need a protocol for referral to diagnostic service providers who are also NBCCEDP providers. Grantees can work

with screening providers to determine their normal referral providers and recruit them into the program as necessary. If diagnostic providers are not willing to contract with the program, grantees may need to negotiate new referral arrangements with the screening provider.

Treatment—With the enactment of the Breast and Cervical Cancer Prevention and Treatment Act of 2000 and the Native American Breast and Cervical Cancer Treatment Technical Amendment Act of 2001, referral to Medicaid is available for most women who are diagnosed with cancer through the NBCCEDP. Grantees must negotiate treatment services from alternative resources for those women who are not eligible for treatment services through Medicaid.

Systems for Tracking the Data

CDC requires that grantees collect an extensive data set (i.e., MDEs) to track patients, services, and outcomes. Data collected in the MDEs include essential demographic and clinical information on each woman served through the program. Each MDE record describes a "screening cycle," with information on patient demographics, symptoms, and screening history, as well as screening test results and outcomes (including diagnostic evaluation, final diagnosis, and notation of treatment referrals for women with cancer diagnoses). Grantees should use MDE data extensively to direct and assess quality assurance activities, monitor the effectiveness of efforts to recruit clients from various demographic groups, and detect possible problems with an individual provider's provision of clinical care. Systems to ensure the timely reporting of clinical data from the service provider to program staff are critical for timely case management and client adherence to recommendations for follow-up.

Key Message

Failure to allow for user-end input in any aspect of the data collection process increases the risk for problems later. Grantees should solicit input from users of data submission forms, although their suggestions need to be carefully assessed and filtered. Grantees also should review forms to assess their completeness prior to data entry and return incomplete records to the provider for additional information. Payment for services should not occur until client information is complete.

To meet NBCCEDP's expectations for tracking, grantees should do the following:

- Establish and maintain a system to collect, edit, and manage the data needed to track a woman's receipt of screening and diagnostic services and, where appropriate, treatment referrals
- Establish a mechanism for reviewing and assessing the completeness, accuracy, and timeliness of data collected by the program
- Maintain procedures to ensure date confidentiality

A useful tracking system is one that can be effectively integrated into the grantee's or provider's health care information management system. The tracking system should provide women with a unique identification number to help document the outcome of individual screening and diagnostic tests and procedures,

regardless of the screening cycle or provider sites. The primary functions of the tracking system include the following:

- To ensure that screening is completed for all clients
- To ensure follow-up for women who do not attend their screening appointments
- To ensure follow-up for women with abnormal screening results so that these women complete diagnostic workup procedures in a timely manner
- To ensure that adequate and appropriate data are collected and analyzed
- To meet surveillance, tracking, and reporting requirements and to allow for prompt responses to reasonable requests for information

(See the Data Management chapter for information on CDC's CaST system.)

Field Example

One grantee's data collection and submission forms are drafted by its program administrative staff members with ongoing input from clinic providers. During the course of regular onsite clinic visits, forms and systems for data collection are jointly evaluated by the quality assurance team and the providers responsible for generating and collecting program data. Their common goal is the development of data collection tools that are intuitive for field staff members who generate the data, respecting clinician-directed clinical care as a distinct and separate role from that of program data management. Assurance staff members use program data to work with clinicians to ensure that clinical services meet both MDE standards and clinical guidelines developed by national professional societies and organizations.

Grantees operating under a centralized structure generally receive their data directly from the provider, and tracking occurs at the grantee level. In a decentralized structure, regional offices may contract with service providers to collect data from providers. These contractors are usually responsible for collating the data from providers, ensuring their accuracy and completeness, and then forwarding them to the grantee's central office. Regardless of program structure, the following guidelines can help guarantee the integrity, confidentiality, and accurate and timely transmission of the data.

Methods of data collection must be appropriate for the resources and capabilities of those who generate and collect the data. Using clinical providers to complete some or all of the data forms can be advantageous for data integrity, but providers may not fully understand how to complete the forms accurately. Some grantees use program staff to complete the forms after receiving test and procedure results from the provider. Although this minimizes data conversion on the part of the provider, it requires the transmission of medical records documents, and it also may require the development of systems to ensure that enough clinical information is available to complete the forms accurately.

Data collection forms must make sense and be easy to complete. Grantees should test these forms in the field before they are used and evaluate them periodically for updates and revisions, taking user feedback into consideration on a continuous basis. Proposed revisions to approved forms should be reviewed by CDC and it technical data consultants.

A system must be in place to protect the confidentiality of sensitive client information (demographic data as well as test results). For example, clients' names and other unique identifiers (e.g., dates of birth) should not be included with data transmitted for analyses; password-protected, non-networked computers should be used to house sensitive data; and hard-copy files with client information should be kept in locked locations (locked file drawers inside locked offices).

Data protection mechanisms—such as backup files, virus protection services, and log-in security—must be established, maintained, upgraded, and continually checked.

(See the Program Management chapter, Organizational Context, for more information on infrastructure and the Data Management chapter for more information on data transmission.)

Legal and Ethical Issues

Delayed diagnosis of breast cancer has been one of the leading causes of malpractice lawsuits. Thus, grantees should understand three key legal concepts to minimize liability for the grantee and its staff members:

Responsibility (opposite of negligence)—Clinical providers are responsible for care. Program-related data collection and case management complement patient care activities.

Reasonable expectations—Following standard protocols (e.g., for specific situations, such as lost to follow-up) establishes the intent to provide acceptable care and document diligence. A reasonable expectation is that a grantee has and uses standard protocols to ensure that high-quality care is provided in a timely manner.

Damage—Damage or injury must have occurred to establish liability. If liability is established, the specific damage or injury must be shown to be the result of a reasonably foreseeable consequence of an action by someone who has the responsibility for care.

Strategies to reduce liability include the following:

- Providing competent client support, in accordance with accepted standards and guidelines and program-specific protocols
- Documenting clearly and adequately the efforts made, decision-making processes, and results
- Notifying and consulting with higher level clinicians and administrators when necessary
- Engaging in proactive problem solving that is monitored for effectiveness

III. Screening

The NBCCEDP defines screening as the provision of specific and appropriate clinical procedures, at appropriate time intervals, to detect breast and/or cervical abnormalities. In the NBCCEDP, screening procedures include CBEs, mammograms, pelvic exams and Pap tests. To meet NBCCEDP's expectations in the area of screening, a grantee should do the following:

- On the basis of available program resources, develop realistic projections for the number of women to be served and the number of breast and cervical cancer screening examinations to be provided
- Establish and maintain systems to determine a woman's eligibility status for receiving NBCCEDP-funded services
- Maintain a comprehensive service provider network to meet screening goals and ensure timely access to all necessary diagnostic follow-up

Screening Priority Populations in the NBCCEDP

Breast Health Component

The priority population for mammography screening in the NBCCEDP is program-eligible women over the age of 50. These women are more likely to be diagnosed with breast cancer than women under age 50.

Grantees should note the following NBCCEDP guidelines:

- Low-income (250% of the Federal Poverty Level or less), uninsured, or underinsured women aged 40–64 or Medicare-eligible women who cannot pay the premium to enroll in Medicare Part B are eligible to receive mammograms through the NBCCEDP.
- At minimum, 75% of all NBCCEDP-funded mammograms must be provided to women aged 50 years and older.
- If a woman is eligible to receive Medicare benefits but is not enrolled, she should be encouraged to enroll.
- Women enrolled in Medicare Part B are not eligible for NBCCEDP-funded breast cancer screening and diagnostic services.
- Grantees may reimburse providers for film and digital mammograms up to the allowable Medicare rate. The specific screening method must be indicated in the MDEs. With this information, the test-specific diagnostic outcomes can be compared.

(See the Policies and Procedures chapter, PC.1: Mammography for Women 50 Years of Age or Older and PC.2: Mammography for Women Under 50 Years of Age.)

Cervical Health Component

The priority population for cervical cancer screening services includes never and rarely screened women (i.e., those who never have had a Pap test or who have not had a Pap test within the past 5 years) who are at greatest risk for cervical cancer.

Grantees should note the following NBCCEDP guidelines:

- Low-income (250% of the Federal Poverty Level or less), uninsured, or underinsured women aged 21–64 are eligible to receive cervical cancer screening through the NBCCEDP.
- NBCCEDP funds may be used for high-risk Medicare-eligible women who cannot pay the premium to enroll in Medicare Part B.
- Cervical cancer screening is recommended in women ages 21 to 64 years with cytology (Pap testing) every 3 years or, for women ages 30 to 64 years who want to lengthen the screening interval, screening with a combination of cytology and high-risk HPV DNA testing (co-testing) every 5 years. Both cytology alone and co-testing must be made available by all grantees.
- At minimum, 20% of all NBCCEDP-funded cervical cancer screening must be provided to women who are never or rarely screened.
- If a woman is eligible to receive Medicare benefits but is not enrolled, she should be encouraged to enroll.
- Women enrolled in Medicare Part B are not eligible for NBCCEDP-funded cervical cancer screening and diagnostic services.
- Grantees may reimburse providers for primary cervical cancer screening with conventional and liquid-based cervical cytology (such as ThinPrep and SurePath), up to the allowable Medicare rate. The specific cervical cancer screening method must be indicated in the minimum data elements (MDEs), so that the number of liquid-based tests can be distinguished from the number of conventional Pap tests performed. With this information, the test-specific diagnostic outcomes can be compared.
- If a woman receives an abnormal screening test result, whether from conventional or liquid-based technologies, grantees should follow policies for follow-up of abnormal cervical cancer screening tests and reimbursement of diagnostic procedures.

(See the cervical cancer screening policies in the Policies and Procedures chapter.)

General Clinical Management

NBCCEDP funds can be used for offices visits related to breast and cervical cancer screening and diagnostic services. NBCCEDP funds cannot be used for services that are unrelated to breast and/or cervical cancer screening including time and materials needed to assess and manage problems unrelated to breast and cervical cancer. Grantees that have the ability and willingness to screen for and manage other health problems (sexually transmitted disease testing, blood glucose testing, hemocult, etc.) may do so at their own discretion at the time of the woman's visit to the breast and cervical cancer screening provider.

Client Enrollment

Grantees should establish and maintain systems to recruit and enroll women who are eligible for NBCCEDP-funded services, using the following methods.

Recruitment strategies—These strategies seek to educate eligible priority populations of women (e.g., those rarely or never screened) to want and obtain screening services.

In-reach activities—In-reach identifies eligible priority populations within (or currently being served by) provider practices for screening. Systems can flag charts of women due for breast and cervical cancer screening. In-reach often identifies women who could or should be screened by the system in which they are enrolled already. Thus, it should be approached cautiously to avoid charging NBCCEDP for services that should be supported elsewhere.

Diagnostic referrals of patients from non-program providers—These women received their initial screening—which produced abnormal test results—through funding other than the NBCCEDP (e.g., self-pay or another public program). If these women meet eligibility criteria, they may (based on decision-making at the grantee level) enter the program for diagnostic workup (e.g., additional mammographic views or colposcopy). Because of limited resources, women screened with NBCCEDP funds are priority candidates for receipt of diagnostic services.

Proactive Tracking

Efficient patient tracking systems are needed to prevent incomplete screening follow-up and unnecessary delays. Effective systems for the timely tracking of care include the following:

- Tracking key aspects of care
- Having a system in place to generate notices and to place them in the chart
- Timing the prompts so that the task is completed immediately upon notification

A multifaceted approach involving physician prompts, automated tracking, patient reminders, and educational interventions for physicians and patients increases colposcopy completion rates dramatically. Case management can complement tracking and improve the provider's ability to meet program standards for timely follow-up.

One challenge for NBCCEDP grantees is reducing the number of women who are lost to follow-up (e.g., women who are highly mobile, such as migrant farm workers). To respond to this challenge, the Migrant Clinicians Network developed CAN-track, a program designed to reduce the duplication of services and to improve the reporting of breast, cervical, and colon cancer screening results. CAN-track staff members help transfer medical records between clinics when enrolled participants move. The coordination of care provided by CAN-track helps improve early access and continuity of care to those patients who enroll in this program. (For more information about CAN-track, see http://www.migrantclinician.org/.)

Specific professional development on tracking systems is often used to help providers meet the timeliness and completeness-of-care requirements for the program. If systems are well defined, user-friendly, and efficient, barriers to tracking and follow-up of clients can be reduced or eliminated. Program staff members can use best practice models to assess current systems and offer solutions for system improvements. No single system will work for all providers, since each provider practice has systems that vary in design, function, and integration with other systems, technology, and resources.

Breast Cancer Screening Procedures

Screening Mammography

Statistically significant evidence shows that screening mammography is effective for reducing mortality from breast cancer in women aged 50–74 years. A woman and her provider should routinely assess the need for screening mammography, discuss options, and decide on a schedule.

Women with normal breast cancer screening results remain at risk for the disease and need to be rescreened for a lifetime or until their providers consider rescreening unnecessary. Rescreening on a regular basis can detect interval cancers or in situ lesions at earlier stages. Rescreening on a regular basis also may detect more aggressive cancers early, when treatment options are more effective.

Screening mammography, which is designed specifically for asymptomatic women, consists of two standard, complementary views of each breast—the craniocaudal projection and the mediolateral oblique projection. If an abnormality is suspected with screening mammography, additional mammographic views and/or ultrasounds are performed.

Diagnostic mammography consists of the same views of each breast, but it is used for a woman presenting as follow-up for an abnormal screening result, with a breast symptom, or with breast augmentation implants. Diagnostic mammography may include ancillary procedures, such as spot-compression views to evaluate asymmetrical densities or better define areas of clinical concern; magnification views to delineate the morphology of calcifications or improve visibility of masses; and special views to maximize the evaluation of breast tissue in the augmented breast.

Most suspected abnormalities detected on a screening mammogram are resolved by further imaging. The final results of the mammogram are determined after the imaging workup is complete.

Mammography should only be performed in facilities with Mammography Quality Standards Act certification. NBCCEDP requires all imaging results to be reported using the Breast Imaging-Reporting and Data System (BI-RADS) lexicon, a system and database designed to standardize language and categories of results. Assessment categories from the fourth edition-of the *BI-RADS Atlas* (2003) are described in the table below.

American College of Radiology BI-RADS Assessment Categories	
Category	**Description**
Category 0: Need additional imaging evaluation and/or prior mammograms for comparison	This category, which notes that additional imaging evaluation is needed, is almost always used in a screening situation. The needed imaging may include spot compression, magnification, special mammographic views, and ultrasound. Whenever possible, if the study is not negative and does not contain a typically benign finding, the current film should be compared to previous studies. Category 0 should only be used for old film comparison when such comparison is required to make a final assessment
Category 1: Negative	There is nothing to comment on. The breasts are symmetric, and no masses, architectural distortion, or suspicious calcification are present.
Category 2: Benign finding(s)	Like category 1, this is a "normal" assessment, but the interpreter chooses to describe a benign finding in the report.
Category 3: Probably benign finding—initial short-interval follow-up suggested	A finding placed in this category should have less than a 2% risk of malignancy. It is not expected to change over the follow-up interval, but the radiologist would prefer to establish its stability. A complete diagnostic imaging evaluation should be made before designating the finding as category 3; hence, this finding cannot be issued as the result of a screening mammogram alone. The vast majority of cases requires an initial short-term follow-up (6 months) followed by additional examinations until longer term (2 years or longer) stability is demonstrated.
Category 4: Suspicious abnormality—biopsy should be considered	This category is reserved for findings that do not have the classic appearance of malignancy but have a wide range of probability of malignancy that is greater than that in category 3. By subdividing category 4 into 4A, 4B, and 4C as suggested, it is encouraged that relevant probabilities for malignancy be indicated so the patient and her physician can make an informed decision on the ultimate course of action.
Category 5: Highly suggestive of malignancy—appropriate action should be taken	These lesions have a high probability (>95%) of being cancer. This category contains lesions for which one-stage surgical treatment could be considered without a preliminary biopsy. However, current oncologic management may require percutaneous tissue sampling, as, for example, when sentinel node imaging is included in surgical treatment or when neoadjuvant chemotherapy is administered at the outset.
Category 6: Known biopsy—proven malignancy—appropriate action should be taken	This category is reserved for lesions identified on the imaging study with biopsy proof of malignancy prior to definitive therapy.

Clinical Breast Examination (CBE)

CBE seeks to detect masses that may be missed with mammography, discover interval lesions that may appear between screenings, or evaluate a lump or skin/nipple change discovered by the woman through BSE. For younger women with dense breasts or older women who retain density because of hormone therapy, CBE can be important.

Although clinicians are divided on the level of evidence supporting CBE and have varying confidence in the examination, CBE is practiced extensively in the United States and recommended by some leading health organizations (e.g., American Congress of Obstetricians and Gynecologists (ACOG) and American Cancer Society (ACS). Despite its widespread use, no standards exist for performance, interpretation, reporting, or follow-up. Recognizing the importance and timeliness of addressing these gaps, ACS collaborated with CDC to initiate a planning process to develop recommendations for maximizing the performance and reporting of this procedure. Many grantees support professional development activities to improve knowledge and skills in CBE techniques, including how to distinguish suspicious lesions from normal nodularity and documentation and referral for further diagnostic workup.

(See Attachment A: CBE Core Competencies.)

Cervical Cancer Screening Procedures

Pelvic Examinations

The NBCCEDP pays for pelvic examinations for women aged 21–64 with a cervix, including women who have had hysterectomies and retain a cervical stump. For women who are not sure if they still have a cervix after hysterectomy, a pelvic examination can be performed to determine if her cervix is still intact. Although a pelvic examination may identify abnormalities, a pelvic exam alone does not screen for cervical cancer.

Pap Tests

Cervical cancer screening consists of the Pap test and high-risk HPV testing. NBCCEDP recommends that women begin having regular cervical cancer screening at age 21. USPSTF found evidence that annual screening achieves does not achieve better outcomes than screening every 3 years. Modeling studies suggest little added benefit of more frequent screening for most women. Most cervical cancers in the United States occur in women never screened or not screened within the past 5 years; additional cases occur in women who do not receive appropriate follow-up after an abnormal Pap test. It is recommended for women ages 21-64 be screened screening for cervical with cytology (Pap smear) every 3 years or, for women ages 30 to 6 years who want to lengthen the screening interval, screening with a combination of cytology and HPV testing every 5 years.

The following women do not need regular Pap tests:

- Women over age 65 who have had adequate negative Pap tests.
- Women who do not have a cervix. This includes women whose cervix was removed as part of a hysterectomy, unless the hysterectomy was due to cervical cancer. Pap screening is not necessary for women who have had a hysterectomy for benign disease.

(See the Policies and Procedures chapter, PC.9: Cervical Cancer Screening for Women Over 64 Years of Age and PC.10: Cervical Cancer Screening Following Hysterectomy.)

All cervical cytology interpretation must be performed on the premises of a qualified laboratory. These facilities must meet the standards and regulations described by the Center for Medicare and Medicaid Services (CMS) under the Clinical Laboratory Improvement Act of 1988. Cytopathologists should record their Pap test findings using the 2001 Bethesda System, which specifies specimen adequacy and is a descriptive diagnostic system that provides specific categories for abnormal findings, which in turn promote specificity in treatments. The Bethesda System was updated in 1991 and again in 2001. The 2001 Bethesda System has three general reporting elements: specimen adequacy, general categorization, and interpretation/result.

The Bethesda System includes two primary categories:

Squamous cell—Squamous cell abnormalities represent the vast majority (roughly 80%) of all cervical neoplasia. Squamous cell abnormalities are further classified as the following categories:

- Atypical squamous cells
- Low grade squamous intraepithelial lesion
- High grade squamous intraepithelial lesion
- Squamous cell carcinoma

Glandular cell—Glandular cell abnormalities are further classified as the following categories:

- Atypical glandular cells
- Endocervical adenocarcinoma in situ
- Adenocarcinoma

HPV DNA Testing

NBCCEDP funds can be used to reimburse for high-risk HPV DNA testing as a screening adjunct (co-testing). NBCCEDP funds cannot be used to reimburse for low-risk HPV DNA testing.

Client Recall

A number of patient- and provider-focused interventions (shown in the table below) can be used to improve rescreening rates.

Intervention	Examples
Patient focused	▪ Health education materials for patients ▪ First and second reminder letters, individually tailored letters, and reassuring (vs. anxiety-producing) letters on physician, mammography service unit, or NBCCEDP letterhead ▪ Postcard reminders compliant with HIPAA (and enhanced with gift voucher) ▪ Telephone call for reminder notification, counseling on barriers, and appointment scheduling ▪ Verbal recommendation by clinician during current screening cycle (emphasized during provider orientation and professional development) ▪ Appointment card (preferably the size of a credit card), which can be carried by the patient ▪ Dedicated phone line to schedule rescreening appointments ▪ Friend-to-friend phone calling systems
Provider focused	▪ Computer-generated reminders or other prompts for physicians to remind a patient that she is due for screening ▪ Provider education that includes both clinicians and support personnel ▪ Promotion of the use of flow sheets (for screening/rescreening) or reminders attached to the patient chart ▪ Computer-generated list of NBCCEDP clients due for rescreening ▪ Chart audit with feedback to providers to improve the effectiveness of rescreening (particularly for priority populations)

Provider barriers to establishing rescreening systems include lack of training, time constraints, lack of office staff support, failure to recognize needs, conflicting recommendations for rescreening, and disorganized medical records. By conducting provider orientations, site visits, and professional

development activities, a grantee can help primary care providers in its network enhance their systems for recall.

A rescreening plan, at minimum, should include the following components:

- Staff members who are responsible for overseeing the rescreening protocol and ensuring that it is implemented as planned.
- A process to monitor rescreening rates on a regular basis and identify best practice models and strategies, or plan interventions for providers and/or clients not responding to the rescreening strategies.
- A system to assess the strategies used to promote rescreening. Although this system may simply consist of the monitoring of data, programs are encouraged to use other sources of information, including client feedback and lessons learned from best practice models.

Key Message

Clients are more likely to call their provider for rescreening if they get more than one reminder.

A rescreening plan, at minimum, should include the following components:

- Education for women about the purpose of rescreening. Education about the purpose of screening tests may begin with initial program enrollment. Emphasis should be placed on the message that screening at regular intervals leads to a decreased risk of dying from breast cancer or developing cervical cancer.
- Development and implementation of a reminder system to facilitate the return of women who were previously screened. The reminder system should be systematic, comprehensive (capturing CBE, mammography, Pap test, and pelvic examination), and applied consistently using acceptable clinical and public health practices and key messages, while also maintaining patient confidentiality (e.g., to meet the Health Insurance Portability and Accountability Act requirements).
- Coaching providers to educate women about the importance of rescreening. Most women report that the primary reason they do not get a mammogram is because their provider did not advise them to do so.

Field Example

One grantee established the following procedures to reach a goal of having 80% of its clients who received a mammogram return for an annual mammogram within 15 months.

To determine rescreening rates, the grantee defines "base" mammograms as normal mammograms (negative or benign findings) among asymptomatic women. For each client who returns, the grantee calculates the time between the base mammogram and the subsequent mammogram. The numerator for each jurisdiction's rescreening rate is the number of clients who received a subsequent CDC-funded mammogram within 15 months of the base mammogram. The denominator is the number of base mammograms, minus the number of clients determined to be ineligible for the program because of a change in insurance status, income, out-of-state move, or death. Subtracting the ineligible clients from the denominator provides a more accurate rescreening rate and prevents the jurisdictions from being "penalized" for failing to rescreen program-ineligible clients.

If a jurisdiction has a consistently low rescreening rate or its rate begins to decline, information from the records can be examined. This examination, as well as discussion with the local program coordinator, can help determine possible reasons for underperformance and suggest potential solutions.

IV. DIAGNOSTIC SERVICES

The purpose of screening is to find disease at its earliest stage. To ensure that women are adequately screened through the NBCCEDP, grantees should establish and maintain systems for the diagnostic follow-up of women with abnormal screening results. Referral systems should include local resources for women in need of procedures not paid for by the program, as well as treatment services.

Clinical protocols that are approved by medical advisory boards should be adopted to monitor care by diagnostic providers. Women participating in the screening program who have abnormal screening results should be given priority for diagnostic services.

(See the Policies and Procedures chapter, Clinical Management and Reimbursement Policies.)

Grantees should use the Clinical Cost Worksheet to ensure that funding will be sufficient to reimburse providers for all program-eligible diagnostic procedures.

Diagnostic algorithms for the workup of abnormal screening results evolve as a result of feedback from professional consensus workgroups, new evidence from clinical studies, and community resources (e.g., technology and clinical specialists). Therefore, CDC requires grantees to develop protocols (for review by medical advisory boards) following these algorithms for their respective states, tribes, and territories. CDC has established benchmarks for the timeliness and adequacy of follow-up for abnormal breast and cervical

cancer screening results, which must be integrated into and/or support the clinical protocols endorsed by the grantee.

(See the Policies and Procedures chapter, Policies for Adequacy and Timeliness of Follow-up for Women With Abnormal Screening Results.)

Grantees are responsible for monitoring their providers for potential overutilization (or underutilization) of diagnostic services. In addition, diagnostic procedures must be reimbursed only on an outpatient basis; reimbursement must not exceed the reimbursement rate determined by the grantee on the basis of Medicare rates.

Breast Cancer Diagnostic Procedures

Ultrasound

Ultrasound uses high-frequency sound waves to evaluate a suspicious breast lump, and it can be ordered as diagnostic follow-up to complement mammography. The American College of Radiology has an ultrasound BI-RADS lexicon, which uses the same reporting categories as mammography. In fact, the final BI-RADS category now is considered an imaging category that reports the final result of both the mammogram and the ultrasound. Ultrasound has a number of uses in the diagnostic workup for breast cancer:

- The traditional role of ultrasound is to distinguish between cystic and solid masses.
- Ultrasound plays an important role in determining whether a mass is benign or not.
- Ultrasound-guided cyst aspiration is a procedure that can be performed when a cystic-looking lesion cannot be confidently diagnosed as a simple cyst on the basis of its sonographic appearance, or when either the patient or provider desire aspiration.
- Ultrasound can guide interventional breast procedures, including: fine needle aspiration (FNA), core needle biopsy, and needle localization for surgical biopsy.

Diagnostic Mammography

Diagnostic mammography usually is conducted because a woman has a specific complaint (e.g., symptoms) or specific clinical findings. Films are read by a radiologist immediately to allow for further testing. This type of mammography differs from screening mammography, which is performed in the absence of symptoms or other clinical indicators. In addition, more time will elapse before films are read for screening mammography.

Other Imaging Modalities

A number of evolving technologies for breast cancer early detection are available.

Digital Mammography

Digital mammography may be reimbursed at the Medicare rate. Although digital mammography may improve the early detection of breast cancer among younger women, a lack of understanding of the natural history of the disease in these women limits the ability to predict if this can be translated into longer survival. Moreover, studies are not available currently to show that digital mammography is cost-effective, so grantees that use this technology must make sure that its resources are used to provide the greatest good to as many recipients of care as possible.

Magnetic Resonance Imaging (MRI)

The role of MRI in the diagnosis of breast cancer is still being defined. At this time, MRI is not reimbursed using NBCCEDP funds.

Computer-Aided Detection (CAD)

CAD can aid mammographers as an impartial "second reader" for select mammograms. This technology indicates changes on a mammogram that may need extra evaluation by the radiologist. It does not diagnose, but it looks for subtle changes on the images. The mammogram image is scanned with a laser beam and converted into a digital signal. The computer highlights the suspicious areas on a monitor. Since the current scientific evidence is insufficient to demonstrate that the use of CAD reduces morbidity and mortality associated with the detection of breast cancer, NBCCEDP does not provide reimbursement for this service.

Computerized Tomography (CT)

CT has no practical role in the evaluation of the breast, although in rare instances it can be helpful in localizing lesions for biopsy. The role of breast scintigraphy and positron emission tomography as adjuncts to mammography are yet to be determined; hence none of these procedures are used routinely in practice and are not reimbursed by NBCCEDP.

Breast Biopsy

Fine-Needle Aspiration (FNA)

FNA can safely and reliably diagnose a breast mass as a benign simple cyst (fluid filled) if the mass completely resolves after aspiration and aspirated fluid is benign in appearance (i.e., not clear, gelatinous, or grossly bloody). FNA of solid breast masses is a valuable diagnostic tool when done by experts and interpreted by experienced cytopathologists. Therefore, the use of FNA biopsy for solid lesions may be limited where these specialists generally are located.

Large-Core Needle Biopsy (LCNB)

LCNB of the breast provides a core of tissue for histologic evaluation. When properly done, it is a safe, well-tolerated, and cost-effective alternative to surgical biopsy. LCNB specimens can be interpreted by a pathologist and can yield specific histologic diagnoses. When a mass is palpable, this kind of biopsy is sometimes done by a surgeon. A nonpalpable mass detected through screening mammography can be biopsied by a radiologist using ultrasound or mammographic (stereotactic) guidance. Core biopsy is a sampling technique and is not intended to remove the lesion (with the possible exception of Mammotome

biopsy). The histologic result must explain or be consistent with the imaging findings—otherwise, another biopsy and/or reading of the pathology is mandatory.

Open Surgical Biopsy

Surgical removal of a breast lesion is performed for dominant palpable masses. Surgical biopsy also may be used with nonpalpable screening-detected lesions. Needle-localized surgical biopsy for nonpalpable breast lesions is used for these lesions. Needle-localized biopsies have a 2 to 3% sampling error rate, which is similar to that of LCNB.

Cervical Cancer Diagnostic Procedures

Colposcopy

A colposcopy is the examination of the cervix, vagina, and, in some instances, the vulva with a low-power operating microscope (colposcope) after the application of a 3 to 5% acetic acid solution (vinegar). This procedure is usually coupled with cervical biopsy and endocervical sampling to obtain specimens for histological evaluation, using biopsy forceps and an endocervical curette, or for cytological evaluation of the endocervix, using a cytobrush.

Satisfactory Colposcopy

Satisfactory colposcopy indicates that the entire squamocolumnar junction and the margin of any visible lesion can be seen with a colposcope. When no lesion or only biopsy-confirmed cervical intraepithelial neoplasia (CIN) 1 is identified after satisfactory colposcopy in women with high-grade squamous intraepithelial lesion (HSIL) Pap test results, a review of the cytology, colposcopy, and histology results should be performed, when possible. If the review yields a revised interpretation, management should follow guidelines for the revised interpretation; if a cytological interpretation of HSIL is upheld or if review is not possible, a diagnostic excisional procedure (e.g., loop electrosurgical excision procedure (LEEP) is preferred in nonpregnant patients. A colposcopic reevaluation with endocervical assessment is acceptable in special circumstances, such as when CIN 2 or 3 is not found in a young woman of reproductive age or during pregnancy when invasive cancer is not suspected.

Unsatisfactory Colposcopy

When no lesion is identified after unsatisfactory colposcopy in women with HSIL, a review of the cytology, colposcopy, and histology results is performed. If the review yields a revised interpretation, management should follow guidelines for the revised interpretation. If a cytological interpretation of HSIL is upheld, review is not possible, or biopsy-confirmed CIN 1 is identified, a diagnostic excisional procedure is recommended in nonpregnant patients. Ablation is unacceptable. During pregnancy, if initial colposcopy is unsatisfactory, it may become satisfactory later in pregnancy and so should be repeated within 6 to 12 weeks.

Although patient management protocols are well defined for normal and abnormal Pap tests, the follow-up of an ASC-US report is more challenging. In the medical community, the ASC-US category is known as an "I don't know" category because the laboratory is unsure about the status of the Pap test. Often,

women who receive an ASC-US result are treated as if they have an abnormal Pap test, even though only an estimated 25 to 35% of these women actually have cervical disease.

Omission of endocervical sampling is acceptable when a diagnostic excisional procedure is planned. In women with HSIL in whom colposcopy suggests a high-grade lesion, initial evaluation using a diagnostic excisional procedure is also an acceptable option. Triage using either a program of repeat cytological testing or HPV DNA testing is unacceptable.

HPV Testing

HPV testing can help to identify patients at high and low risk for developing cervical neoplasia. The finding of high-risk types of HPV DNA in a cervical specimen from a woman with an ASC-US Pap test suggests the presence of LSIL rather than a benign reactive process. These high-risk patients should go on to colposcopy and biopsy/treatment if indicated.

Programs need a conclusive way to distinguish patients who need further management and those who do not. The HPV DNA test fills this need by clearly identifying which women are infected with high-risk HPV and the need for colposcopy. HPV testing is a reimbursable procedure if it is used in the follow-up of of abnormal Pap tests results as recommended by the American Society for Colposcopy and Cervical Pathology (ASCCP).

LEEP, Laser Conization, and Cold-Knife Conization (Cone)

These invasive diagnostic procedures are approved for the management of women with HSIL. Grantees should develop policies to ensure that these procedures are used appropriately and are consistent with the ASCCP recommendations available at http://www.asccp.org/ConsensusGuidelines/ConsensusGuidelinesOverview/tabid/5956/Default.aspx.

Endometrial Biopsy (EMB)

EMB uses a soft plastic tube with a central plunger that forms a vacuum to remove the cells lining the inside of the uterus. Pathology evaluation is used to look for changes indicating endometrial (uterine) cancer or precursor endometrial hyperplasia. EMB is indicated whenever the Pap test shows AGC in a woman over age 35 or in women with other risk factors (e.g., abnormal bleeding, diabetes, polycystic ovary syndrome). Since endometrial cancer (like colon cancer or ovarian cancer) is not part of the NBCCEDP, EMB only is covered by the program for the follow-up of abnormal Pap test results (primarily with AGC and other glandular abnormality results) as per ASCCP guidelines.

V. SCREENING PROVIDER NETWORK

A strong provider network is essential for increasing program-eligible women's access to screening and diagnostic services. A grantee should carefully consider the location of its priority population to ensure access and capacity to screen program-eligible women. Many NBCCEDP clients have little discretionary income, no health insurance, and no primary health care providers. Consequently, it may be in the best

interest of the client if the grantee recruits providers (e.g., from community health centers) who can both screen and provide a medical home for program-eligible women.

The following components of a provider network are necessary for the screening, diagnosis, and treatment of breast and cervical cancer.

- **Primary care providers (PCP)**—PCPs provide regular pelvic, Pap, and CBE screening tests and procedures. These providers also must be willing to coordinate the care of women enrolled in the program, from screening and clinical follow-up to a final diagnosis. Some grantees also contract for case management services, which include client assessments and support for minimizing barriers to follow-up among women with abnormal screening results.
- **Mammography facilities**—These facilities must support a full range of imaging technologies, including: screening mammography, diagnostic mammography, breast ultrasound, and breast biopsy. All mammography facilities must have Mammography Quality Standards Act (MQSA) certification.
- **Clinical laboratories**—These facilities are needed to process and read Pap tests and other cytology (FNA biopsy) and pathology specimens (core biopsies). All laboratories must have Clinical Laboratory Improvement Amendments (CLIA) certification to ensure proficient testing and quality control.

Each grantee should determine the optimal structure for its screening provider network on the basis of overall program structure and existing agreements with providers for other health-related services. In a centralized approach to provider agreements, the grantee contracts directly with providers in the network. In a decentralized approach, the grantee contracts with regional health departments, community-based organizations, or other entities that subsequently make arrangements for direct services through local private practices and/or community clinics.

Provider Recruitment

Recruiting providers and establishing effective provider relations can be challenging. When assessing gaps in the provider network, grantees should consider not only the types of screening services the provider has to offer, but also factors that promote access for priority populations. Important considerations may include the following:

Location
Cultural competence
Capacity to accept new patients
Ability to provide other primary care services in addition to NBCCEDP-funded services
Nonroutine office hours (i.e., evenings or weekends)
Availability of native language speakers or language translation for priority populations of program-eligible women

Provider Assessment

Prior to developing an agreement with a provider, a grantee should assess the provider's ability to meet the NBCCEDP's standards and requirements. The following table outlines criteria for this assessment, which both the provider and the grantee can use to determine whether a partnership would be mutually beneficial. It also can help to determine what the provider may need to accomplish as a condition of becoming a program provider.

Criteria for Primary Care Providers	
Services	■ What screening services does the PCP offer? ■ Which clinicians will be providing the services? ■ Will they accept the screening policies and reimbursement procedures of the NBCCEDP grantee?
Access	■ How many new clients can the PCP accept? ■ Does the PCP have weekend or evening appointments?
Referrals	■ To whom does the PCP refer for screening/diagnostic mammography, colposcopy, FNA, LEEP, LCNB, and surgical consultation? ■ Will agreements with these specialty providers be needed to avoid disrupting current referral patterns? ■ What is the PCP's system for referral for treatment? ■ Does the PCP refer to a contracted program laboratory?
Tracking	■ What is the PCP's system for tracking women through the entire screening and diagnostic cycle?
Follow-up	■ Will the PCP follow clinical protocols established by the grantee's medical advisory boards? ■ Does the PCP inform women of both positive and negative test results in a timely manner?
Case management	■ Does the PCP have the capacity to do case management? If not, how will the PCP notify the NBCCEDP case manager of abnormal results in a timely manner?
Rescreening	■ Does the PCP have a system for rescreening notification?
Reimbursement	■ How will the PCP handle billing for tests and procedures not reimbursed by the NBCCEDP? ■ Is the PCP willing to accept the reimbursement rate determined and approved by the grantee as payment in full?
Front desk	■ Is the PCP willing and able to determine eligibility? ■ Is the PCP willing to remind women of their appointments?
Reporting results	■ Can the PCP submit data in a timely manner?
Quality improvement	■ Is the PCP interested in and amenable to receiving feedback reports about its performance and related interventions and remediation?
Criteria for Mammography Facilities	
Screening	■ Does the provider have MQSA certification (reporting categories such as ACR BI-RADS), as well as State, tribe, or territory certifications? ■ Does the provider have the capacity to provide new screening and/or diagnostic appointments?
Reimbursement	■ Is the provider willing to accept the rate determined and approved by the grantee as payment in full?
Criteria for Clinical Laboratories (Either Onsite or Offsite)	
Pap tests	■ Are facilities Clinical Laboratory Improvement Act certified? ■ Do pathologists record their Pap test findings using the Bethesda System?
Reimbursement	■ Is the provider willing to accept the rate determined and approved by the grantee as payment in full?

Provider Agreements

Whether the agreement is formal (e.g., contract) or informal, the NBCCEDP requirements must be thoroughly outlined. The Program Management chapter contains information on the design of the agreement, including the financial component.

Key Message

Provider agreements are easier and faster to implement than contracts. Agreements should include the following:

- ***Specific timelines between dates of service and submission of completed data forms***
- ***A CPT reimbursement schedule***
- ***A description of what is reimbursed by the program***
- ***A statement that a woman cannot be billed above and beyond the amount reimbursed by the program***

Provider Orientation and Updating

Grantees are responsible for orienting providers to NBCCEDP screening policies and procedures. Screening protocols that are endorsed by the grantee medical advisory boards and are consistent with guidelines and recommendations from national organizations and/or professional societies such as the National Cancer Institute (NCI), ACS USPSTF, and ACOG generally define the starting and ending ages and rescreening intervals. An orientation curriculum gives providers consistent and comprehensive training about their role in providing screening, diagnostic, and treatment services, as well as the unique expectations of the program related to reimbursement and data.

Most grantees have a standardized "provider manual" that can be sent to new providers as they enroll. This manual should include current policies, procedures, and forms related to enrollment, service delivery, and reporting. It should be reviewed and updated regularly.

If provider staff members are too busy to actually read and assimilate the content of the written manual, the grantee should consider scheduling an orientation to provide an interactive forum for answering questions and to build relationships for ongoing collaboration. Many grantees choose to schedule an onsite orientation to promote ongoing communication and coordination of services for clients. Because most grantees are fairly well established, this more costly approach is often reserved for new providers. Within the provider site, a variety of staff members need specific information about the NBCCEDP and how their respective roles will support the quality screening of program-eligible women.

All staff members—Everyone at the provider site will need support and technical assistance in creating a welcoming and culturally sensitive environment for program clients.

Front office staff members—These staff members will need an orientation to client eligibility and enrollment procedures. The orientation should include essential information on data transmission, tracking systems, and confidentiality issues.

Clinical staff members—These staff members will need information on the clinical protocols endorsed by the grantee medical advisory board. These protocols may vary slightly from existing professional society protocols. To the extent possible, the grantee should maintain existing referral patterns by recruiting referral providers already used by the provider site. The grantee should reinforce the MDE requirements and the importance of having the clinical elements reflect the medical record.

Field Example

As new screening providers join the program, grantee staff members should provide them with an orientation session and a copy of its provider manual. This comprehensive manual should cover all policies and procedures for the program.

Billing staff members—These staff members will need a complete orientation to ensure that patients do not get billed.

Administrative staff members—These staff members include the office manager, medical director, or lead clinical coordinator. They will need information on program systems and how to integrate these into existing practice systems. Options that benefit all patients at the provider site are more likely to be pursued.

If an onsite orientation cannot be scheduled or if follow-up sessions are needed, grantees should consider teleconferencing as an efficient mode of communication. Teleconferences can be used to orient providers or to provide updates and periodic technical assistance to established providers.

Provider Retention

Providers join the network for a variety of reasons. Some may be interested in serving low-income women either as part of their mission or because of their philosophical interests. Competing priorities, economic considerations, and changing reimbursement systems may jeopardize a provider's willingness to remain in the network.
Grantees will need to reinforce the following mutual benefits of being a program provider:

Mammography and Pap tests are underused by women with limited access to health care. Both death and the illness associated with breast and cervical cancers could be avoided by increasing cancer screening rates among women at risk.

MDE data reports that compare the provider with benchmark outcomes and other providers in the region can be used to meet the quality criteria of other regulatory reporting agencies, such as the Joint Commission on Accreditation of Healthcare Organizations (JCAHO) and the National Committee for Quality Assurance (NCQA).

Using grantee support, providers can improve their systems for timely and complete care for all patients in the practice.

By following NBCCEDP policies and procedures for timely and complete screening and diagnostic follow-up, providers may reduce their risk of medical malpractice claims.

Special Considerations for Providers of Diagnostic Services

Grantees should be able to estimate the types and numbers of diagnostic services needed, using a projected screening volume and program-specific rates of abnormalities. CDC's Clinical Cost Worksheet has a formula for this calculation. Grantees should use MDE data to determine abnormal rates. They also should build on referral patterns that respect existing relationships with screening providers and maximize access for women.

Diagnostic Provider Assessment

Prior to developing an agreement with diagnostic service providers, a grantee should assess their ability to meet program standards and requirements. The following table outlines important criteria for this assessment, which both the provider and the grantee can use to determine whether a partnership would be mutually beneficial. It also can help to determine what the provider may need to accomplish as a condition of becoming a program provider.

Criteria for Diagnostic Care Providers	
Services	▪ What diagnostic services does the provider offer? ▪ Which clinicians will be providing the services? ▪ Can the provider comply with the diagnostic protocols endorsed by the grantee's medical advisory board?
Access	▪ Is the provider's location accessible by priority populations? ▪ Can the provider accept "new" referrals? ▪ Does the provider have weekend or evening appointments? ▪ What is the provider's system for referral for treatment?
Reporting	▪ What is the provider's system for reporting results of diagnostic procedures or cancer diagnoses to the PCP? How can this be adapted for the program?
Reimbursement	▪ How will the provider handle billing for tests and procedures not reimbursed by the program? ▪ Is the provider willing to accept reimbursement at the rate determined and approved by the grantee as payment in full?

Follow-up Communication

Providers

Collaboration with providers is essential for ensuring that women receive the services necessary to meet program standards and requirements. In some cases, grantees simply need to educate providers on the diagnostic protocols used by the grantee. Routine quality assurance data checks should identify providers with patterns of care that are not compliant with standards or that represent outliers. When there is disagreement about adequate follow-up for a particular woman, grantees should consider using the appropriate medical advisory board members to evaluate the information and provide peer coaching.

Clients

Each woman must be notified in a timely manner of both her screening and diagnostic results. Grantee tracking systems complement provider systems and can function as a safety net to ensure that women receive timely results.

Lost to Follow-up

Sometimes, efforts to contact women about diagnostic and/or treatment follow-up are unsuccessful. These women may be considered as being "lost to follow-up." Follow-up can be particularly problematic with mobile and/or undocumented women. Grantees are expected to develop a lost-to-follow-up protocol to ensure that every reasonable attempt is made to contact women with abnormal screening results or diagnoses of cancer. This protocol should outline the process used in an attempt to contact a woman and, if unsuccessful, recommend that a certified letter be sent to the woman's last known address, with the receipt documented in her medical record.

The following methods can be used to reduce the number of women lost to follow-up:

Grantees should avoid recruiting women who will be extremely difficult to recontact (e.g., screening homeless women is acceptable only when the grantee has created an appropriate network of support services to find the women again if necessary).

Grantees should routinely collect additional contact information for all clients—that is, friends, family members, employers, and/or others who are likely to know how to contact the woman.

Grantees can use CAN-track to help identify women, reduce duplication of services, and improve the reporting of breast and cervical cancer screening results.

Field Example

One grantee considers clients to be lost to follow-up after the following steps have been taken:

- ***The provider attempted to contact the client by phone and found that the phone number had been disconnected with no new number.***
- ***The current resident of the client's last known address stated that she is unknown and does not reside there.***
- ***The provider sent a letter to the client, and the letter returned with a notation, such as "moved: no forwarding address" or "forwarding address expired."***
- ***The client's emergency contact was reached, and he or she was unable to provide the client's address or phone number. Also, the emergency contact was unable to reach the client and give his or her phone number for the client to contact.***

If all of these steps are unsuccessful, the client name is submitted to the central office or case management/patient navigator coordinator for referral to a tracing agency. If the client is located by the tracing agency, she is sent a certified letter with the grantee's logo and a regular letter without the logo. Clients who respond to either letter and complete the cycle are no longer considered as being lost to follow-up. Clients who do not respond are officially entered as being lost to follow-up.

Medical Refusal

Occasionally, women will refuse diagnostic follow-up and/or treatment for cancer. Grantees should develop a medical refusal protocol that can be initiated by the provider or grantee staff. Experiences shared at case management meetings indicate that medical refusal letters can be effective in changing a woman's mind about pursuing further testing and/or treatment.

VI. CASE MANAGEMENT/PATIENT NAVIGATION

The NBCCEDP defines case management/patient navigation as establishing, brokering, and sustaining a system of essential support services for NBCCEDP-enrolled women to identify and overcome barriers to definitive diagnosis and treatment. In some clinical settings, theses services may also be expanded to non-NBCCEDP women.

Case management/patient navigation has the following purposes:

- To ensure that women enrolled in the NBCCEDP receive timely and appropriate diagnostic and treatment services
- To identify client barriers, such as transportation, scheduling, and lack of understanding about the need for or nature of follow-up procedures

- To overcome these barriers so that the client can keep follow-up appointments and take action on recommendations

The NBCCEDP's case management policy outlines the key elements of case management at both the grantee (program) level and the individual (client) level. These elements include assessment, planning, coordination, monitoring, resource development, and evaluation. At the grantee level, the key elements are intended to ensure collaborative case management planning and infrastructure enhancement. At the individual level, the elements represent a cooperative process between the case manager, client, and provider to ensure timely and appropriate diagnostic and treatment services.

Grantee-Level Key Elements

Assessment—This element includes the projection of the need for case management and patient navigation services among NBCCEDP-enrolled women, combined with the structured appraisal of available community resources. Grantees should reevaluate resource needs regularly to ensure adequate staff and agency capacity. For example, grantees should ask and answer questions such as "Do we have transportation, translation, and referral providers throughout the State/region?"

Key Message

The availability of and need for resources change constantly. Thus, when setting priorities for further resource development, grantees should use the most recent data on common barriers and the resources needed to address these barriers.

All grantees are required to provide an assessment of the need for case management services for women with abnormal screening results and cancer diagnoses. Most grantees define their priority population for case management, and several use a tiered system for triaging women into different levels of case management. Some elect to extend their definition of priority population to include other groups of women, including women who are past due for rescreening, women who have had an abnormal result in the past, or women who appear to need additional support to make it through screening, diagnosis, and/or treatment.

Planning—This element includes the brokering of services likely to be necessary. For example, when a grantee identifies a patient with considerable psychosocial problems, staff members could refer her to the Patient Advocate Foundation. Networks should be built in the community so specific needs can be addressed and met (e.g., to provide food for women who are out of work).

Monitoring—This element involves the reassessment and, if necessary, the redesign of the program's case management/patient navigation systems and operational plan. Grantees should consider the efficiency and effectiveness of the current organizational structure, including a careful analysis of current advantages and disadvantages with respect to issues such as provider and client satisfaction as well as financial resources. Grantees should ask and answer questions such as "Are we doing what we said we would do?" and "Does the current operational plan for case management and patient navigation reflect what is actually happening?"

Resource development—This element includes the establishment of formal and informal agreements to maximize the availability of and access to essential screening support services and diagnostic and treatment resources.

Individual-Level Key Elements

Identification of women with abnormal results that may require case management—Grantees should establish protocols for notifying the case managers of women with abnormal screening results or cancer diagnoses. Timely notification helps ensure that the client will receive effective support during the optimal period for securing an expeditious and appropriate outcome. If case management services are provided somewhere other than the provider site, the provider and the grantee must use mutually agreeable protocols to make the referral for case management services.

Assessment—This element involves a cooperative effort between the case manager and client to determine the client's need for essential support to complete the recommended follow-up. To comply with client privacy protection policy, grantees must have a system for documenting consent and ensuring confidentiality.

Planning—This element includes the development of a written plan for an individual client. The plan should meet the immediate, short-term, and long-term needs identified in the assessment. Grantees should set goals and related activities with timeframes, and delineate who is responsible for meeting the goals. The design and implementation of documented client planning may vary, depending on the proximity of the case manager to the client's medical record. If case management can be documented in the provider's medical record, continuity of care may improve because all providers in the practice will be able see how potential barriers are being addressed.

Coordination—This element is the brokering of referral to needed services. Grantees should document the steps taken in the client plan. Maintaining close communication between case managers or patient navigators, the client, and the client's screening provider will ensure that services—both medical and supportive—are coordinated for optimal outcomes.

Monitoring—This element involves the ongoing reassessment of the client's needs through regular communication. Grantees should update client plans on the basis of routine re-assessments. Documentation of who, what, and when in the client's written plan will determine when it might be necessary to update the plan. Plans should be simple and relate to assisting the woman to keep her follow-up appointments. To update plans—in most cases—grantees should use notation stating that the client kept her appointment and that she understood what her next action should be and when.

Resource development—This element includes the promotion of self-sufficiency and self-determination among clients by ensuring that women gain the knowledge, skills, and support needed to obtain necessary services. Client education regarding the purpose and expected outcomes of diagnostic testing should be promoted and tailored for each individual woman. The ultimate goal of the program is not just to ensure that the woman receives the needed services, but also that she gains knowledge and skills for follow-up that are independent of NBCCEDP services (e.g., self-dependency).

Evaluation—This element involves assessing client satisfaction, access, and timeliness of referral services, as well as the quality of individual client plans. Grantees should ask and answer questions such as "Were barriers to definitive diagnosis and treatment overcome in a timely fashion?"

Field Example

At the 2004 National Case Management Training, participants identified the following strengths and challenges of NBCCEDP case management:

Strengths

- ***Relationships with screening providers are enhanced.***
- ***Communication among people at different organizational levels (e.g., screening providers, regional program staff members, contractors) and centralized program staff members is improved.***
- ***The use of nurses with prior case management experience enhances processes.***
- ***Partners (e.g., local health departments, home health programs) can provide useful resources.***
- ***Decentralization of the case management process can help ensure continued strong relationships with a smaller set of providers and better familiarity with community resources.***
- ***Training can strengthen knowledge and skills.***

Challenges

- ***Grantees that rely on the screening service provider to conduct the client elements may have trouble getting providers to complete a comprehensive, formalized client assessment and written plan.***
- ***Hiring qualified and experienced case managers is difficult for some grantees, particularly in rural areas where resources are most limited.***
- ***Training can be challenging, particularly if turnover among providers, their staff members, and grantee staff members is high. This is most problematic for decentralized or locally structured case management since these structures rely on more people to provide case management services.***
- ***Centralized (or even regional) case managers are less familiar with the community resources available to the client since they do not live or work in the local area.***
- ***Opportunities for communication about approaches, experiences, information, and forms or protocols are hard to orchestrate, especially in decentralized structures with larger numbers of case managers and providers.***

Case Management/Patient Navigation and the National Breast and Cervical Cancer Prevention and Treatment Act (NBCCPTA)

Since 2000, grantees have worked diligently with their Medicaid colleagues to implement the NBCCPTA, which created a Medicaid eligibility group consisting of women who were screened through the NBCCEDP and were found to need treatment for breast or cervical cancer (or precursors). In most States, grantees have become the gatekeepers through which a woman's NBCCPTA Medicaid eligibility is determined, maintained, and reestablished at predetermined intervals. Medicaid presumes that case management is part of the services a woman receives when being treated by a physician for breast or cervical cancer. Medicaid reimbursement is intended to offset the costs of these services, although a woman should receive tailored case management services from her treatment provider. Grantees can

enhance the Medicaid referral process by maintaining a close relationship with the Medicaid office responsible for NBCCPTA implementation and management.

NBCCEDP funding requires case management to the point of initial treatment or refusal of treatment. Once enrolled with a Medicaid provider for treatment, women have access to a Medicaid network of care providers, including hospitals, social workers, and case managers. The role of the NBCCEDP case manager is to successfully transfer the woman to these existing support services.

Key challenges remain for select categories of NBCCEDP women. For instance, undocumented women are not eligible for the services provided via the NBCCPTA. Treatment for these women must be ensured through the system that grantees had established for all clients before the NBCCPTA was established. In addition, women who move to another state during the course of treatment may encounter distinct differences in eligibility criteria between state Medicaid offices.

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* Because of the evolving nature of the Internet, Web sites noted here may no longer exist. In such cases, a global Internet search or search from the noted entity's homepage may be needed to locate specific documents and resources.

ATTACHMENTS

ATTACHMENT A

CLINICAL BREAST EXAMINATION (CBE) CORE COMPETENCIES

Ideally, the CBE should take place on days 6 through 10 of the menstrual cycle. The examination should be conducted thoroughly (at least 3 minutes per breast) in a setting that allows for minimal distraction and adequate patient privacy. The CBE technique must ensure that the areas commonly missed (upper outer quadrant and axillary tail, retroareolar complex, inframammary fold, and along and under the clavicle) are adequately covered (Barton, 1999).* CBE includes the following core competencies:

Health history—The patient's history should begin with a review of her concerns or symptoms and include risk factors, such as reproductive history, family history, and personal history of breast, ovarian, and colorectal cancer.

Visual inspection—The patient's breasts should be inspected to look for general contour, symmetry, color, texture, dimpling, or retraction.

Lymph node examination—The patient's supra- and infraclavicular and axillary lymph nodes should be examined, preferably while she is sitting with each arm supported at the elbow. Axillary nodes can be palpated in the lateral, medial, central, substernal, and subscapular planes.

Positioning—Proper positioning of the patient is necessary to spread the breast tissue evenly over the chest wall. A modified supine position should be used, with the hip and lower back supported, the knees flexed in the contralateral direction, and the ipsilateral shoulder rotated with placement of the back of the hand on the forehead. This position is particularly useful for women with larger breasts, and it avoids the shifting of breast tissue during the examination.

Perimeter—The perimeter includes the pentagon from the midaxillary line to the lateral edge of the sternum, and from the clavicle to the inframammary ridge. Covering the entire perimeter is essential to avoid missing areas where cancers are most likely to occur: the upper outer quadrant (50%) and the subareolar area (18%).

Pattern—The vertical strip and circumferential patterns provide comprehensive coverage of the breast perimeter and area within.

Palpation—This is done by using the pads (rather than the less sensitive tips) of the middle three fingers, with the hand slightly bowed and moving in overlapping dime-size circles.

Pressure—Appropriate pressure should be applied so that each palpation point has three sequential depths in a spiraling dime-size circle: (1) superficial, just moving the surface of the skin; (2) medium, to the midlevel of the tissue; and (3) deep, to the chest wall.

Patient education—Education should include the importance of breast awareness. Information on the importance of follow-through with mammography for age-appropriate women and the need for regular rescreening are important key messages during the examination.

Plan of action—Appropriate intervals for early detection should be suggested on the basis of the patient's individual risk factors and unique needs. For women with abnormal CBE results, the plan for workup should be discussed and reinforced.

Documentation of the CBE is optimally done on a standardized form with a diagram of the breast. Both normal and abnormal findings need to be documented for continuity of care, risk management and to inform referral providers of the clinical findings. MDEs for CBE are reported as one of the following: four categories

1. Normal/benign finding
2. Abnormality suspicious for cancer (diagnostic evaluation needed)
3. Not needed
4. Needed but not performed at this visit (includes refused)

In addition to these basic reporting categories, category 2 can be further divided into the following clinical categories:

Discrete palpable mass (includes masses that may be cystic or solid)
Bloody or serous nipple discharge
Nipple or areolar scaliness
Skin dimpling or retraction

Discrete masses need to be documented by using the following characteristics:

- Location, which is the distance from base of nipple, quadrant (or clock face), and depth (superficial, midlevel, deep)
- Size, given in millimeters or centimeters
- Shape, usually communicated as round, oval, irregular, or flat
- Mobility, either fixed or mobile
- Consistency or texture, described as rock hard, hard, firm, soft, rubbery, or spongy

Tenderness, described as present or absent, focal or diffuse, persistent, or only when palpated

Key Message

Nationally recognized experts, convened by ACS in collaboration with CDC, offered recommendations to help standardize the practice of CBE, which can be found in the following articles:

- ***McDonald, S., Saslow, D., & Alciati, M. H. (2004). Performance and reporting of clinical breast examination: A review of the literature.*** **CA: A Cancer Journal for Clinicians, 54*(6), 345–361.***
- ***Saslow, D., Hannan, J., Osuch, J., Alciati, M. H., Baines, C., Barton, M., et al. (2004). Clinical breast examination: Practical recommendations for optimizing performance and reporting.*** **CA: A Cancer Journal for Clinicians, 54*(6), 327–344.***

These reporting categories have been suggested by the NBCCEDP.

Clinical studies have shown that the most critical factor in distinguishing normal nodularity from a discrete mass is the duration of the examination. Unfortunately, the average CBE is less than 2 minutes, and the recommended CBE procedure requires at least 6 minutes for use of a thorough technique.

Centers for Disease Control and Prevention
National Center for Chronic Disease
Prevention and Health Promotion
Division of Cancer Prevention and Control
Program Services Branch
770-488-4880

NATIONAL
Breast & Cervical
Cancer Early Detection Program

SCREENING WOMEN, SAVING LIVES

NBCCEDP Program Guidance Manual

Professional Development

Version 2

TABLE OF CONTENTS

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I. INTRODUCTION

Overview of the Chapter

This chapter contains guidance, sample strategies and resources to develop a thoughtful approach to strengthening clinical practice through professional development.

Conceptual Framework

The Professional Development component is one of the two structural links in the National Breast and Cervical Cancer Early Detection Program (NBCCEDP) framework that directly tie partnerships to the delivery of screening and diagnostic services. Professional development enhances service delivery.

(See the Introduction to the Manual, NBCCEDP Conceptual Framework.)

Purpose of Professional Development

The purpose of professional development is to

- affect health care providers' knowledge, attitudes, and behaviors about breast and cervical cancer early detection;
- promote the current program guidelines for breast and cervical cancer screening;
- disseminate evidence-based breast and cervical cancer prevention and early detection education materials to providers, program staff, and regional staff; and
- build professional development resources through partnerships with professional organizations and academic institutions.

Definition of Professional Development

Professional development is the act of improving by expanding, redirecting, or refining the knowledge, skills, and attitudes of health care professionals to perform their jobs competently and with sensitivity for diverse patient cultures. It may include guidance to enhance delivery structures, which in turn support effective clinical practices that result in better outcomes.

Essential Elements of Professional Development

To meet the NBCCEDP's expectations in the area of professional development, a grantee should

- develop and revise, as appropriate, a professional development work plan;
- establish professional development program priorities on the basis of issues identified from the review of program-specific data, assessment of health professionals' training needs, and available resources;

- establish the priority audience for professional development as program-funded providers; and
- partner with appropriate professional organizations and institutions to enhance resources necessary for selecting and implementing effective designs.

Competencies Needed to Implement Professional Development

Staff members responsible for professional development need the ability to

- assess and prioritize professional development strategies,
- work collaboratively with the program manager and partners for professional development activities,
- plan and deliver training programs, and
- evaluate the effectiveness of training programs.
- Staff members responsible for professional development need knowledge in

- adult learning theory,
- skills-based training,
- professional development marketing, and
- NBCCEDP breast and cervical cancer screening and diagnosis policies.

II. Professional Development Planning

Professional development promotes provider learning. Defined as the act, process, or experience of gaining knowledge or skills, learning helps transform novices into experts. Learning is a process that helps individuals to (1) increase knowledge, (2) memorize information, (3) acquire knowledge and skill for practical use, (4) abstract meaning from what they do, and (5) gain a deeper understanding.

In the NBCCEDP, professional development is intended to improve service quality by supporting clinical practices that result in better outcomes. The goal of NBCCEDP professional development activities is to increase provider knowledge, skill, understanding, and behavior with respect to the use and efficacy of program-funded tests and procedures for screening program-eligible women.

(See the Screening and Diagnostic Services chapter for more information on the efficacy of screening tests and procedures.)

Identifying and Prioritizing Professional Development Needs

Planning effective professional development activities starts with an assessment of providers' learning needs. Program directors, professional development coordinators, Quality Assurance/Quality Improvement (QA/QI) coordinators, data managers, and case management coordinators must collaborate closely to ensure that the program's most important priorities are pursued. Also, grantees must work with medical advisory boards in the planning of professional development activities.

The following information sources may reveal learning needs:

- Surveillance data from the minimum data elements (MDE) data set
- NBCCEDP case managers' reports
- Site visits and chart audit reports
- Input from medical advisory boards
- New or revised clinical guidelines (as approved by the NBCCEDP) from published literature
- Key messages used to orient new grantee staff members and providers
- New policies or revised program policies (national and local)
- Client survey data regarding program satisfaction
- Provider survey data regarding self-perceived knowledge and needs
- Input from State review bodies regarding current problems and opportunities for improvement

Field Example

One grantee used the results of its chart audits to identify areas where providers did not follow the breast and cervical cancer diagnostic protocols for the timely and appropriate follow-up of abnormal screening results. The grantee then designed a professional continuing education program with a panel of interdisciplinary experts to deliver a series of case studies. These studies were used to demonstrate the appropriate clinical pathways of care that were consistent with the protocols. Attendees were offered continuing medical education (CME) credits, and they were asked to complete an assessment of current knowledge before and after the training so the grantee could identify improvements in clinical decision making.

Professional development can be used as a strategy to address a defined problem. The QA/QI chapter provides content on how to use the MDE data and other data sources to assess and monitor opportunities for improving both the program and the clinical outcomes for the women served. It also provides tools for assessing the root cause of problems, which can help identify professional development activities for improving the quality of breast and cervical cancer screening services provided by a program.

Programs are expected to collaborate with medical advisory boards and consultants to receive assistance in interpreting clinical data and/or determining professional development priorities. This collaboration fosters buy-in from prominent medical community members, including reputable peers and colleagues, and it can be a useful adjunct to promoting any product, program, or training project intended to improve clinical practice.

To learn what is new or changing in the field, grantees should keep current with the Centers for Disease Control and Prevention (CDC) policies and published literature on breast and cervical cancer. As program screening policies change (e.g., cervical cancer screening intervals) or reporting lexicons evolve (e.g., Bethesda and BI-RADS), grantees should disseminate information on these changes to program-funded providers and staff members. CDC will assist grantees in communicating with providers about new and emerging technologies and program screening practices.

Data from risk management organizations (e.g., malpractice insurance carriers, the Physician Insurers Association of America, the National Committee for Quality Assurance, and the Joint Commission on Accreditation of Healthcare Organizations) can provide useful insights for how professional development can assist a program's providers in improving the quality and efficiency of screening services. Professional associations and medical licensure boards also can be helpful in identifying knowledge gaps for providers.

Determining the Intended Audience

After learning needs have been identified, the program's professional development coordinator should define the target audience. By defining the audience for the professional development activity, the program can tailor the educational content appropriately.

Field Example

A chart audit in one program revealed one outlying provider whose abnormal clinical breast exam (CBE) results exceeded those of all other providers combined. After verifying the accuracy of the data, the program determined that professional development intervention was necessary to reorient the provider to the forms and definitions to be used for reporting abnormal CBE results. This activity effectively resolved the problem.

Although the NBCCEDP considers program providers to be the primary audience for professional development, program staff members also may be an important audience. All new staff members need a working knowledge of breast and cervical cancer prevention and early detection to function in their respective positions. Case managers, clinical coordinators, and recruitment staff need a more detailed knowledge of clinical protocols for early detection. Data managers also need basic knowledge of breast and cervical cancer prevention and early detection, including screening and diagnostic workup, to perform data management functions effectively.

(See the Program Management chapter for more information on staff development.)

Developing Assessment Tools for Determining Professional Development Needs

The program must assess the audience's perceived needs before formalizing professional development plans and activities. Information gathered directly from the audience members about their learning needs and interests can be integrated into the professional development plan, which will improve marketing success. Grantees may find it resourceful to partner with universities or other organizations to design, implement, and analyze provider needs assessments.

Key Message

The most effective needs assessment balances program-driven needs and self-reported needs. Adult learning theory supports this approach for maximizing a program's effectiveness in changing behavior. Survey questions pertaining to where, when, how, and what kind of CME the target audience prefers also will help programs in planning an effective professional development implementation.

A self-reported needs assessment tool can be customized for different audiences. If designed for a specific group or clinic, the assessment tool may have unique sections for different disciplines. The purpose and goals for the

assessment also can vary, depending on the grantee's objectives and resources.
When drafting assessment questions, a grantee should consider the audience, objectives, resources, timeline, and specific information related to the problem or issue that needs intervention. The questions should include those that assess attitudes, current practice skills and protocols, educational experience, perceived barriers, gaps in knowledge, preferred training methods, and time availability. Questions about desired training days, times, length, and location can help maximize participation. Using responses to these questions, a grantee can prioritize the perceived needs of its providers and their preferences for select delivery methods.

Thorough planning makes the process more efficient. For example, if a grantee decides to adapt an existing (e.g., from other grantees or professional organizations) survey instrument, it may consider conducting a pilot test with audience members to make sure that the tool is easy to complete and the questions elicit useful information. Grantees should consider the following tips regarding needs assessment:

- **Make sure the data collection tool is brief and to the point**—Although information gathering is important, grantees should resist the temptation to ask "nice to know" questions.
- **Phrase questions appropriately and make sure each question is necessary**—Grantee staff members should proofread the forms.
- **Explain the purpose of the tool in a cover letter or introduction**—The text should describe the purpose of each activity, why questions are being asked, and how the information will be used. It should emphasize the fact that participation is voluntary.
- **Ensure confidentiality**—Grantees should take measures to ensure that respondents' confidentiality is protected.
- **Choose an appropriate response time**—Grantees should give respondents enough time to think about their answers and return surveys without being rushed, but not so long that they put it aside.
- **Be available to answer questions**—Grantees should be able to address specific questions and concerns raised by respondents.
- **Plan ahead**—Grantees should determine how collected data will be summarized and analyzed.

The table below highlights common topics often used in breast and cervical cancer early detection needs assessment tools:

Clinical
Biopsy methods Screening guidelines Workup of abnormal screening findings using diagnostic algorithms Clinical support systems (such as tracking and follow-up) Case management (including client assessment and action planning) Effective communication with patients Cultural sensitivity when working with diverse populations Breast and cervical cancer updates, including new consensus and new evidence Overviews and progress reports on breast and cervical cancer morbidity and mortality reduction
Delivery Methods
Day of week and time of day for in-person learning Self-study vs. conference/workshop format Number of hours to be spent on the topic Specific needs related to the topic

Professional Development Methods

Choosing the right delivery method is as important as presenting the appropriate content, and grantees should remember that the purpose of professional development is to positively affect the practice patterns of the providers being educated. Grantees should consider the following two categories of professional development delivery methods:

- **Delivery methods that increase provider and staff knowledge of information related to quality screening for cancer prevention and early detection**—These methods may use lectures, informal group meetings (inservice sessions), annual meetings/conferences, or workshops, with dissemination of reports and literature to update program providers and staff members. Key screening messages and information also can be integrated into existing forums for providers (e.g., provider newsletters, medical grand rounds, medical society meetings).

- **Delivery methods that change provider and staff attitudes and behavior for better alignment with program policies and procedures**—These methods may use facilitated panels, case studies, skills training or practice with immediate feedback (including procedure rationales), self-assessment (before delivery, after delivery, or both), and peer coaching. Annual meetings also can be designed to use these methods.

Professional development coordinators should choose proven and appropriate methods to maximize the program's return on the investment of resources. Coordinators are encouraged to review the research literature to find evidence-based educational strategies that fit a given situation.

Adult Learning Theory

Andragogy, initially defined as the art and science of helping adults learn, has evolved into a model that asserts consideration of several key issues in formal learning: (1) letting learners know why something is important to learn, (2) showing learners how to direct themselves through information, and (3) relating the topic to the learners' experiences. People will not learn until they are ready and motivated to learn. Often, they require help in overcoming barriers, behaviors, and beliefs about learning.
Studies of adult learning in general have demonstrated that regardless of the learning method selected, adults learn best when the learning method

- is self-directed,
- fills an immediate need,
- is participatory,
- is experiential,
- is reflective,
- provides immediate feedback,
- shows respect for the learner,
- draws on the learner's own experience, and
- occurs in a comfortable environment.

Professional development activities are most effective when they are directly related to a provider's or staff member's job. In other words, staff members listening to a lecture on a topic that is only slightly relevant to their actual work situation are unlikely to change their behavior. A review of 14 studies analyzed the impact of formal CME activities on physician performance and patient outcomes. The review found that physicians reported spending an average of 50 hours per year on CME activities, and it indicated that didactic educational sessions did not appear to change physicians' performance—but interactive sessions did. To enhance professional practice and affect change in clinical outcomes, professional development activities, particularly self-assessments, should attempt to maximize participant interaction. Activities intended to raise knowledge can be informational in nature, while interaction and skills building exercises are used to impact attitudes and abilities. When grantees design professional development methods to modify behaviors, they should consider integrating adult learning theory and skills-based training concepts with planned activities.

When planning learning experiences for one adult, the grantee must identify the learning style that best fits that person. For a group of adults, the grantee should use a mix of activities and teaching methods to accommodate a variety of learning styles (e.g., visual, auditory, tactile, kinetic). Educators sometimes fall into the habit of using activities and methods that are compatible with their own learning style—assuming that everyone learns in this same way. Creating a variety of ways to present information helps all members of the group learn.

Selecting a Training Method

Grantees should select the design of the professional development method on the basis of (1) the desired behavior change, (2) the desired outcomes, (3) the desired learning methods, (4) the content of the curriculum, and (5) the resources available.

Another consideration is the competing needs for providers' attention. Health care providers must balance a burgeoning body of knowledge and recommendations from a variety of informational sources in their day-to-day practice. In some instances, a grantee's time might best be spent in a clinic providing face-to-face training of providers and staff, assisting with setting up a tracking or reminder system, and providing hands-on skill-building activities or role-playing opportunities. For example, if a grantee identifies one or two clinics as having poor follow-up rates for routine mammograms, staff members could visit the clinic and schedule a 15- to 30-minute meeting with providers—perhaps over lunch—to discuss the need to get women into the clinic for regular rescreening. For example, staff members could demonstrate a simple reminder system for use in flagging charts or electronic medical records of women who are due for a mammogram. Office staff could then receive in-service training and assistance in the clerical steps of setting up the reminder system. Finally, the visiting staff members could role-play a few client visits with the office staff to ensure that they understand the process.

Key Message

Experts in adult learning agree that as a group, adults will remember only 10% of what they read, 20% of what they hear, and 30% of what they see. Recall improves when they use more than one sense and when the learning becomes active. Adults are able to recall 50% of what they see and hear, 70% of what they say and write, and 90% of what they say as they do.

Skills-Based Training

Skills-based training, a performance-oriented educational method, emphasizes the development of specific competencies. This method is appropriate for the performance of psychomotor skills or intellectual skills, such as analyzing, inferring, interpreting, and summarizing. Examples include improving a clinical skill, such as performing a Pap test or CBE, and using clinical judgment for timely and appropriate follow-up of abnormal screening results.

Key Message

Evidence that the learner has attained a skill is demonstrated when the learner is able to perform the skill, not when the learner can recount the steps. This is a critical distinction between information acquisition and skills-based training.

Skills-based training is particularly useful for training professionals. It is essential that the tasks to be performed (e.g., completion of a data form) are determined by a complete needs and training analysis before any instruction begins. This analysis will identify the tasks or competencies that relate to actual performance and point out performance discrepancies. A performance discrepancy is the gap between an individual's desired performance and his or her actual performance; it is the difference between what should be done and what is done. Examples of this type of analysis are provider site reviews and chart audits. When a performance discrepancy is discovered, additional questions must be asked to determine

whether a need for training exists. The main question to answer is, "Is the performance discrepancy due to a skill or knowledge deficiency?"

For the actual skills-based training program, the required behaviors (tasks or competencies) and performance standards are stated in advance of instruction. The skills are then written to include the observable and measurable performance of the behavior, the conditions under which the learner will perform the behavior, and an acceptable standard or criterion. Skills-based training includes the following:

Field Example

Screening services in one program are provided by public health nurses with additional training in physical assessment of the breast (CBE and breast self-examination). New staff members are paired with an experienced nurse mentor to help reinforce the application of program policies, screening skills, documentation, and community involvement. This mentoring process begins immediately after completion of the formal orientation and continues until the mentor and the new staff nurse are both comfortable that the nurse can function on his or her own.

- Explanations of the need for the skill, how it is used, and the acceptable standard or criterion for measuring performance (with skill development training, it is imperative that the elements of a skill be identified)
- Demonstration of the procedure, task, or skill
- Opportunity for the learner to explain and demonstrate the skill to peers, instructors, or evaluators

In summary, job-related skills-based training includes the following steps:

- A complete needs and training analysis to determine the tasks or competencies that relate to actual job performance and any performance discrepancies
- Information about the skill to be learned and a description of the acceptable standard or performance criterion
- Demonstration or description of the skill, which points out the elements or steps involved in using the skill
- Guided practice in performing each step and the provision of feedback after each step
- Independent practice and the provision of individual feedback
- Demonstration and evaluation of the performance of the skill

Peer Coaching

Peer coaching is another approach for sustaining professional development over time. Grantees can sponsor peer coaches from their provider networks and enable them to become competent in a specific aspect of care (e.g., clinical skills, cultural competency). The return on this investment can be substantial. In essence, a program identifies NBCCEDP "champions" from within its provider network to coach

colleagues on specific skills and competencies, which helps sustain the desired outcome for the entire clinical practice. These program champions can help the grantee partner with other organizations. Research suggests that peer coaching may be the next model for professional development to sustain behavior change in clinical practice.

Implementing Professional Development Activities

Steps for Implementing Professional Development Activities

The following steps should be used by programs that are planning to conduct professional development activities:

- Identify the intended audience
- Conduct and analyze a needs assessment with program data
- Determine the purpose, goals, objectives, desired outcomes, and timelines
- Assemble a planning or advisory committee of key stakeholders for the desired outcome
- Conduct and analyze a self-reported needs assessment from the intended audience
- Plan a budget (see below)
- Identify available resources (see below)
- Secure sponsorships for financial or other training support as needed
- Design the training method (including topics, delivery methods, and supporting materials) and identify potential faculty members, facilitators, or trainers
- Begin the CME/continuing education unit (CEU) accreditation process (see below)
- Train the faculty team
- Identify and confirm the training site, meet with the facility liaison, and conduct a site visit (see below)
- Design, print, and disseminate marketing materials (see below)
- Market the professional development to the intended audience by using multiple concurrent strategies (usually allowing a minimum advance notice of 8 weeks)
- Manage the registration process, including confirmation of all participants
- Prepare and assemble the program materials (e.g., handouts, sign-in forms, evaluation/posttest, nametags, other materials for registration and packets)

- Determine logistical tasks and assign them to planning committee members for smooth coordination of the event

Budget

Planning a budget for professional development is an important initial milestone. The following direct expenses are common to most activities and need to be estimated:

- Marketing materials development and dissemination
- Facility or site expense
- Teaching materials duplication or purchase
- Faculty honoraria and/or travel costs
- CME/CEU processing (depending on the provider, this may or may not be an expense)

Grantees may want to find a financial cosponsor to offset expenses. Also, grantees can charge a registration fee to help offset costs and gain commitment by providers to attend.

Site Selection

Key Message

Most medical facilities provide in-kind (donated) space for professional development programs that target health professionals. Grantees should communicate a shared vision of the expected benefits for providers to ensure cooperation in obtaining donated space for the training.

When choosing a site for the training, grantees should consider a number of factors to ensure appropriateness. Many facilities (e.g., hospitals, clinics, health care organization offices) can provide grantees with in-kind (donated) space. Depending on the program content and delivery design, the grantee may need to perform a site visit to ensure that the facility meets the criteria for the event. The following should be considered: meeting room space, tables and chairs, lighting, audiovisual equipment, space for registration and food, access to building before and after the event, parking, and convenience for the audience. The grantee should negotiate with the site to sponsor such services as refreshments or meals (since federal funds cannot be used to purchase food), ensure security and housekeeping support, and identify a facility liaison to be present throughout the actual event.

For skills-based training, clinical examination rooms may be necessary. Availability of these rooms can affect the scheduling of the training, as most space is used for patient care during weekday hours. The grantee should meet with the facility liaison to review logistics, housekeeping, access, and security issues related to the use of examination rooms.

When incorporating professional development knowledge into existing forums (e.g., grand rounds, medical society meetings), the grantee must provide adequate lead time. This notice is essential for the placement of a particular topic or speaker into existing schedules, which are generally prepared well in advance.

Faculty Selection

Faculty selection depends on the training objectives, content, and delivery methods. When recruiting faculty members, grantees should consider the following:

- Do they know the content?
- Do they have good presentation skills?
- Do they understand and support training content and program philosophies?
- Do they know the audience?
- Do they know the location, date, and time of the training?

(See Attachment A: Readiness Checklist for Professional Development Trainings.)

Marketing Professional Development Activities

The success of a planned activity partially depends on marketing strategies. Without an effective marketing, even exceptional programs will not reach the target audience.

Designing Marketing Materials

For marketing materials to be effective, they must not only reach the target audience, they must also motivate the recipient to register. Some considerations for an effective design include the following:

- Provide CMEs/CEUs
- Use statistics to show the extent of the problem and its impact on women's health
- Highlight the date, registration process, fees (if applicable), location, maximum number of participants, registration deadline, and confirmation process
- Discuss learning methods, particularly if they are skills based
- Use colorful materials and a format that is easy to read, and highlight key messages
- If recognized experts are participating, highlight their individual names and/or organizations
- Emphasize how the information will help providers care for their patients

Field Example

One program established a Web site for its provider network to disseminate information on quality assurance, approved CME training, and breast diagnostic algorithms.

- Emphasize a discussion of controversies, risk management, prevention, new technologies, new guidelines or protocols, and new research
- Focus on improving quality
- Mention the learning environment, particularly if examination rooms are to be used

Marketing Strategies

Because marketing strategies vary in terms of design, grantees must consider the needs of the audience to ensure effectiveness. The following are common marketing strategies:

- Direct mailings with brochures, flyers, or postcards
- Site visits that promote training opportunities directly to program providers
- Electronic delivery of marketing information via fax, e-mail, or electronic mailing lists
- Web links
- Peer-to-peer referral
- Identification of a provider "champion" to promote the training among colleagues

Field Example

One program secured a partnership with the company that provides malpractice insurance to most of the physicians in the xtate. This partnership produced the following benefit: Insured physicians who completed the CBE office detail training received a $100 offset in tuition and a 7.5% premium discount for 3 consecutive years. This benefit was marketed directly to the physicians, helped motivate registration for the training, and was complementary to the goals and objectives of the grantee's professional development plan.

- Linkage with other organizations and groups for announcements in existing newsletters and calendars
- Announcements (either verbal or written) at existing education forums (e.g., grand rounds)
- Partnering with risk management organizations to promote the training to members or sites they monitor for quality

Grantees should consider making the attendance of providers and staff members at professional education programs a matter of contractual obligation.

Potential Barriers

Regardless of how well a professional development opportunity is marketed, existing provider barriers must be overcome to ensure that providers' interest and participation are maximized. Commonly encountered barriers include the following:

- Providers may have competing priorities for professional development (e.g., primary care providers must have current knowledge on many diseases so they can provide quality services to all of their patients).
- Providers may not perceive a need for training.
- Providers have limited time to devote to their own education, and time away from their practice often costs them revenue.
- Providers may view professional development activities sponsored by a federal government program with caution, not trusting the quality or intent.

Lessons Learned

A consideration of barriers can help programs design strategies that are consistent with the needs of providers. The following marketing strategies have been successfully used by grantees:

- Emphasize the fact that breast cancer is the second leading cause of death in women and that cervical cancer is highly preventable
- Provide CME/CEU accreditation for the training
- Include access to leading experts in the training session
- Provide training at convenient times and locations (including in-office "lunch-and-learn" sessions)
- Provide skills certification or refresher sessions
- Form partnerships with malpractice insurance carriers to offer premium discounts and promote the program
- Offer scholarships to relevant non-program training opportunities
- Obtain support/endorsements through partnerships with non-governmental organizations that have shared missions to reduce cancer mortality (e.g., the American Cancer Society [ACS] and Susan G. Komen for the Cure).

Field Example

Providing contact hours and CME/CEU credits serves as an attendance incentive for health care professionals. Many grantees partner with existing organizations and academic institutions to sponsor CME/CEU credits for their professional development programs. The process involves an application submittal and may or may not require a fee.

CME/CEU Accreditation

Because of licensing requirements, many providers need CME/CEU credits. Providers often prioritize their professional development on the basis of their need to fulfill this requirement. Offering CME/CEU (or other) credits can help grantees market professional development courses and trainings to licensed professionals. Grantees should consider working with universities and other professional education

organizations to process CME/CEU credits, and they should plan to contact the CME provider 4 to 6 months before the desired training date. Regardless of the accreditation body, a grantee must follow specific protocols and requirements in both marketing and providing the course/training, including submission of attendance rosters and evaluation summaries at the completion of the activity. Most CME/CEU affiliate accreditation bodies require grantees to involve them in the planning of programs.

Evaluating Professional Development Activities

Evaluating the professional development activity and/or training is essential for determining whether its objectives were met. Some common approaches to evaluation include

- testing participant knowledge before and after the activity,
- administering an evaluation to participants at the end of the activity,
- testing the skills proficiency of participants before and after the activity (e.g., CBE),
- administering self-assessments of clinical practice and behaviors before and after the activity.

Field Example

One program conducts a survey to collect participant evaluation data for each professional development activity for which continuing education credits are awarded. In addition, CBE training is evaluated by pre- and posttests and return demonstration. Data reports help to determine gaps in knowledge that should be addressed through training.

Additional evaluation questions for grantees to consider when evaluating the effectiveness of the professional development activity include the following:

- Did the planning process work effectively?
- Did the planned activities address the program objectives?
- Are partners satisfied with the results of the program?
- Did the participants perceive the activity to be of value to them?
- How effective were the various faculty members?
- Were the site facilities appropriate for the activity?
- Did the marketing strategy reach the intended audience?
- Did attendance meet projected goals in terms of numbers?
- Did attendees meet projected goals for affiliation, specialty, and experience?
- Was the activity cost-effective?

(See Section III: Evaluating Professional Development for guidance on evaluation of the professional development component as a whole.)

Professional Development Materials

Selecting the appropriate materials to help achieve the objectives of a professional development activity is important and must be balanced with the resources available.

Reviewing Existing Resources

There are a number of existing resources for professional development in breast and cervical cancer screening. Grantees should first review existing materials and assess their appropriateness for the audience and selected delivery method. Resources deemed appropriate should be endorsed and/or disseminated accordingly.

Grantees should consider the following questions for use in reviewing existing materials for their relevance to training needs:

- Are the materials consistent with NBCCEDP goals, objectives, and policies?
- Who makes up the primary audience? Can the materials be tailored for other audiences?
- What is the purpose of the materials?
- Are the authors and sponsors well-respected authorities/organizations?
- What topics are included?
- Are the materials comprehensive or focused?
- Is the information basic, or is it advanced and highly technical?
- Is the content balanced, objective, and factual?
- Do the materials discuss benefits and limitations of techniques/tests, as well as current controversies?
- Is the information evidence based?
- Do the materials include a table of contents, index, or glossary?
- Is the content relevant and current?
- How are the materials organized? Are they easy to read, following a logical sequence?
- Are there properly cited references?

- Do the materials include graphics and illustrations that add important information to the content?
- Is the product visually appealing, with high-quality graphics?
- Is the format interesting to read and/or review?
- What are the costs of obtaining the materials and implementing the activity?
- What is the cost/benefit ratio?
- How do the materials compare to similar products?
- Are CME/CEU credits available, and if not, can the grantee apply for credits?
- Have the materials been evaluated, and can the desired outcomes be obtained?
- Are the materials copyrighted? Is permission needed to copy and distribute the materials?

Grantees should consider the following resources:

- Materials produced by other NBCCEDP grantees
- CDC's Guide to Community Preventive Services
- Cancer Control PLANET
- Literature search resources (e.g., libraries, computerized databases)
- Word of mouth (e.g., peers, other grantees, faculty at universities, professionals at cancer centers)
- Other cancer partners (e.g., ACS and Cancer Information Service) and state affiliates, which may have developed materials, have clearinghouses, or can link to experts
- Professional organizations (e.g., American College of Obstetricians and Gynecologists, American Society for Colposcopy and Cervical Pathology, American Medical Women's Association, National Comprehensive Cancer Network), which may have online products
- Federal government agencies (e.g., CDC, Center for Medicare and Medicaid Services, Agency for Healthcare Research and Quality), which will have materials, publications, clearinghouses, or Web sites with helpful information
- Medical libraries and bookstores that have textbooks and CD-ROMs

- Pharmaceutical/biotechnology companies, which may have materials or conduct courses on products related to breast or cervical cancer early detection (if this resource is used, grantees should be aware of the potential for bias [or the appearance of bias] and ensure that there is no appearance of state endorsement of the company or product)
- Insurance carriers
- Internet searches based on topic
- Large medical universities

The table below provides additional guidance for specific media:

Videos	What is the format of the video? What is the overall quality? Does it make the best use of the medium? For example, does the video portray action or just use slides that have been transferred to video? What is the quality of the narration and sound? Are there clinical demonstrations or just experts discussing the procedures? Will the target audience relate to the patients and professionals in the video?
CD-ROMs	What is the format of the visuals and the soundtrack? Do they make the best use of the medium? What is the overall quality? Is the CD-ROM easy to navigate? Are there enough menu and map buttons to facilitate easy use? Is there an information insert on installation, tips for use, and troubleshooting? Is a contact number provided for technical assistance or questions? Is there a library, reference, or glossary section? Can sections be printed that would serve as valuable resources? Is there a zoom function for clinical illustrations or an area of particular interest?
Slides	What is the visual quality? Do the slides use an appropriate font size, variation in format, and combination of colors? Are key messages emphasized? Is there enough content on the slides, or too much content? How many slides are there, and is there enough time for their delivery? Are the slides outdated? How soon will they be outdated? Is there a plan for ongoing updates? Do the slides make the best use of the medium?
Web Sites	Is the Web site sponsored or endorsed by a well-known, well-respected group or individual? Is it linked to other sites that are also well respected? Are the links functional? Is the information useful and appropriate for the intended audience? Are there frequent updates and dates of last updates? Are sources of information properly cited? Is the Web site easy to navigate? If the site is large, does it contain a search function? Is there contact information for the author/sponsor and the Webmaster in case of questions or technical problems? Is the site a forum for personal, political, or ideological bias? Can needed information be downloaded or printed?
Model (Simulators)	What is the lifespan of the materials used? Will they deteriorate, and how often will they need to be replaced (e.g., silicone breast models)? What is the model's visual and tactile quality? Is it realistic? Is the model life-size or miniature? If it is miniature, will skills be translatable to work with actual patients? What type and amount of maintenance (e.g., powdering, cleaning) are required? How portable is the model (e.g., weight, size, shape)? Does it have a durable carrying case? How many models are needed? Does the model have a reduced price for its purchase in large quantities or by nonprofit groups?

With the advancement of Web and media technology, distance learning via self-study or videoconferencing is growing in popularity. These types of programs are convenient for professionals with access to high-speed Internet and/or conferencing technology, and many have interactive design features that promote participation by the learner.

In some circumstances, grantees can refer health care professionals to programs that offer certification.

(*Section V: Resources lists a number of existing professional development materials that may be relevant.*)

Consultant Collaboration

If appropriate materials do not exist, a grantee should consider the feasibility of developing its own. Establishing a planning committee with consultant support may be essential for acquiring the expertise necessary to proceed.

Working With Partners

Partnership Collaboration

Developing partnerships to design, promote, implement, and evaluate professional development activities is ideal. Although financial support is always a plus, the expertise and credibility that partners bring to professional development are essential. Many programs have reported successful working relationships with the partners listed in the table below.*(See the Partnerships chapter for more information on working effectively with partners.)*

Potential Partners	Common Mission	Examples
Medical, nursing, and other (cytology, radiology) professional associations	Professional development projects consistent with the mission and goals for their members	Integration of diagnostic algorithms training into their annual meetings
Academic institutions	Professional development projects that improve student curriculum in physical assessments and procedures for breast and cervical cancer screening	Diagnostic algorithms Clinical skills (e.g., CBE, colposcopy, fine-needle aspiration, Pap tests) Clinician communication and patient education skills Continuing education accreditation
State boards of medicine and nursing, the Indian Health Service	Issuance of provider continuing education designations (not CEUs), clarification of scope of practice issues (e.g., CBE)	Listing of professional development opportunities in their newsletters
Malpractice insurance companies	Risk management programs	Premium discounts for programs that meet risk management criteria
Managed care organizations	Professional development departments with similar goals to improve clinical outcomes	Skills training
Breast cancer coalitions	Advocacy and funding for professional development to improve the screening experience for women	Cultural sensitivity training Promotion of the importance of screening to women Funding of training activities for

		participants
Breast cancer organizations (e.g., Susan G. Komen Breast Cancer Foundation, ACS, Avon Foundation, National Asian Women's Health Organization)	Marketing and financial support of products and services to improve the quality of care in breast and cervical cancer screening (professional and public)	Educational publications (e.g., newsletters, patient education materials) CBE skills development
Community-based organizations	Surveys of various ethnic communities	Cultural sensitivity
State affiliates of national medical and nursing professional organizations/associations	Accreditation of continuing education programs for licenses	Credibility for quality continuing education
Companies that sell products and equipment for breast and cervical cancer screening, diagnosis, and treatment	Industry standard in allocating a percentage of their annual budgets to professional development partnerships (Caution: companies should promote a technique consistent with screening protocols.)	Provider "lunch and learn" activities, publication expenses, and marketing expenses

(See L.1: Contracts and Consultants in the Policies and Procedures chapter, which outlines the standards that must be upheld by the contractors being used by programs to provide professional development methods and materials.)

III. EVALUATING PROFESSIONAL DEVELOPMENT

Grantees must evaluate their professional development activities to ensure that the interventions will result in knowledge and behavior changes that improve clinical outcomes for the women served by the program. Assessment of the professional development component encompasses three major areas:

1. **Needs assessment**—Grantees are expected to use program data to assess priority needs for professional development. They should use QA/QI strategies to determine whether a professional development intervention is appropriate for achieving the quality goals and objectives related to an identified problem. They also should consider other methods for assessing needs (e.g., key informant interviews, literature searches, written surveys, phone surveys, focus groups).
2. **Professional development methods**—Grantees are expected to select professional development methods that will result in increased knowledge, skills, and behaviors to improve clinical service delivery. The use of adult learning theory helps programs achieve the desired results, including behavior change. Evaluation of the activity's ability to achieve desired outcomes must be measured.
3. **Professional development resources**—Grantees are responsible for determining what resources are necessary to provide professional development interventions. When appropriate, grantees should develop partnerships to achieve mutual goals.

Measurable Objectives

Professional development evaluation should be guided by specific and measurable objectives that reflect a program's interests and priorities. Some suggested objectives are the following:

Needs Assessment

By [date], program data will be monitored and analyzed to determine the priority professional development needs of providers and staff.

By [date], the target audience for each professional development activity will be identified and surveyed for self-reported needs and optimal delivery methods.

Professional Development Method

By [date], the professional development work plan will identify the optimal professional method and delivery that best meet the needs of the target audience.

Professional Development Resources

By [date], the budget for the professional development activity will be secured from program funds and/or partnership resources as determined by the work plan.

From [date] to [date], the number of program providers (and/or staff members) participating in the professional development activity will increase from _____ to _____.

Evaluation Questions

Once a program establishes measurable objectives for professional development, it should convert each of those objectives into a set of evaluation questions. Identifying those questions allows the program to determine the best process for collecting the data needed to answer them.

In evaluating professional development, a program can begin with evaluation questions related to its objectives and measures of success for data management described in its BCCEDP work plan. The program may want to consider other questions of interest that were not included in the work plan.

Some additional questions to consider include the following:

Needs Assessment

- What is the correlation between the professional development work plan objectives and variance noted in MDE indicators?
- Are QA/QI and case management problems linked with professional development planning?
- How do the program's QA/QI and screening components interface with its professional development component?
- In what ways can staff members be better informed about breast and cervical cancer screening, diagnosis, and treatment?
- Who makes up the priority professional development audience?

Professional Development Method

- Are professionals satisfied with professional development activities?
- Has input been obtained from the audience members on their perceived needs?
- Do the marketing strategies reach the target audience?
- How effective are the faculty members selected, and are they satisfied with their participation?

Professional Development Resources

- Are there adequate resources to conduct the professional development activities included in the work plan?
- How much of the target audience is reached, in comparison to goals (e.g., volume, type, network affiliation, specialty, experience in health care)?
- What is the cost per participant?
- Do the program's professional development activities reach providers in its network?
- Does the program have an adequate number of staff members with the right experience and expertise to implement professional development activities?

IV. RESOURCES

BOTH BREAST AND CERVICAL

ORGANIZATION	RESOURCE
Cancer Detection Section, California Department of Health Services	Continuous Quality Improvement Training Center Web site for cervical and CBE training, (http://qap.sdsu.edu/education/index.html
The Mautner Project	Providing Culturally Competent Care to Lesbians and Women Who Partner With Women
MammaCare, Mammatech Corporation	Certification as MammaCare Specialist, Clinical Breast Examiner, and MammaCare CBE Instructor (http://www.mammacare.com/Specialist.php)
Breast Imaging Specialists	Continuing education courses for imaging
American Society for Colposcopy and Cervical Pathology	HPV and Cervical Cancer Prevention online CME program (http://cme.asccp.org/home/home.cfm)
Kentucky Cancer Program: Providers Practice Prevention	Cervical Cancer Screening and Diagnostic Protocols: A continuing education program for providers

Note: Because of the evolving nature of the Internet, Web sites noted in here may no longer exist. In such cases, a global Internet search or search from the noted entity's homepage may be needed to locate specific documents and resources.

ATTACHMENTS

ATTACHMENT A

READINESS CHECKLIST FOR PROFESSIONAL DEVELOPMENT TRAININGS

A readiness checklist can be very helpful for ensuring that all preparations are complete and ready in time for the training. Examples of items for the checklist include the following:

1. Before the Training

- Confirm sponsorships, donations, etc., and determine how to acknowledge them on recruitment materials and at the training
- Develop, print, and disseminate training marketing materials to recruit and register participants
- Make sure that all required language for continuing education credits is included
- Establish deadlines for participant registration and send notifications to confirm attendance
- Meet with the facility coordinator to review logistics and responsibilities
- Develop a participant list, faculty biosketches (for marketing and CEU applications), and a sign-in sheet for the training; prepare nametags and other materials for registration
- Select, copy, and assemble materials for participant packets
- Create an assignment sheet for logistics and the responsibilities of the planning team

2. During the Training

- Ensure that the facility is open at the negotiated times, directional signs are posted, and rooms and audiovisual equipment are in order
- Set up refreshments (if provided) and trash receptacles
- Set up the registration area with a sign-in sheet, nametags, participant packets, and other materials
- Ensure that all evaluation materials are collected and CME information is processed per protocol

3. After the Training

- Hold a debriefing session with faculty and planning committee members
- Summarize all evaluations and send the summary to faculty and planning committee members
- Send thank-you letters to faculty members, sponsors, and others as appropriate
- Provide the required participant and evaluation information to the CME provider

- Process payments and expenses accordingly
- As needed/if promised, provide participants with summaries and additional materials

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SCREENING WOMEN, SAVING LIVES

NBCCEDP Program Guidance Manual

Public Education and Targeted Outreach

Version 2

TABLE OF CONTENTS

ATTACHMENTS

I. INTRODUCTION

Overview of the Chapter

This chapter contains sample strategies and resources to assist in the development of a thoughtful approach to implementing evidence-based strategies for public education, outreach, and in-reach appropriate for women.

The Public Education and Targeted Outreach component is one of two structural links that directly tie partnerships to the delivery of screening and diagnostic services. Public education and targeted outreach creates demand from and provides a link to services for all women. Public education and targeted outreach includes educating women about the importance of screening, explaining the services available, and removing barriers to screening.

Purpose of Public Education and Targeted Outreach

The purpose of public education and targeted outreach is to increase the number of women who use breast and cervical cancer screening services by raising awareness, educating women, addressing their barriers, and motivating women to complete screening exams as part of their routine health care.

Definition of Public Education and Targeted Outreach

Public education involves the design and delivery of clear and consistent messages about breast and cervical cancer screening. Targeted outreach relies upon comprehensive, tailored, population-specific strategies designed to reach and bring women into clinical screening services. In-reach involves approaching women who are using other health services (e.g., getting a flu shot, receiving care for diabetes or heart disease, etc.) and recruiting them into clinical screening services.

Essential Elements of Public Education and Targeted Outreach

To meet NBCCEDP's expectations in the area of public education and targeted outreach, a grantee should do the following:

- Engage partners, including representatives from the priority population(s) and the Comprehensive Cancer Control (CCC) coalitions, in assessing needs and developing plans, and in selecting and implementing evidence-based strategies for population-wide activities in public education, outreach, and in-reach.
- Where appropriate, leverage and enhance the existing public education and outreach efforts of partner organizations in the community to minimize duplication. Conversely, invite partner collaboration on public education and targeted outreach activities initiated by the grantee.
- Conduct targeted outreach in the community and in-reach within participating provider and healthcare systems.
- Use evidence-based interventions for education and outreach.

- Develop, disseminate, and utilize well-designed and tested small media products.

Competencies Needed to Implement Targeted Education and Outreach

Staff members responsible for public education and targeted outreach need the ability to

- conduct a comprehensive community assessment,
- use data to develop targeted outreach strategies,
- work effectively with partners and coalitions,
- use program data to plan and evaluate activities,
- recruit and supervise appropriate outreach personnel.

Staff members responsible for public education and targeted outreach need knowledge in

- use of data for identification of the priority populations and where they are located;
- tailoring public education and targeted outreach strategies to the cultural values, norms, and behaviors of the priority populations the program serves;
- working with existing social networks in various unique cultural communities;
- barriers to breast and cervical cancer screening and follow-up and how to help women overcome them; and
- use of behavioral change theories (e.g., stages of change, health belief model, social ecological theory).

(See the Program Management chapter, Staffing and Personnel Management, for additional information on hiring, orienting, developing, retaining, and communicating with staff members.)

II. Public Education and Targeted Outreach

Role of the Public education and targeted outreach Coordinator

Each program will need to have a public education and targeted outreach coordinator job description that best meets its unique needs. Sample job duties are as follows:

- Conduct community assessments to develop population-based public education and outreach activities
- Report outreach activities with a computer-based program
- Serve as a consultant and provide technical assistance to all programs requesting materials or information regarding programs on breast and cervical cancer

- Evaluate existing educational materials as well as develop and test new materials by using social marketing theories
- Collaborate with ethnic and racial minority groups to implement culturally appropriate education and outreach programs
- Collaborate with other agencies or health department divisions that focus on cancer awareness
- Use social marketing concepts to present breast and cervical cancer prevention resources to women
- Assess education resources in regions and evaluate public education and outreach opportunities
- Participate in the development and implementation of a client satisfaction survey with program team members
- Design and implement statewide awareness campaigns for National Breast Cancer Awareness Month and Cervical Cancer Awareness Month
- Coordinate and evaluate the effectiveness of health education activities
- Provide continually updated, appropriate breast and cervical cancer information on the grantee Web site

Process of Conducting Public Education and Targeted Outreach

The location of the public education and targeted outreach function varies across National Breast and Cervical Cancer Early Detection Program (NBCCEDP) grantees. Some grantees use a more decentralized approach and contract with regional or local staff members either individually or through other agencies [e.g., local health departments, other health clinics, community-based organizations (CBOs)]. Staff members in these local agencies fulfill the public education and targeted outreach function. Other grantees coordinate the public education function through the central BCCEDP office and contract with other agencies or personnel to conduct the inreach and outreach activities associated with public education and targeted outreach. Still others carry out the education and outreach function almost exclusively with a BCCEDP education and outreach coordinator. Program structure affects which education and outreach strategies are most feasible.

The proposed process for planning, implementing, and evaluating a public education and targeted outreach plan involves the seven steps described below. These steps are offered as suggestions, with the expectation that grantees will use them to develop their own tailored approaches.

1. Determine the Priority Populations

The first step in designing an effective public education and targeted outreach plan is to determine the priority populations. The NBCCEDP *priority* population for breast cancer screening is women between the ages of 50 and 64. The NBCCEDP *priority* population for cervical cancer screening is never and rarely screened women aged 21 to 64. Other priority populations might include new immigrants; foreign-born women; lesbians or women who partner with women; women from ethnic and racial minorities, including

American Indian and Alaska Native women; disabled women; and rural women. The priority populations for each grantee are specific to the demographics of the particular geographic catchment area. In addition, for cervical cancer, program-eligible women who have never been screened or have not been screened in the past 5 years are of high priority.

Using resources such as state surveillance data and the state cancer tumor registry data can help to provide grantees with valuable information, such as how many women are in the service area may have the poorest cancer outcomes, and which populations are and are not getting screened. These resources can help to determine where there may be clusters of women in need of breast and cervical cancer screening. For example, if there are places in the service area where the percentage of late-stage diagnosis is particularly high, the women in these sites may either lack accessible services or need more education to help overcome barriers to screening.

(See the Data Management chapter to learn more about various data sources and how they can be used to target public education and targeted outreach efforts.)

2. Assess the Community and Intended Audience

Priority populations may often be referred to as the "intended audience." To learn more about the intended audience, grantees might use one or more of the following methods:

- Assess the knowledge, attitudes, and behaviors of the intended audience. Methods of accomplishing this assessment include focus groups, surveys, interviews with women from these communities, interviews with staff from agencies and organizations already serving the population, and interviews with service providers.
- Conduct intercept interviews with women from the intended audience. Intercept interviews are defined as interviews conducted by a trained interviewer. The interviewer approaches women in a public place and asks them questions about the use of breast and cervical cancer screening services. Common places to conduct intercept interviews are grocery stores, shopping malls, and community events.
- Use the National Cancer Institute's (NCI) Cancer Information Service (CIS) Community Health Profiles to learn more about the health behaviors, media habits, and use of health services by the intended audience.
- Observe the geographical and environmental conditions that might impact screening behavior (e.g., snowy mountain roads that make it difficult for women in the area to get to screening appointments during winter months).
- Conduct an inventory of existing resources for education, screening, and follow-up services related to breast and cervical cancer screening.

- Conduct an inventory of places that are frequented by the women in the intended audience. This information will be useful when distributing brochures and other marketing materials as well as when conducting one-on-one outreach.

- Identify potential partners that might be helpful in providing more information about the priority populations. Obtain input from partners, including representatives from priority population groups, in assessing needs and developing comprehensive plans for public education, inreach, and outreach. Often, NBCCEDP grantees partner with cooperative extensions, the American Cancer Society (ACS), and other cancer organizations or CBOs serving the intended audience, to extend the reach of the public education and targeted outreach efforts.

3. Determine Strategies

Some steps for determining which strategies to use are described below:

- Consult the health education literature to develop a theory of health behavior change that can guide the program. A particularly helpful resource is Theory at a Glance. Many grantees have found that the social-ecological model of behavior change is useful because it describes the importance of making changes at a number of levels to accomplish the intended behavior. So, for the BCCEDP, the public education and targeted outreach approach would need to address the individual woman, her networks, the organizations with which she interacts, the community in which she lives, and the policies that influence screening.

  Consider other useful theories when working with individual women, such as the stages of change model (sometimes called the transtheoretical model). This model describes the various stages that all people go through in making a behavior change, and it suggests the types of interventions that are most helpful in different stages. It can help those involved in public education and targeted outreach to use strategies that are effective for bringing in women for breast and cervical cancer screening and ensuring appropriate rescreening.

  (See Attachment A: Stages of Change Model for a sample of ways to use this model in tailoring messages related to breast and cervical cancer screening.)

- Consult the Community Guide (http://www.thecommunityguide.org) and Cancer Control PLANET (http://cancercontrolplanet.cancer.gov/) to learn about evidence-based approaches. These resources contain strategies that have been evaluated and found to be effective in getting women in for breast and cervical cancer screening.

- Review the health education literature (e.g., Health Education and Behavior, Journal of Health Psychology, American Journal of Public Health) for reviews of evaluated strategies.

- Interview successful BCCEDP programs to determine what public education and targeted outreach efforts have worked for them.

- Interview partner organizations (e.g., ACS, cooperative extensions, other CBOs) serving the intended audience to learn what methods have worked for them.

4. Form Partnerships

BCCEDP partners can be most helpful in extending the reach of a grantee's public education and targeted outreach efforts. Important partners to consider are CBOs serving the intended audience as well as other cancer organizations (e.g., ACS; the Susan G. Komen Breast Cancer Foundation; NCI/CIS and State cancer registries; community health clinics; local health departments and community providers; county cooperative extension offices). Partners can help a program gain access to the communities it wants to reach. Some partners can be helpful in collecting, analyzing, and using data; others can offer insight about the cultural beliefs and practices of women in the intended audience. Partners also can help leverage resources for treatment and other services that are not offered by the BCCEDP but serve as a necessary adjunct to the BCCEDP screening services; others can help leverage limited financial and human resources. All partners must have a clear idea of their roles and responsibilities.

(See the Partnerships chapter for detailed steps in establishing effective partnerships.)

5. Develop a Public Education and Targeted Outreach Plan

The public education and targeted outreach plan should be part of the grantee's work plan and should relate closely to the overall goals and objectives of the program. Specific objectives for the Public Education and Targeted Outreach component call for conducting outreach to women to increase breast and cervical cancer screening.

Activities designed to reach public education and targeted outreach objectives should be determined on the basis of current assessment findings, previous evaluation results, and available resources. For each activity, lead persons, along with a timeline for accomplishing the activities, should be designated to help guide staff members in implementing the public education and targeted outreach plan. An evaluation of public education and targeted outreach strategies also should be included in the plan. Including partners in the development of the public education and targeted outreach plan will help to ensure good collaboration in activities that require the coordination and assistance of other organizations and individuals.

6. Implement Strategies

Many types of public education and targeted outreach strategies can be effective. Usually, a BCCEDP is most successful if it uses a combination of strategies rather than relying on only one or two. The Community Guide states that there is strong evidence that multicomponent interventions using media, education, and enhanced access to breast and cervical cancer screening services will improve the use of these services. In this chapter, public education and targeted outreach strategies are divided into three types: public education, inreach, and outreach. Each is discussed briefly below.

Key Message

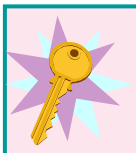
The Community Guide states that there is strong evidence that multicomponent interventions that include media, education, and enhanced access to care are effective in promoting breast and cervical cancer screening.

7. Evaluate Effectiveness

Programs should ask themselves the following question to evaluate the effectiveness of public education and targeted outreach efforts: Did we reach the priority women we needed to reach and bring them in for breast and cervical cancer screening? Evaluation strategies are discussed below in Section III: Evaluating Public Education and Targeted Outreach Efforts.

Three Major Public education and targeted outreach Strategies in BCCEDP

The three major public education and targeted outreach strategies used by BCCEDP grantees are public education, inreach, and outreach. The ultimate goal of public education and targeted outreach is to go beyond simply raising awareness to actually bringing women in to breast and cervical cancer screening services.



Key Message

The Community Guide states that small media (e.g., brochures, fliers, local newspapers, newsletters) promotes breast and cervical cancer screening.

1. Public Education

In the BCCEDP, public education creates awareness of the benefits of breast and cervical cancer screening issues among the general population. It can help people learn about the risks associated with breast and cervical cancer, the importance of early detection, and how to find screening services. It is also a way to market the services provided by the BCCEDP. Public education often uses electronic media (e.g., TV, radio, Internet) and print media (e.g., newspapers, magazines, church bulletins, fliers). Media can be defined in one of two ways: mass or targeted.

Mass Media, Both Large and Small

Mass media generally includes public service announcements (PSA), advertisements, and interviews or stories on television or radio, as well as in newspapers and magazines. The strength of mass media is that it has the potential to reach large audiences; the weakness is that the audience is diverse and heterogeneous. It generally is difficult to evaluate the effectiveness of mass media; however, one way is to tie the activity with a call or prompt to action that specifies a unique extension number for that activity (e.g., "call 1-800-xxx-xxxx, extension x"). In addition, programs should consider using small, or local, media. Weekly newspapers, for example, may be widely read by community women and can be inexpensive avenues for placing ads. Media channels generally have a more powerful effect when used in combination with other interventions.

Targeted Media, Especially Direct Mail Campaigns

Targeted media is designed to reach specific segments of the population and includes newsletters, booklets, self-help kits, videos, and computerized information systems. A direct mail campaign is one very effective targeted use of the media. In these campaigns, the BCCEDP gets mailing lists/labels by ZIP Code

of women in need of breast and cervical cancer screening from NCI/CIS or other State or local organizations. The BCCEDP then sends out letters to all women in that ZIP Code, educating them about the need for breast and cervical cancer screening services, informing them about eligibility for the BCCEDP, and providing information on enrolling in the BCCEDP. Sometimes, a coupon for a "free" mammogram or Pap test is included.

Field Example

Direct mail was one of the most successful strategies for one statewide enrollment campaign. The program used focus groups to select an appropriate theme that was visually appealing and carried an attractive message. As a result, green and orange direct mailers were designed to encourage women to "take charge" of their health. Each mailer contained a tear-off reply card that could be returned with no postage necessary. The program purchased a mailing list through a contracted agency and sent approximately 116,500 direct mail pieces—targeting rural, African American, and Hispanic women aged 50 to 64. From April 1, 2003, through December 31, 2003, over 1,540 direct mail cards were returned to the program. Information from the cards was referred to local agencies, and more than 260 women enrolled in the program as a result of this outreach effort.

2. Inreach Through Existing Clinics, Programs, and Services

In large public medical systems, people often receive a few medical services without being aware of all of the services that are appropriate for them. Inreach focuses on existing clients or patients in a clinical setting and informs them about the need for and ways to obtain breast and cervical cancer screening services. For example, a woman may come into a health department or community health center for her flu shot. While she is there, a staff member could ask her when she had her last Pap test, clinical breast exam, and mammogram. If appropriate, the staff member could then educate her about the importance of breast and cervical cancer screening and refer her to the BCCEDP for eligibility determination and screening services.

Key Message

The Community Guide provides strong evidence that client reminder systems—whether by telephone, letter, or postcard—are very effective in bringing women in for breast and cervical cancer screening.

Field Example

In one BCCEDP, services are provided through most local county health departments. During the flu shot campaign in late summer and early fall, information about the BCCEDP services are provided to all clients who receive a flu shot. Appointments for the BCCEDP clinic can be scheduled while the client is waiting in line for a flu shot, or the client may be contacted later and encouraged to schedule an appointment.

Potential places for inreach activities include the following:

- Local health department clinics
- Federally Qualified Health Centers
- Indian Health Service clinics
- Free community clinics
- Physicians' offices
- Urban Indian health clinics

Key Message

The Community Guide states that providing client incentives, combined with reminder notices (e.g., postcards, letters, telephone calls), can be an effective strategy for bringing women in for breast cancer screening services.

Flags for charts, visual prompts in the examination room, and other reminder systems can encourage staff members in these office settings to talk with women about why breast and/or cervical cancer screening is important and how the BCCEDP can support them.

Alternatively, a BCCEDP staff person could review clinic records for eligible women not currently enrolled in the program and then send out "letters of invitation" specifically targeted to these women.

3. Outreach

The goal of outreach is for the program to go out into the community, find eligible women who currently do not use breast and cervical cancer screening services, and bring them in for screening. A number of strategies can be used for outreach, including the following:

- **Interpersonal education**—This outreach strategy involves direct interaction or communication with an individual client or others who are important to her.
- **Community group education presentations**—This outreach strategy involves offering workshops then providing an opportunity for interaction with individual women.
- **Reduction of structural barriers**—This strategy usually involves the public education and targeted outreach coordinator working closely with the professional development coordinator and other community partners to reduce screening barriers that are associated with the health care system. In this case, outreach is often focused on the providers of services as well as the women who need screening.

Field Example

Outreach for African American, Rural, and Hispanic Women Aged 40 to 64

One of the breast and cervical cancer programs conducted a statewide enrollment campaign targeting African American, rural, and Hispanic women aged 50 to 64. Research conducted prior to the campaign launch included a review of the relevant literature regarding the target population's knowledge, beliefs, attitudes, and barriers in relation to breast and cervical cancer screening. Focus groups also were conducted. Research findings suggested that the program use a highly interactive campaign incorporating mass media and face-to-face communication. Tactics included direct mail, coalition building, "enrollment day" events supported by radio advertising and media relations, faith-based outreach, and a "peer advocates" program. The campaign resulted in approximately 4,500 women contacting the program during a 9-month period. In terms of actual enrollment, about 2,900 more women enrolled in the program, as compared with the number who enrolled in the previous year—a 49% increase in enrollment overall and a 48% increase in minority enrollment. The most successful outreach strategies were direct mail pieces and radio advertisements. Few program contacts or enrollments resulted from "enrollment day" or "peer advocates" efforts.

Interpersonal Education

Interpersonal education strategies involve one-on-one communication with a woman and/or her significant others—family members, friends, or coworkers. These strategies can be offered by BCCEDP staff or partners, patient navigators or lay health workers, health educators, trained outreach workers, volunteers, and community health workers. Grantees may train religious leaders and other community gatekeepers to promote cancer screening. In addition, grantees may consider targeting campaigns to family members who influence screening decisions. The purpose of this interpersonal interaction is to

- determine what the woman knows about breast and cervical cancer;
- educate her about the importance of early detection through the use of screening tests, if appropriate;
- determine her readiness to change her current screening behavior, using the stages of change model;
- elicit any barriers to getting screening services (including cultural and religious barriers);
- build on any strengths (or factors that promote screening) to help her overcome barriers;
- inform her about the eligibility requirements for the BCCEDP;
- assist her in getting an appointment for breast and cervical cancer screening services; and
- follow up to ensure that she kept the appointment.

Interpersonal education strategies can provide more than information. Learning, skills development, and behavior change are enhanced if a person can practice the desired behavior, receive feedback, take an active participatory role, or exchange ideas with peers. Additionally, interpersonal approaches often can be tailored to specific needs, such as language preference, degree of literacy, readiness for change, and level of risk. Interpersonal education strategies may be particularly important in breast and cervical cancer screening programs because of the need to address specific barriers for the individual woman.

One-on-one interpersonal communication may occur in many different places. Programs should think about where women from the intended audience already go on a daily basis and where they are employed. Experienced public education and targeted outreach coordinators have recommended the following settings:

- Homes of individual women from the intended audience
- Beauty shops
- Grocery stores, discount stores, tiendas
- Pharmacies
- Clinic waiting rooms
- Worksites
- Religious institutions
- Community centers
- Meal sites
- Flea markets
- Laundromats
- Senior citizens centers
- Housing developments, trailer parks, reservation community centers
- Bingo halls
- Other community gathering places
- Community events

Community Group Education

Many BCCEDP public education and targeted outreach coordinators have found it useful to partner with community-based organizations to promote cancer screening (i.e., churches, barbershops, beauty salons, worksites, churches). Depending on the target audience and location, the grantee may develop local media campaigns using ethnic media. Detailed descriptions of two interventions

Field Example

Outreach for Korean Women

A variety of factors, including cultural differences, language barriers, transportation barriers, and misperceptions about their cancer risk contribute to Korean women often being never or rarely screened for breast and cervical cancer.

Two local health departments demonstrated success in recruiting Korean women into the BCCEDP by employing bilingual Korean outreach workers. Their strategies included one-to-one recruitment, PSAs in a Korean newspaper, outreach to Korean grocery stores, and word of mouth within the Korean community. Additionally, Korean outreach workers provided translation services for screening appointments, case management, and recall.

Worksite Interventions. *The worksite is a logical setting for offering early detection and prevention programs.* Worksite programs also allow for the possibility of reaching out to family members of employees.

Worksite characteristics enhance opportunities for screening by providing

- a convenient location for participation in health promotion programs at a reduced expense to both employee and employer,
- opportunities for social support,
- incentives for healthy behaviors or lifestyle changes,
- relatively stable populations over time, enhancing opportunities for evaluation, and
- space that can be used for programs.

Programs should consider partnering with worksites and their insurance providers to identify strategies to enhance cancer screening within the organization. They should consider reaching women by providing brochures on the importance of early detection and prevention, as well as other information about programs and services that are available in the community; conducting onsite educational programs; offering breast and cervical cancer screening; or providing referral and follow-up services. Any or all of these strategies might be appropriate, depending on the setting, resources, needs, and interests of the worksite. Companies do not have to be large or wealthy to be candidates for these programs, nor do they have to limit themselves to the women onsite. They can extend their offerings to spouses, dependents, retirees, and customers, and they also can provide screening onsite, via mobile or company-owned units, or offsite. Many companies have reported that participation in their screening programs surpassed their projections and enabled them to reach large proportions of their workforce.

Regardless of the location, certain basic standards apply to worksite-based screening efforts (and to screening in health care settings as well). Most importantly, every woman with an abnormal screening result should receive prompt and appropriate diagnostic evaluation and, if necessary, treatment. Thus, a mechanism must be in place for follow up of abnormal findings. Worksite-based screening programs also should consider the need for regular rescreening.

Suggestions for reaching women where they work include the following:

- **Occupational health departments**—Many worksites, large and small, have medical personnel who conduct pre-employment physicals, periodic medical examinations, and other clinical services. Employees often turn to them for basic medical information and assistance. Occupational health personnel can distribute information and conduct screenings. They are also an excellent audience for professional education programs.
- **Health promotion and wellness programs**—As noted above, many worksites can incorporate cancer prevention and early detection interventions and messages into existing programs. These programs often have the necessary supports and infrastructures in place and, thus, can support this approach.

Consistently, both researchers and practitioners call for the inclusion of cancer-related early detection messages and screenings in comprehensive health promotion programs.

- **Communication mechanisms at worksites**—Programs can communicate with women in the workforce in a number of ways. These include company newsletters, e-mail, posters, pay stub messages, brochures, buddy systems, and informal networking.

Worksite settings where program-eligible women can be reached include the following:

- **Medium and small businesses that employ women from minority communities**—Medium and small companies typically do not offer the same kind of comprehensive health benefits as those offered by larger companies. Nevertheless, they may be willing to disseminate information or even offer screening to their employees.
- **Schools, nursing homes, and service industries**—These worksites often have a large female workforce, many of whom are above 50 years of age and are either uninsured or underinsured.
- **Meatpacking plants and farms that employ migrant or seasonal workers**—These industries have been receptive to offering education and screening for their employees. A mechanism for adequate follow-up is essential when working with this population.

Program-eligible women also can be reached in the following settings:

- **Department or discount stores**—These stores can attach messages to clothing in the women's department or give out educational materials and brochures at the checkout counter.
- **Pharmacies or drugstores**—These stores can give out educational materials and brochures as well as information regarding screening sites or phone numbers for more information.
- **Hair salons**—These settings can use the "women working with women" concept to provide information to employees and customers.
- **Divisions of employment and Social Security**—These settings can distribute brochures on breast and cervical health and the importance of early detection and prevention to both women and men coming in for unemployment benefits and counseling.
- **Grocery stores**—These stores can print key messages on their grocery bags.

Field Example

Outreach

The Asian community in a southwestern county sponsored an annual event in collaboration with local churches serving that population. Because the setting allowed for examination rooms and privacy, the program decided to conduct a screening clinic in conjunction with the event. The community group promoting the event added information about the screening services to its activities. As a result, the clinic screened 33 women; 15 women had never been screened for breast cancer, and 11 women had never been screened for cervical cancer.

Faith-Based Interventions. Faith-based organizations fulfill a significant social and service role, particularly in low-income and minority communities; thus, they have the capability to inspire and support behavior change. Church-based interventions have been tested extensively in the African American population and used widely in other populations as well.

The church offers a system of social networks that develop naturally. Church members often are able to reach community members more easily than professionals can, and they often can provide the support that might be necessary to overcome logistical barriers, such as transportation to appointments. Suggestions for working with faith-based organizations include the following:

- After an introductory letter or phone call, face-to-face public education and targeted outreach by an outreach worker and the minister (or his or her designee) is critical.
- Ministers, pastors, or rabbis need to approve activities, but another church member can serve as the primary point of contact. Often, a women's healing circle or group will champion health promotion efforts.
- Vestry or board approval helps to legitimize the program and ensure its survival if the current minister, pastor, or rabbi leaves.
- During the intervention, program staff members need to offer support and act as a point of contact.
- Church members must play a significant role in the intervention, including participating in its design.

The church can be an excellent partner for mobile mammography screening, by recruiting women to come to a screening at a designated time and place and assisting with the follow-up of those who did not keep their appointments.

Reduction of Structural Barriers

Reducing structural barriers can facilitate women's access to breast and cervical cancer screening services. This reduction often involves offering weekly, monthly, or annual screening sessions in community clinics; using mobile vans for mammography screening; offering expanded hours of operation for clinics; providing transportation to services; or offering childcare. Some grantees have arranged to have "special" screening clinics at other health facilities by placing BCCEDP staff and providers at community health clinics on a regular basis (e.g., four times per year). Although this may technically not be viewed as outreach, the public education and targeted outreach coordinator is often helpful in recruiting women to attend these other types of screenings and clinics.

Key Message

The Community Guide states that the reduction of structural barriers can be an effective strategy for bringing women in for breast cancer screening services. There is insufficient evidence to suggest that the reduction of structural barriers is effective in bringing women in for cervical cancer screening.

III. EVALUATING PUBLIC EDUCATION AND TARGETED OUTREACH EFFORTS

Programs must evaluate their public education and targeted outreach efforts to ensure that they are reaching the priority population and getting them in for breast and cervical cancer screening services. Assessment of the public education and targeted outreach component encompasses four major areas:

1. **Determining the priority populations for breast and cervical cancer screening**—Grantees must determine which women are most in need of breast and cervical cancer screening in their catchment area. Data from a variety of sources as well as input from partnering organizations and representatives from the priority populations assist BCCEDP staff members in focusing their public education and targeted outreach efforts.
2. **Developing a comprehensive work plan**—All grantees are expected to develop a comprehensive work plan. The public education and targeted outreach component of the work plan should describe ways to assess the population's needs, implement strategies for recruiting women into breast and cervical cancer screening, and evaluate the effectiveness of the public education and targeted outreach approach.
3. **Developing and using effective methods for recruiting women into screening**—Grantees are encouraged to use a variety of strategies for determining effective methods to recruit women into breast and cervical cancer screening. Evidence-based strategies that are found at Cancer Control PLANET, in the Community Guide, and in the published literature are excellent resources for grantees to learn about strategies that have proven effective in bringing women in for breast and cervical cancer screening.
4. **Evaluating the effectiveness of public education and targeted outreach strategies**—Grantees are responsible for evaluating the effectiveness of public education and targeted outreach strategies to ensure that they are using program resources effectively. This activity entails gathering data to compare the women screened with the women the program was trying to reach.

Measurable Objectives

Public education and targeted outreach evaluation should be guided by specific and measurable objectives that reflect a program's interest and priorities. Some suggested objectives are the following:

Determining the Population

By [date], the public education and targeted outreach coordinator will work with staff members from NCI/CIS to develop a list of priority populations in need of breast and cervical cancer screening and create a map of where these populations are located in the catchment area.

Developing a Public Education and Targeted Outreach Work plan

By [date], the public education and targeted outreach coordinator will develop a comprehensive public education and targeted outreach work plan describing ways to (1) determine the priority populations,

(2) assess their needs, (3) implement strategies for recruiting them into breast and cervical cancer screening, and (4) evaluate the effectiveness of the public education and targeted outreach approach.

Developing Effective Public Education and Targeted Outreach Methods

By [date], the public education and targeted outreach coordinator will explore, at a minimum, Cancer Control PLANET and the Community Guide and develop a list of potential evidence-based, culturally appropriate strategies for reaching women from the priority populations.

Evaluating the Effectiveness of the Public Education and Targeted Outreach Strategies

By [date], the public education and targeted outreach coordinator will develop a mechanism for determining the impact population-wide intervention activities have had on breast and cervical cancer screening.

Evaluation Questions

Once measurable objectives for public education and targeted outreach are established, each of those objectives should be converted into a set of evaluation questions. Having identified these questions allows grantees to determine the best process for collecting the data needed to answer them. The table below shows examples of evaluation questions for public education and targeted outreach and suggested methods for answering those questions.

Evaluation Questions	Use of Evaluation Findings	Processes	Data Collection Strategies
Have we determined our priority populations through a review of data sources and input from partners and community members?	Determine whether the total number of women screened meets the number projected in the objectives	Review data Interview partners Gain input from community representatives through focus groups, interviews, and surveys Compare the total number screened to the number stated in the objectives	Conduct a document review of meeting minutes Review focus group, interview, and survey data Review NCI/CIS demographic maps and Community Health Profiles, census data, the State cancer registry, etc.
Are we reaching the "right women"—that is, the women we prioritized through the use of our data sources?	Determine whether the number of women in the priority populations screened meets the number projected in the objectives	Review MDEs Compare the number of women in priority populations who were screened with the number of women from priority populations who were projected	Review MDEs

Evaluation Questions	Use of Evaluation Findings	Processes	Data Collection Strategies
Which public education and targeted outreach strategies employed by the BCCEDP are most effective for bringing in women from the priority populations?	Determine whether the public education and targeted outreach strategies being used are bringing program-eligible women in for screening	Review data Assess which public education and targeted outreach strategies are most successful for bringing program-eligible women from priority populations in for breast and cervical cancer screening Continue successful public education and targeted outreach strategies Discontinue or refine public education and targeted outreach strategies that are not successful and are not resulting in women accessing breast and cervical cancer screening services	Review intake forms Monitor the reach and impact of media campaigns through the use of bounceback cards to public service directors Conduct intercept interviews at public places to determine if women know about the BCCEDP and have received screening services Hand out and review customer satisfaction comment cards or surveys Conduct focus groups or interviews with women from priority populations to learn why they are accessing cervical cancer screening services or why they are not

Additional questions to consider include the following:

- Which partnerships have been most effective in helping to educate and recruit women into the breast and cervical cancer screening services?
- How much do the various public education and targeted outreach strategies cost?
- How many women have been brought in for screening?
- If women are not coming in for screening, why?
- What are the training and technical assistance needs of outreach workers and other staff members related to public education and targeted outreach?

(See Attachment B: Worksheet for Assessing Programs in Public education and targeted outreach.)

(See the Evaluation chapter for more information on evaluating the Public Education and Targeted Outreach component of the NBCCEDP.)

V. RESOURCES

A number of excellent resources for data are available to help guide this process. They include the following*:

United States Cancer Statistics, as collected through the Centers for Disease Control and Prevention's (CDC) National Program for Cancer Registries (NPCR) and National Cancer Institutes's (NCI) Surveillance, Epidemiology and End Results (SEER) registries (http://apps.nccd.cdc.gov/uscs/index.aspx)

United States Census Bureau data (http://www.census.gov/

NCI/Cancer Information Service (CIS) demographic data and maps, as well as Consumer Health Profiles (http://www.cancer.gov/aboutnci/cis/page1)

CDC's Behavioral Risk Factor Surveillance System (BRFSS) (http://www.cdc.gov/brfss/index.htm)

Health, United States, 2011: Women's Health (http://www.cdc.gov/nchs/hus/women.htm)

Geographic Information Systems (GIS) maps, by ZIP Code (http://www.cdc.gov/gis/index.htm)

Regional data sources that describe communities by income level, employment level, age, gender, and other pertinent variables (http://phpartners.org/health_stats.html)

State cancer profiles (http://statecancerprofiles.cancer.gov/)

Note: Because of the evolving nature of the Internet, Web sites noted here may no longer exist. In such cases, a global Internet search or search from the noted entity's homepage may be needed to locate specific documents and resources.

ATTACHMENTS

ATTACHMENT A

STAGES OF CHANGE MODEL

The stages of change model can be applied to health behavior change across a variety of issues. The model can used to describe a woman's readiness to change her behavior as related to breast and cervical cancer screening. When people make changes in their health behavior, they move through different stages of the model, from not thinking about changing a behavior to using the new behavior all of the time. Not all people go through all stages nor do they go through the stages in the same order.

Understanding this model can help grantees focus their outreach messages during group education and one-to-one interventions.

Stage 1: Precontemplation (Not Thinking About It)

A woman in the precontemplation stage of behavior change is unaware of the behavior, is unaware of risks associated with the behavior, and has not thought about change. For example, a woman who has never had a mammogram or Pap test and is not thinking about having one in the next 12 months is in this stage of change.

Role

The grantee should provide basic information about the health benefits of having the screenings, the risks of cancer, and the ability of screenings to find cancer when it is most easily treated.

Examples of Questions to Ask

What do you know about breast cancer, cervical cancer, mammograms, or Pap tests?

Do you know that a mammogram can find a lump very early—earlier than your doctor can feel it?

Do you know that a Pap test can find problems before they turn into cancer?

If a woman has never heard of a Pap test or mammogram, the grantee should tell her about one or more of the following points. The grantee should be careful not to give a woman too many facts or to push her into something she is not ready to do.

Possible Points to Address

- Breast cancer is the most common cancer among women.
- As women get older, their chances of getting breast cancer increase.
- The earlier the breast cancer is found, the more treatment options a woman has and the better her chance is for a cure.
- All women are at risk of getting breast or cervical cancer, even if there is no family history.
- A mammogram is an x-ray of the breast. It can find breast cancer in its earliest stages, when it may be as small as a pencil point.

Nearly half of all women who die from cervical cancer are older than age 65. Older women who have not had regular Pap tests are at greatest risk of dying from cervical cancer.

Changes in the cervix (abnormal cells) can be treated before cancer develops.

A Pap test is very quick and simple.

A woman should continue to have Pap tests throughout her life, even if she is done having children, no longer having periods, or not having intercourse.

In addition, the grantee can ask the woman if she has heard the story about [name of a well-known person] and how a mammogram found her cancer early.

Stage 2: Contemplation (Thinking About It)

A woman in the contemplation stage of behavior change is thinking about making the change in the near future. She may be aware that she is at risk for breast or cervical cancer, but she is not sure about having the tests. For example, a woman who has never had a mammogram or Pap test but plans to have one in the next 12 months is in this stage of change.

Role

The grantee should emphasize the benefits associated with mammography or Pap tests. The grantee also should encourage a woman to have a mammogram or Pap test in the coming year.

Examples of Questions to Ask

Have you talked with your doctor or nurse about having a mammogram or Pap test?

How do you think you would benefit from having a mammogram or Pap test?

What are your fears about having a mammogram or Pap test?

Possible Points to Address

- The grantee should decide which of the following points are best to address with each woman:
- The earlier the breast cancer is found, the more treatment options a woman has and the better her chance is for a cure.
- A mammogram is an x-ray of the breast. It can find breast cancer in its earliest stages, when it may be as small as a pencil point.
- Women aged 50 to 74 years should have a mammogram every two years.
- A Pap test is very quick and simple.
- Changes in the cervix (abnormal cells) can be treated before cancer develops.

- A woman should continue to have Pap tests until age 65 even if she is done having children, no longer having periods, or not having intercourse.

In addition, the grantee can ask the woman if she has heard the story about [name of a well-known person] and how a mammogram found her cancer early.

Stage 3: Preparation (Getting Ready for Action)

A woman in the preparation stage of behavior change is planning to change or act. She is willing, ready, and motivated to be screened and is starting a specific action plan.

Role

The grantee should provide "how-to" information and identify and discuss ways to reduce specific barriers.

Examples of Questions to Ask

Can you get time off from work to get the screening tests?

Do you know anyone else who has had these screening tests recently? Would it help to talk with that person?

Possible Points to Address

- Being female, having a family history of breast cancer, and increasing in age—especially being older than age 50—are the most important risk factors for breast cancer.
- Getting a mammogram is a little uncomfortable but not painful, appointments take less than 1 hour, and technicians usually are female and very nice.
- _____ can arrange for child, elder, or spousal care.

The grantee also should provide a phone number that a woman can call to find out if she can get free breast and cervical cancer screening tests.

Stage 4: Action

A woman who has made an appointment to have a mammogram or Pap test is in the action stage of behavior change.

Role

The grantee should reinforce a woman's decision and provide her with necessary details to enable her to get screened.

Examples of Questions to Ask

I think it is great that you have decided to get a mammogram. Do you have any questions about it?

Would you like someone to go with you for support?

Possible Points to Address

- It is a great decision to have a Pap test; if found early, changes in the cervix (abnormal cells) can be treated before cancer develops.
- _____ can arrange for child, elder, or spousal care.
- Deciding to have a Pap test or mammogram is a great example of how well a woman takes care of herself.
- The grantee also should provide a phone number that a woman can call to find out if she can get free breast and cervical cancer screening tests.

Stage 5: Maintenance

A woman in the maintenance stage of behavior change is continuing to take positive actions or repeating recommended steps as required. She is convinced of the benefits of early detection and believes that the benefits outweigh the costs. For example, a woman who has had two prior mammograms or Pap tests on the recommended schedule and plans to have get her next scheduled test is in the maintenance stage of change. Relapse is also included in this stage of change. A woman who misses a screening appointment is in relapse. She feels discouraged and may not be willing to risk "failing" again.

Role

The grantee should reinforce the woman's behavior for setting up the next mammogram or Pap test. The grantee should emphasize the benefits the woman can expect to gain because of the behavior change. Practical "how-to" information should be provided.

In addition, the grantee should be caring, help the woman in relapse learn from her mistakes, offer support for screening tests taken in the past, and encourage her to make another appointment.

Examples of Questions to Ask

How can we make getting your mammogram (or Pap test) as easy for you as possible?

What are your biggest concerns?

[For women in relapse] That was terrific that you made the appointment. What made you change your mind about getting the mammogram (or Pap test)?

Possible Points to Address

- If a woman does not have a lump, a mammogram can reassure her that no lump is present. If a lump develops, regular mammograms can find it when it is very small.
- It probably means a lot to the woman's family that she is taking such good care of herself.

- The earlier the breast cancer or cervical cancer is found, the more treatment options a woman has and the better her chance is for a good outcome.

ATTACHMENT B

WORKSHEET FOR ASSESSING PROGRAMS IN PUBLIC EDUCATION AND TARGETED OUTREACH

Please indicate your program's progress by responding "yes," "yes, but needs revision," or "no" to the right of each question. At the end of the worksheet, prioritize the three most important tasks to address, and indicate a target date for completion.

	Yes	Yes, but Needs Revision	No
Have you obtained input from partners, including representatives from priority population groups, in assessing needs and developing comprehensive plans for public education, inreach, and outreach?			
Have you developed and revised, as appropriate, a public education and comprehensive outreach work plan that includes a multilevel approach (e.g., an appropriate mix of broad-based awareness raising, community education, and one-on-one outreach strategies)?			
Have you developed and used methods to evaluate the effectiveness of approaches used in recruiting women into screening and meeting projected screening numbers?			
Have you placed priority for using program resources on implementing strategies/activities that are most effective in recruiting program-eligible women from priority populations for screening?			

Select three questions with a "yes, but needs revision" or "no" response.

	List Priority Tasks	Indicate Targeted Date of Completion
1.		
2.		
3.		

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