



PIPER BREAST CENTER™ *Communiqué* CELEBRATING OUR 10TH ANNIVERSARY

Fall 2005

Volume Five, Number Three

THE MAMMOGRAM – A RADIOLOGIST’S PERSPECTIVE

~ by Deborah L. Day, MD

At the Piper Breast Center a breast radiologist reviews each mammogram. Although it is not an exact science, mammography is still the best breast cancer screening tool currently available. The radiologist uses new technology, such as computer-aided detection, to provide the most precise reading of a mammogram possible.

Technique—Breast positioning, sharpness of tissue lines and lack of motion are key to a radiologist’s evaluation. Breast compression results in decreased motion and spreads the tissue which allows for better X-ray penetration and a clearer mammogram. Subtle cancers may be obscured by normal tissue when there is even slight motion or inadequate breast compression. It is important for the technologist to pull tissue away from the chest wall so as not to exclude a cancer that may be located in this region.

Symmetry—Breast tissue patterns are generally similar when analyzing comparable views side-to-side. Significant asymmetry may indicate an abnormal process.

Tissue composition—Three main tissue types make up the breast: fatty, glandular and fibrous. Young breasts are composed primarily of fibrous and glandular tissue, resulting in white or dense mammograms. As a woman ages and estrogen levels fall, the glandular breast tissue is generally replaced by fatty tissue and the mammogram will get darker.

Masses—Masses look white on a mammogram. They are less visible in dense breasts, e.g., white abnormality on a white background. A mass may cause a lump or may be evident only mammographically. Most masses, like cysts or fibroadenomas, are benign. Cancers may also appear as a mass on the mammogram. Ultrasound is commonly performed to further characterize a mass.

Calcifications—Calcifications appear as white spots, dots or speckles on a mammogram. They are very common and usually benign, e.g., fibrocystic breast change, blood vessel wall calcifications, response to trauma and benign masses. Cancers also may cause calcifications—usually clustered microcalcifications, varying in size, shape and density. Magnification techniques are used to analyze calcifications on the mammogram.

Comparison—Comparison to prior mammograms is extremely helpful. If a mammographic abnormality is stable over many years, it is likely benign. The converse is not true. Although new or changing findings must be evaluated, most are not cancers.

Did You Know ...

~ by Stephanie Remark, RT (R)(M)

October is National Breast Cancer Awareness Month. This month is dedicated to raising awareness about the importance of early breast cancer detection. Mammography is still the best tool for detecting early breast cancers. Piper Breast Center, along with the American Cancer Society, recommends that annual mammography begin at age 40.

The Piper Breast Center reminds you that anyone can make an appointment for a routine mammogram at our facility. We will work with virtually any insurance carrier to provide this service. You do not need a physician order for this routine screening. However, you do need a physician order for any diagnostic services you may be seeking.

Piper Breast Center has also partnered with the American Cancer Society and the Minnesota Department of Health to provide free or low-cost mammography to eligible women. For more information or to determine if you qualify, contact the Piper Breast Center.



**ABBOTT
NORTHWESTERN
HOSPITAL**

Allina Hospitals & Clinics

**Virginia Piper
Cancer Institute**

FAMILY HISTORY PORTRAIT: A MUST FOR ALL

~ by Shari Baldinger, MS, CGC

Each of us concerned about breast health and the health of our families has much to gain from collecting, verifying and maintaining an accurate family history. Health care providers have known for a long time that common conditions and diseases can “run in families.” Tracing these patterns may help us predict problems and prevent illness.

Often the best “genetic test” we have is not done in a laboratory but is done by evaluating a woman’s personal and family history. The history may hold key information about your past and clues to your future health. With this information your health care providers can offer more personalized options for screening and risk reduction.

Family history information may be kept in the form of a “pedigree.” The U.S. Surgeon General (www.hhs.gov/familyhistory) and the National Society of Genetic Counselors

(www.nsgc.org) offer online tools to help you achieve that goal.

Try to locate and update information about yourself, your children, your siblings, parents, aunts and uncles, grandparents and cousins. With respect to breast health, it is helpful to document all relatives diagnosed with cancer of all types, the age of onset and where the cancer started (not necessarily where it may have spread). If possible, find out if any relative had a biopsy or benign tumor. If you are aware of workplace exposures, add this to the pedigree. Keep track of other health problems because these may be “connected” to your specific concern and may help your doctor choose medical interventions that are best for you.

With an up-to-date health history in hand, you will become a more valuable partner as your doctor works to keep you and your family healthy.

EXERCISE AND BREAST HEALTH

~ by Amy M. Johnson, RCEP, and Amelia Quigley Svenningsen, PT

There is no question that exercise is beneficial to our well-being. It improves heart health, lowers the risk for diabetes, decreases blood pressure and cholesterol, and even improves bone health. But does exercise have any impact on breast health?

Several studies have demonstrated the value of exercise in reducing breast cancer risk; one found that postmenopausal women who frequently exercised decreased their risk for breast cancer by 20 percent. *Journal of the American Medical Association* (Vol. 290, No. 10: 1331-1336)

Exercise can aid in reducing the risk of developing breast cancer by helping maintain healthy body fat and lowering estrogen levels. Studies show that women who are obese (those defined with body mass index of >30) have a higher risk of developing

breast cancer. Physical activity helps to eliminate fat deposits in the body, making it harder for toxic waste products, such as dietary carcinogens, to build up and be stored in the body long-term. Additional body fat also produces extra estrogen, which has been shown to play a role in the growth of breast cancer. Exercise also influences the production of hormones and growth factors, such as insulin, estrogen and insulin-like growth factor, which can all have an impact on breast cancer.

The American Cancer Society recommends that adults engage in 30 minutes or more of moderate to vigorous exercise on five or more days per week. To further reduce the risk of breast cancer, 45 minutes is recommended. Always check with your physician before starting an exercise program.

Helpful Resources for Women: “Breast Fitness: An Optimal Exercise and Health Plan for Reducing Your Risk of Breast Cancer” by Anne McTiernan, MD, Julie Gralow, MD, and Lisa Talbott.

References: www.breastcancer.org
www.cancer.org

WHAT IS A CLINICAL TRIAL?

~ by Sally Fraki, RN, manager,
VPCI Research Department and
Megan Ryan, project manager,
VPCI Research Department

Clinical trials are research studies designed to compare the effectiveness of a new treatment with that of standard treatment (the current best treatment available). Many of the successful treatments used today were identified through clinical trials. These trials have helped advance cancer care by establishing a treatment’s effectiveness such as: lumpectomy for breast cancer and new chemotherapy drugs for lung cancer.

Treatment trials compare the standard treatment with a new treatment that doctors and researchers hope will be better. In many trials, participants are randomly assigned to receive either standard treatment or the new treatment. Placebos are not used to replace standard treatment.

Some patients are reluctant to consider clinical trial participation because of the anticipated cost. However, most insurance companies and Medicare cover the routine costs related to clinical research participation.

Before agreeing to participate, patients will discuss the study with their physician. This dialogue is part of the ongoing informed consent process. Individuals are told about the important aspects of the research that may influence the decision to participate including risks and benefits.

Participating in clinical research provides individuals first access to the newest treatment options and contributes to medical knowledge that will benefit future patients. The continued success of clinical trials is dependent upon patient volunteers. If you or a loved one is diagnosed with cancer, consider talking with your physician regarding clinical trial treatment options.

For more information, contact the National Cancer Institute at www.cancer.gov or 1-800-4-CANCER.

Communiqué is produced for friends of Abbott Northwestern’s Piper Breast Center,
800 East 28th Street, Minneapolis, MN 55407-3799, 612-863-3150.

Medical editor ~ Beverly Trombley, MD