

Maximum Flexibility in Breast Biopsy

In an effort to offer maximum flexibility for physicians and added comfort for patients, Siemens Medical Solutions recently introduced its MammoTest® table for biopsies in the prone position. The technology enables 360-degree access to lesions. In addition, biopsies can be performed more accurately using Polar Coordinate Targeting and a high-resolution charged coupled device (CCD) camera. This improves workflow while reducing the examination time. In summer 2006, Siemens acquired the rights to produce and market the prone biopsy table MammoTest from Fischer Imaging. With MammoTest and the syngo® Opdima biopsy unit, Siemens now offers a comprehensive biopsy portfolio that provides the physicians with the choice of two stereotactic systems.

syngo Opdima already represents the gold standard for digital biopsy and spot imaging. It is designed for fast, efficient stereotactic needle and core biopsies and localization procedures. The system is compatible with most of the products of the Siemens MAMMOMAT® range.



MammoTest enables comfort during breast cancer screening.



eSie Touch Elasticity Imaging on the ACUSON Antares ultrasound system has the potential to reduce the number of unnecessary breast biopsies.

The Next Generation in Urinalysis Technology

Siemens Medical Solutions Diagnostics has recently announced the launch of the Clinitek Advantus™ urine chemistry analyzer, which represents the next generation in urine analysis testing technology. The analyzer provides higher productivity and flexible operation, delivering streamlined workflow and improved efficiency. As the latest member of the Clinitek family of urine analyzers, it enables automated reading of Siemens Multistix urinalysis testing strips in medium- to high-throughput settings.

The Clinitek Advantus analyzer is a semiautomatic, high-performance chemistry analyzer that can perform up to 500 tests per hour while requiring no warm-up or calibration. In addition to being network-ready, the analyzer also features an immediate start-up mode which aids in workflow efficiency. An automatic calibration feature improves analytical accuracy. With a throughput time of seven seconds per sample, the system helps to support laboratory productivity. Not only does the analyzer deliver reliable and high-quality test results, but it also aids technicians in the lab environment. Results can easily be entered using the touch screen or computer keyboard, and the analyzer has enhanced quality control capabilities. The large memory capacity stores up to 500 patient results for convenient data retrieval and an additional 200 control results for regulatory documentation. Its flexible reporting options and network-ready capability allows the results to be shared within the medical center's hospital information system (HIS) or regional health information network organization (RHIO). The Clinitek Advantus analyzer is available in the USA, Europe, and Japan.

New Ultrasound Technology May Reduce Unnecessary Breast Biopsies

Siemens Medical Solutions offers a breakthrough in breast ultrasound technology with a revolutionary elastography breast imaging technology package. It is expected to enable physicians to accurately distinguish characteristics of breast lesions by more clearly demonstrating relative tissue stiffness or hardness, infiltration, and cystic regions.

The technology, known as eSie Touch™ Elasticity Imaging, is a byproduct of a standard ultrasound exam and may reduce reliance on invasive breast biopsy procedures, based on initial research conducted by Richard G. Barr, MD, PhD, Professor of Radiology at Northeastern Ohio University's College of Medicine and radiologist at

Southwoods X-ray and Open MRI in Youngstown, OH, USA. Using Siemens real-time, free-hand elasticity imaging technique, Dr. Barr studied 166 breast lesions identified in 99 patients that were already scheduled for biopsy, and found the technology delivered sensitivity to the highest degree. Initial findings indicate that elasticity technology has high specificity for the investigation of breast lesions. The technique is a modification of a routine ultrasound exam, yet with no noticeable difference to the patient. It still offers diagnostic confidence to both the physician and the patient. The imaging technology is offered with the ACUSON Antares™ 5.0 ultrasound

system and is part of a comprehensive software package for breast diagnosis. Elasticity Imaging has emerged as a sensitive and very specific method of detecting breast cancer and has the potential to drastically reduce the number of biopsies. The American Cancer Society reports that nearly 80 percent of biopsies performed are negative.

For more information about Elasticity Imaging and a video including case studies, please visit: www.siemens.com/medical/news-elasticity

Automated Solutions Revolutionize Breast Imaging

In accordance with an agreement between U-Systems, Inc., and Siemens Medical Solutions Ultrasound Division, Siemens will distribute U-Systems' automated breast ultrasound system worldwide. The system is a fast, cost-effective, and patient-friendly solution for scanning the breast and serves as a complement to mammography. The system is designed specifically for patients with dense breast tissue, which can be difficult to examine with mammography. An integrated display allows for comprehensive review and diagnosis using 3D volumetric images. Ultrasound is emerging as an effective imaging solution to supplement mammography for the detection and diagnosis of breast cancer, especially for patients with

dense breast tissue, where mammography is less effective. According to *The New England Journal of Medicine* [Study from Boyd and Colleagues, January 2007: Volume 356], women with dense breast tissue have a three to five times higher risk of breast cancer than women with fatty breast tissue. Up to now, the challenge with ultrasound has always been to produce standardized, repeatable images much like mammography does. The automated breast scanner is changing the way breast examinations are performed by increasing specificity and enhancing efficiency. Klaus Hambüchen, President of Siemens Medical Solutions Ultrasound Division, adds, "Automated image acquisition makes ultrasound



Ultrasound has emerged as a cost-effective and patient-friendly solution to complement mammography.

studies less user-dependent, which increases reproducibility. The automated breast scanner is only the beginning. Siemens Medical Solutions is already working on automated ultrasound acquisition techniques for other applications as well."