

Automated breast volume sonography improves screening and diagnosis of breast cancer for Asian women

April 29 2012

A new study from researchers at the Bangkok Breast Center shows significant improvement in the detection of breast cancer in Asian women using automated breast volume sonography (ABVS) as compared to hand-held ultrasound (HHUS).

In their study on 504 findings in 212 patients at the Bangkok [Breast Center](#), researchers found that ABVS agreed with HHUS in detecting 15 suspicious lesions, uncovered 12 additional suspicious lesions, and excluded 3 suspicious lesions in these cases. A coordinating five-year [retrospective study](#) on 26,741 [mammograms](#) with ultrasound also revealed that ultrasound helped identify 141 new breast cancers in mammographically negative cases.

Dr. Wilaiporn Bhothisuwan, lead author for this study, said "Although there have been improvements from dedicated mammography to digital mammography, we still have limitations because 75% of our Thai breasts are mammography difficult breasts. ABVS has helped us overcome some of the known technical limitations of US, which include a limited field of view (FOV) and scans that require high skill, experience, and time. With ABVS, the FOV is large enough to cover most of Asian breasts."

With the advances of ABVS, Dr. Bhothisuwan and her co-author Ms. Pramaporn Kimhamanon saw immediate improvements in the quality of

their images. She added, "The images from this scan come in multi-slices and multi-planes and can be displayed, manipulated, archived, and restored in the same way as CT volume scan. This helps solve the problem of operator dependency and gives more reproducible and standardized imaging."

The study will be presented at the 2012 ARRS Annual Meeting in Vancouver, Canada.

Provided by American Roentgen Ray Society

Citation: Automated breast volume sonography improves screening and diagnosis of breast cancer for Asian women (2012, April 29) retrieved 27 April 2024 from <https://medicalxpress.com/news/2012-04-automated-breast-volume-sonography-screening.html>

<p>This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.</p>
--