Radiation dose in mammography is low, but the breast is a relatively radio-sensitive organ and when millions of healthy women are being screened annually, it is important to ensure that the dose remains as low as reasonably possible while preserving diagnostic image quality. Unfortunately, the radiation dose estimations provided today by mammography unit manufacturers use calculations based on assumptions of a homogeneous mixture of fat and fibroglandular tissue in standard, non-personalized proportions. Not only does this result in dose being routinely substantially under- or over-estimated, the dose estimations between machines are not comparable.

VolparaDose utilizes a globally accepted algorithm and uses the patient’s specific breast density to generate patient-specific radiation dose estimations in a standard manner.

**The Volpara Difference**

VolparaDose is vendor-neutral and uses patient-specific quantitative data to generate a more accurate assessment of the mean glandular dose (MGD) per image. Research recently presented at ECR and AAPM shows that it is possible to improve the accuracy and personalization of radiation dose estimation, which may, in turn, allow for better optimization of radiation dose in breast screening, both in mammography and tomosynthesis.

In particular, we provide a MGD which is:

- Based on one, globally accepted and validated algorithm for all vendors
- Specific to the woman’s volumetric breast density

VolparaDoseRT is an add-on module to VolparaDensity, which uses patient-specific quantitative data for a more accurate assessment of the MGD per image. This secondary capture image shows the average dose was 2.3 mGy per image for the study.
IMPLEMENTATION

Personalized dose reporting is available:

• at the technologist/radiologist workstation when using VolparaDoseRT, an add-on to VolparaDensity for your point-of-imaging reports (see example on other side)

• using a web browser with VolparaAnalytics for a summary of dose per mammography unit, allowing you to compare and spot machines giving too high doses

• through your VolparaDoseRT compatible mammography reporting system to integrate the patient-specific dose results directly into the patient letters

• with VolparaDoseSR whereby VolparaDose measurements are integrated into DICOM-compatible dose tracking systems so that you can overview your radiation devices through one portal.

>CONTACT US FOR A DEMONSTRATION

info@volparasolutions.com
US +1 855 607 0478
EUROPE +44 203 051 1029
ASIA +66 817 169 866
REST OF WORLD +64 4 499 6029

VOLPARASOLUTIONS.COM