

Renown Institute for Cancer

Cancer Screening in Dense Breasts

Breast density refers to how breast tissue appears on a mammogram. Some women think that because their breasts are firm, they are dense. But breast density isn't based on how your breasts feel.

In dense breasts, radiation can pass through fatty tissue, making the image appear dark or more exposed. Dense, glandular tissue scatters the radiation beam, which results in less-exposed images that appear lighter and more opaque on the mammogram. Cancerous breast tissue also scatters the radiation beam and appears more opaque. This becomes difficult when cancerous tumors hide in dense breast tissue and create what are called "false negatives" – meaning you are given a clean bill of health when in reality, cancer is present.

Thankfully, Renown Health offers the technology to better detect cancer if you have dense breasts. Breast density is related to breast size and overall body weight. In general, the smaller the breast, the more dense the breast. Breast density also tends to decrease with maturity as the gland is less influenced by hormones, particularly after menopause. Around 80 percent of women younger than 40 have dense breasts. This is one reason mammograms aren't recommended for most women until the age 40.

To help you understand breast density, there are four categories that are referred to as BI-RADS (Breast Imaging Reporting and Data System) assessments.

The BI-RAD categories are:

Category A: Almost Entirely Fatty	Category B: Scattered Glandular Density	Category C: Heterogeneously Dense	Category D: Extremely Dense
•10% of population	•40% of population	•40% of population	•10% of population

Breast density is an independent risk factor for breast cancer development. The relative lifetime risk for category C, heterogeneously dense patients is 1.2 times greater than the average. For extremely dense, category D patients, the relative lifetime risk is 2.1 times greater than the average.

Patients with dense breasts should talk to their doctor about additional screening options beyond mammograms. Your doctor may recommend a 3D mammography (also called digital tomosynthesis), or a breast ultrasound. Renown Breast Health Center offers a 3D Total Breast Ultrasound, an advanced technology that does not expose the patient to radiation.

For more information, call the Renown Breast Health Center at **775-982-8100**.