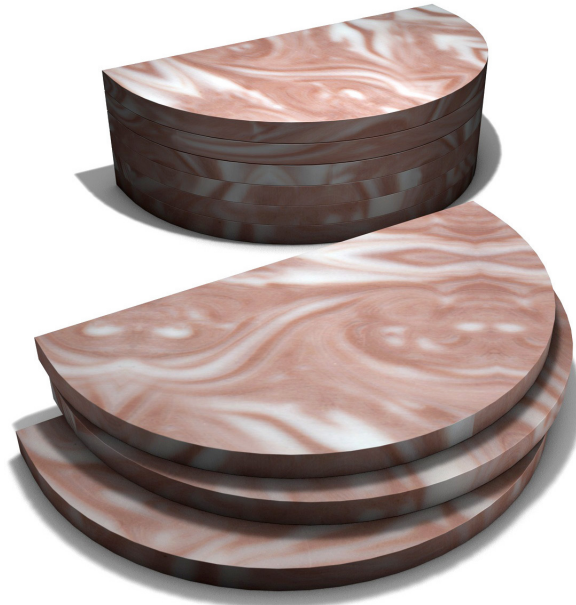


# Mammography BR3D Phantom

Model 020



## FOR TOMOSYNTHESIS AND BREAST CT

The CIRS Model 020 BR3D Mammography Phantom was designed to assess detectability of various size lesions within a tissue equivalent, complex, heterogeneous background. This phantom provides more realistic challenges for standard screen and FFDM mammography systems as well as Tomosynthesis and breast Computed Tomography.

The phantom consists of a set of 6 slabs made of heterogeneous breast equivalent material that exhibits characteristics of real breast tissue and demonstrates how underlying targets can be obscured by varying glandularity. Each slab contains two tissue equivalent materials mimicking 100% adipose and gland tissues “swirled” together in an approximate 50/50 ratio by weight. One of the slabs contains an assortment of micro-calcifications, fibrils and masses.

Each semicircular shaped slab measures 100 x 180 x 10 mm. Each slab, with its unique swirl pattern, provides varying backgrounds when arranged in multiple combinations and thicknesses.

### Features

- Tests Tomosynthesis and Breast Computed Tomography
- More representative than standard homogenous phantoms
- Complex background provides greater challenge for target detection
- Slab configurations provides range of thicknesses with or without targets

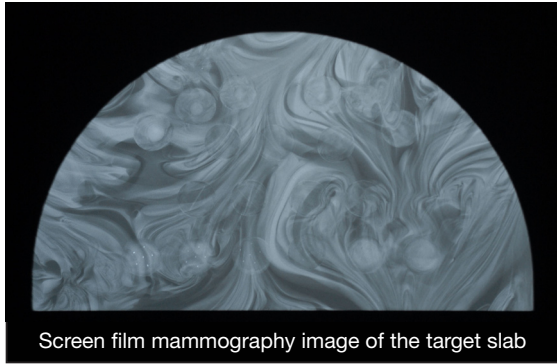


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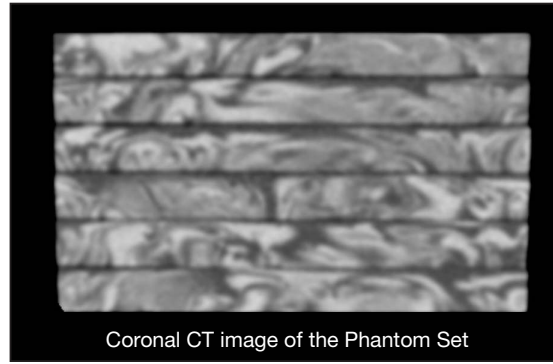
[WWW.CIRSIINC.COM](http://WWW.CIRSIINC.COM)

**CIRS**

Tissue Simulation & Phantom Technology



Screen film mammography image of the target slab



Coronal CT image of the Phantom Set

**SPECIFICATIONS**

<b>OVERALL DIMENSIONS:</b>	10 cm x 18.0 cm x 6.0 cm (3.9" x 7.1" x 2.4")
<b>PHANTOM WEIGHT:</b>	0.88 kg (1.94 lb)
<b>MATERIALS:</b>	Epoxy resin: equivalent to 50% glandular / 50% adipose tissue

**MODEL 020 INCLUDES**

QTY	COMPONENT DESCRIPTION
1	Mammography BR3D Phantom (5 Background & 1 Target slab)
1	User Guide
-	48 Month Warranty

**TARGET SLAB**

**SPECKS**

1. 0.400 mm CaCO<sub>3</sub> speck
2. 0.290 mm CaCO<sub>3</sub> speck
3. 0.230 mm CaCO<sub>3</sub> speck
4. 0.196 mm CaCO<sub>3</sub> speck
5. 0.165 mm CaCO<sub>3</sub> speck
6. 0.130 mm CaCO<sub>3</sub> speck

**SPHEROIDAL MASSES**

7. 14.6.3 mm (diameter)
8. 15.4.7 mm (diameter)
9. 16.3.9 mm (diameter)
10. 17.3.1 mm (diameter)
11. 18.2.3 mm (diameter)
12. 19.1.8 mm (diameter)

**FIBERS**

7. 0.60 mm (diameter)
8. 0.41 mm (diameter)
9. 0.38 mm (diameter)
10. 0.28 mm (diameter)
11. 0.23 mm (diameter)
12. 0.18 mm (diameter)
13. 0.15 mm (diameter)

**BACKGROUND SLABS**

Epoxy resin: equivalent to 50% glandular / 50% adipose tissue  
Size: 100 x 180 x 10 mm thick, semicircular shape

**TARGET SLAB**

Epoxy resin: equivalent to 50% glandular / 50% adipose tissue  
Size: 100 x 180 x 10 mm thick, semicircular shape

**LESIONS (CACO3 SPECKS)**

Grain size: 0.130, 0.165, 0.196, 0.230, 0.290 & 0.400 mm

**SPHEROIDAL MASSES**

Epoxy resin: breast carcinoma  
Diameters: 1.80, 2.38, 3.18, 3.96, 4.76 & 6.32 mm

**FIBERS**

Length: 10 mm length  
Diameters: 0.15, 0.18, 0.23, 0.28, 0.38, 0.41 & 0.60 mm

