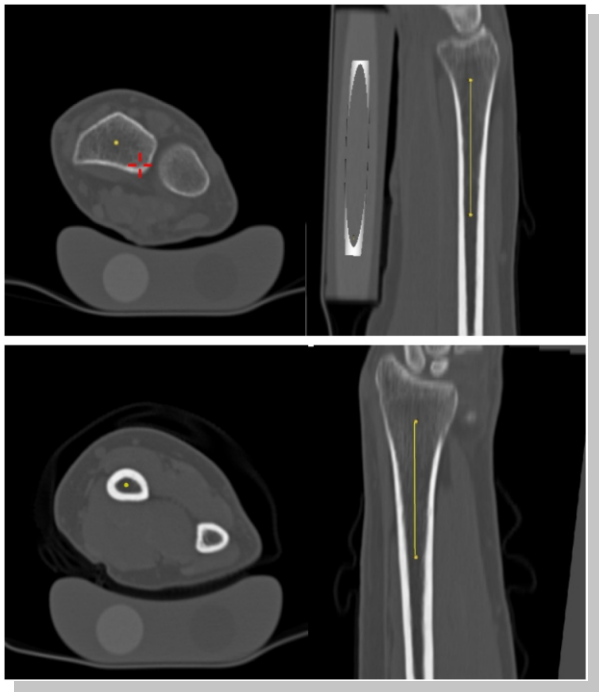
Forearm Phantom

A Phantom for Quantitative Computed Tomography (QCT) measurements of the forearm to calibrate CT values to Bone Mineral Density (BMD).

The QRM-Forearm-Phantom

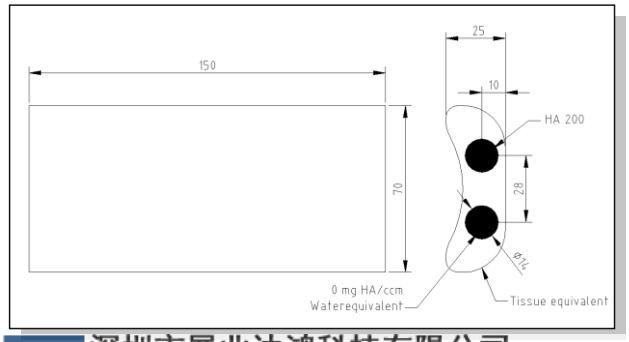
The QRM-Forearm-Phantom was developed for calibrating CT values to BMD. Its shape is optimized to the anatomy of an adult forearm. It is placed between the forearm and the CT coach pet directly.
The phantom consists of two solid cylindrical rods, of water-equivalent and bone-equivalent material, respectively.



CT-scans of a Forearm - and below the calibration phantom [1]

Specifications

Base material .....tissue-equivalent resin
Phantom cross section..... 70 x 25 mm^2
Phantom length .....150 mm
Phantom weight ..... 225 g
Bone eqv insert specified ..... 200 mg HA/cm^3
Water equivalent insert ..... 0 HU (80 - 140 kV)



References

[1] K. Engelke, W. Timm, B. Stampa, E. Paris, T. Fuerst,
C. Libanati, H.K. Genant.
Quantitative Computed Tomography (QCT) of the forearm using clinical CT scanners. Presented at "29nd Annual Meeting of the American Society for
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