

GAMMADENSIT DEXA



DEXA system for bone mineral density measurement of the forearm composed by:

Movement mechanics controlled by personal computer that is connected on-line to the measurement device. The system is able to scan a surface equal to $9 \times 15 \text{ cm}^2$ of area

Selection of trace point of the start scan by means of a graduated scale applied on the work top of the instrument

Scan field defined by the personal computer keyboard with a precision of half centimeter

Ultra stable X-Ray Tube with dual photon emission and "Cerium" filter able to produce a thin x-ray beam (pencil-beam) with double energy of 30keV and 70keV end with a current of 0.5mA

NaI (TI) detector

Electronics of measure with two channel to the analysis of two x-ray energy peak

Personal computer Interface and connection by RS232

Database organized by date, patient and type of survey

Show of the map with the possibility to select horizontal and oblique interest areas

Software to acquire and elaborate bone density data. WMOC is projected for Microsoft Windows® 9x is 2000 year bug free

Quality control on-line with automatic registration of the internal standard measurement for each survey made. Possibility to store the results obtained by the equipment standard and control of them by the C.V. %

Auto-calibration with verification of the internal reference standard before any survey and auto-centering of the x-ray energetic peak

Database: possibility to compare data inserted into database with reference population, possibility to increase of normality curves by means of insertion of own production, auto-representation of the data expressed in term average value, T-Score and Z-Score, per cent variation respect to the reference population, graph to compare the results with the reference population

Calibration Phantom

Technical Specification

Storage and elaboration of survey per day: more than 30

Patient exposure: less than $5 \mu\text{S}$ by using standard scan time:

2+5 min. Forearm precision better than 1%

Operator exposure: none for a distance more than 1 meter from the patient

Dimension (W,H,D) cm. 80 x 130 x 55, weight about 80 Kg

Electric characteristic: single phase, supply voltage: 220V, frequency 50 Hz, power absorption: 400W

NOTE: The instrument needs a PC compatible with Windows® 9x installed