X-RAY PRODUCTS

PaxScan® 2520E+
Amorphous Silicon Digital X-Ray Imager

Product Description

The PaxScan 2520E+ is a ruggedized X-ray imaging sub-system designed for high-speed radiographic imaging in the field. Based upon the new Gigabit Ethernet interface standard, images are displayed instantaneously on a user-supplied workstation or laptop fitted with the appropriate Gigabit controller chipset. The lightweight magnesium housing is shock-resistant.

Technical Specifications

- **Receptor Type**: Amorphous Silicon
- **Conversion Screen**: CsI, DRZ Plus, or Gd₂O₂S: Tb (Kodak Lanex Screen)
- **Pixel Area**: Total 19.5 x 24.4 cm (7.68 x 9.6 inch), Active 17.9 x 23.8 cm (7.05 x 9.38 inch)
- **Pixel Matrix**: Total 1,536 x 1,920, Active 1,516 x 1,900
- **Pixel Pitch**: 127 μm²
- **Limiting Resolution**: 3.94 lp/mm
- **MTF, X-Ray**: ≥48% 1 lp/mm, Gd₂O₂S: Tb screen (80 kVp)
- **Energy Range**: 40 - 150 kVp
- **Fill Factor**: 57%
- **Image Capture**: Intel PRO/1000GT Desktop Adaptor (PCI) (Customer supplied)
- **Scan Method**: Progressive
- **Data Output**: Gigabit Ethernet
- **A/D Conversion**: 14-bits
- **Frame Rate**: 1-10 fps (1 x 1) (Workstation dependent)
- **Laptop/PC Interface**: Ethernet Port
- **Exposure Control**: USB port on host computer

Software

The software release includes ViVATM, a basic application for image acquisition and viewing on an end-user workstation or laptop running Microsoft® Windows™. The developer’s software package includes a “Virtual Command Processor” software interface that performs detector calibration, receptor set-up, image acquisition, and image corrections. ViVATM includes file translators for .viv, .raw, .jpg, and .bmp formats. Windows® XP compatible.

Environmental

- **Shock**: High-shock tolerance
- **Temperature Range - Operating**: 1°C to 35°C (max.)
  - (Ambient) - Storage: -20°C to +70°C
- **Humidity**: Operating (non-condensing) 10 to 90%
  - Storage (non-condensing) 10 to 90%
- **Atmospheric Pressure**: 70 kPa to 106 kPa

Regulatory

Classified by Underwriters Laboratories, Inc. to UL 60601-1, IEC 60601-1, CSA 22.2 No. 601.1-M90, and CE.

Mechanical

- **Weight (with cables)**: 7.3 lbs. (3.3 kg)
- **I/O Interface Box (optional)**: 5.15 lbs. (2.34 kg)
- **Housing Material**: Magnesium
- **Sensor Protection Material**: Carbon fiber plate (2.5 mm thick) and magnesium

Power

- **Power Dissipation**: 15 watts (cont.), 16 watts (max.)
- **Power Supply/Adaptor**: +12 VDC

Specifications subject to change without notice.
Drawings are for reference only
Dimensions are in inches [mm]