

GE LightSpeed VCT 64 Site Guide

Summary

Room Layout & Dimensions

- Minimum Room Size: 20 ft (L) x 11.5 ft (W) x 7 ft (H)
- Gantry Aperture: 70 cm
- Table Weight Capacity: 500 lbs
- Operator Console Room: Adjacent, shielded, approx. 8 ft x 10 ft recommended

Power Requirements

- Main Power: 400–480 VAC, 3-phase, 50/60 Hz
- Power Consumption: Approx. 100 kVA (with full system running)
- Dedicated Power Panel: Required, with appropriate grounding
- Isolation Transformer: Often recommended
- Uninterruptible Power Supply (UPS): Strongly suggested for the console and image storage components
- Surge Protection: Required to prevent damage to electronics

Environmental Requirements

- Room Temperature: 68–75°F (20–24°C)
- Humidity: 30%–70% non-condensing
- Ventilation: Minimum 6 air changes per hour recommended
- Heat Output:
 - Gantry: Up to 22,000 BTU/hr
 - Console Room: Up to 5,000 BTU/hr
- Air Conditioning: Must support total heat load (approx. 27,000 BTU/hr total)
- Dust Control: Clean, filtered environment to protect sensitive electronics

Safety & Shielding

- Radiation Shielding: Required per state/local regulations (typically 1/16" lead equivalent)
- Door Interlock System: Often required
- Warning Lights: Installed outside scan room
- Emergency Power-Off (EPO): Installed near gantry and control room