



The **Ziehm Quantum** is at the forefront of innovative, mobile, surgical C-Arm design. Eliminating the need for a monitor cart in the surgical room, the Ziehm Quantum is truly the world's first full-featured, self-contained mobile surgical C-Arm. Its small footprint and lightweight design coupled with the advanced features of a state of the art 16-bit image system makes the Ziehm Quantum the most compact and versatile mobile C-Arm available today.

## Benefit from Superior Imaging Technology

Image quality is clearly the most important feature of any mobile C-Arm. The Ziehm Quantum™ features a 1K2 x 12-bit Highline video/image display, digital image rotation, large storage capacity, and integrated 18.1" high-resolution TFT monitors which are capable of displaying 768 shades of gray. The Ziehm Quantum™ provides superior resolution and detailed visualization in all applications.

## Choose Your Anatomical Program

The Anatomical Programs found in every Ziehm Quantum™ C-Arm optimize image quality for each body region using the lowest possible dose. Choose between the 'Bone/Extremities', 'Pelvic/Spine', and 'Heart/Thorax' Anatomical Programs to ensure superb image quality in each type of procedure. In addition, unique 'Metal' and 'LPD' (Large Patient Diameter Key) image programs further enhance image quality in otherwise difficult imaging conditions.

## Considerate Use of Radiation

Wherever you look on the Ziehm Quantum™, you will find features that can significantly reduce the radiation dose delivered to the patient, the physician, and personnel within the operating room.

Ziehm Imaging™ has been the industry's low dose leader ever since Ziehm pioneered the integration of high-frequency generators into mobile fluoroscopic C-Arms.

## Ziehm Quantum™ –Integration with Image Guided Surgery (CAS)

In CAS, the x-ray image becomes a roadmap of the patient's anatomy that is correlated to the real-time position of the surgical instrument. The surgeon follows the instrument's movements without requiring continuous x-ray imaging of the patient. This technology has its biggest impact on the brain and spinal surgery as well as orthopedics. Proven compatibility with CAS systems is essential for success. CAS and mobile C-Arm systems can be chosen independently in order to best benefit individual requirements. The Ziehm Quantum has been integrated with leading fluoroscopic CAS systems, such as Medtronic, Brainlab and Z-Kat.



# Specifications

## Dimensions

- Orbital rotation: 135° a
- Angulation: ± 225°
- Swiveling (panning): ±10°
- Horizontal movement: 220 mm
- Vertical movement: 430 mm

## C-Arm

- Source-image receptor distance: 970 mm
- Source-image receptor Opt 31: 1007mm
- Vertical free space: 750 mm
- Vertical free space: 787.4mm
- Immersion depth: 680 mm

## Image Intensifier

- Nominal sizes: 23 / 17 / opt (10) cm

## X-ray Tube

- Dual-focus stationary-anode tube

## Max. Operating Data

- On-screen collimator position indication

- PreView iris collimator
- Fluoroscopy Generator: 110 kV / 6 mA - 80 kV / 6 mA
- Direct Radiography: 110 kV / 8 mA - 80 kV/8 mA
- Radiography: 110 kV / 18 mA, 110 kV / 20 mA - 80 kV / 18mA, 80 kV / 20 mA

## Max Power Output

- Focal spot: 0.3 mm
- Fluoroscopy: 660W (110 kv / 6mA)
- Direct Radiography: 880 W (110 kv / 8 mA)
- Direct Radiography: 1980W (110 kv / 18 mA), 2200W (110kv / 20mA)

## Power Specifications

- Focal spot: 0.3 mm
- Power: 120 Vac 60 Hz Option:230 Vac 60 Hz
- Direct Radiography: 40 - 110 kV
- Tube Current: 2 mA min/ 20mA max
- mAs Range: .4 mAs min./100mAs max
- Fluoroscopy: 40-110kV - 0.1-6mA
- Pulsed mode: Pluse Max 3F/s
- Digital Radiography: 40-110 kV

- Operating Frequency: 20 kHz

## Environmental

- During Storage Conditions
- Temperature: -10°C to +60°C
- Relative air humidity: 10% - 95% non Condensing max.
- During Operation Environmental
- Temperature: +10°C to +35°C
- Relative air humidity: 35%-75% in Condensing max.

## Focal Point Nominal size

- kVp range: 40 – 120 kVp.
- Nagel:
- Small - 0.6 acc. to IEC
- Large 1.5 acc to IEC
- Toshiba
- Small - 0.5 acc. to IEC
- Large - 1.5 acc to IEC

## Normal Electric Power

- 2000W at 100kV / 20 mA / 0.1s

