X- 9200K

Open Tube

0.6 um X-Ray Inspection System

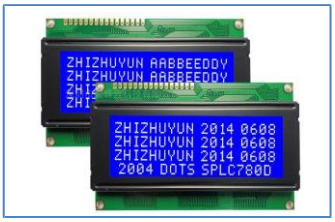
X- Ray
Transmission - Type
Nondestructive Inspection system

Minimum spatial resolution size:
0.6um

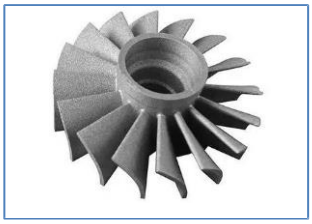
X- 0K electronic semiconductor inspection equipment, the minimum inspection accuracy of 0.6um, can be used to detect integrated circuit chip semiconductor, such as BGA, IGBT, inverted chip and PCBA component welding, LED bonding, IC packaging with high precision testing.

Application:

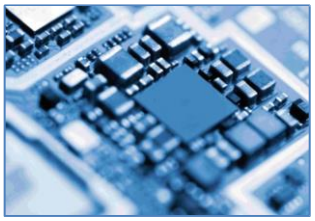
1. LCM Display Module
2. Semiconductor
3. Battery
4. Automobile industry
5. IGBT Bonding
6. PCB Press Lamination



LCM Display Module

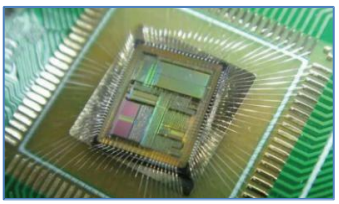


Aeronautical Parts



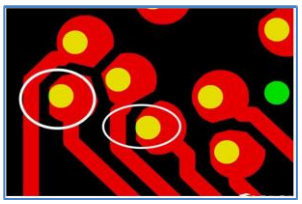
Semiconductor

Automobile Parts



IC Bonding Wire

PCB Assemble



PCB Press Lamination

DACROMET Technique

Specifications

	Model	X9200-k
Tube	Tube type	Open tube
	Spatial resolution	0.6um-1um
	Tube voltage	160kv
	Tube current	1000μA
FPD	Image taking type	Flat-panel Digital
	Imaging precision	85um
	Flat panel photosensitive size (Field of View)	130*130mm
	A/D convert quantified density value	16bit (65536)
	Dpi	1536*1536px
	Frame frequency	20（FPS)
System	System magnification	2100x（without the 360° rotary stage）
	Operating system	10000x（without the 360° rotary stage）
	Detector resolution	1 Mega Pixel
	Power supply	WINDOWS 10
	Power	AC380V Three-phase 50-60HZ 1800W
	Radiation safety test	1800W
	Real-time Image Capture	Digital image processing with16-bit
	Tube type	<1 uSV/H
Structure	Detector rotation angle	±70°
	PCB(Stage) size	500*500mm
	Sensing range	500*500mm
	Stage rotation angle	360°
	Load-bearing	≤20kg
	Machine size	1510*1770*1850mm(L*W*H)
	Machine size (Including monitor)	1810*2420*2400mm(L*W*H)
	Machine weight	2200kg
	Stage movement	Automatic / manual
Safety	CE Certificate	Yes: STE23113101S
	State immunity	Yes
	Radiation Safety Permit	Yes: Guangdong Environmental Radiation Safety Permit [B0640]

Functional Advantage

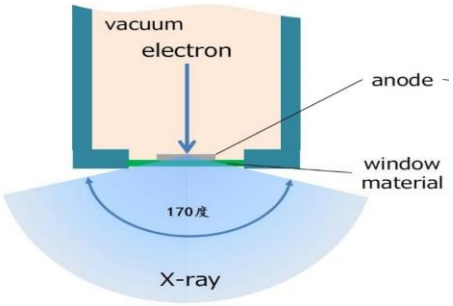
Function	Advantage
CNC program: Automatically detect batch of different samples' locations	Automatically ON / OFF X-RAY tubes detect batch of samples
Array function: Automatically detect batch of samples with fixed position and same spacing.	With high stability and high precision X-ray tube
Bubble measurement: measure the bubble size, cavity rate, tin climbing height with one button	High definition digital X-RAY detector
Length and width measurement: the length and width of the measured inspection area	The carrier table can place a large number of samples of various sizes
Display: Bold Type with clear visualization	Oil-free vacuum pump, external barcode scanner, Automatic void calculation
Visual navigation interface: accurate positioning, accurate displacement from x - y with joystick	The carrier table can do 360° rotation to detect sample
Simulated color: to better observe and detect the image	Can do ±70° tilt observations, Auto ISO- Centric Motion (AIM)
5 Axis manipulator system : X,Y, Z(Tube), Z(Detector), Tilt (Detector)	Electronics High Definition Radioscopy, One Click working

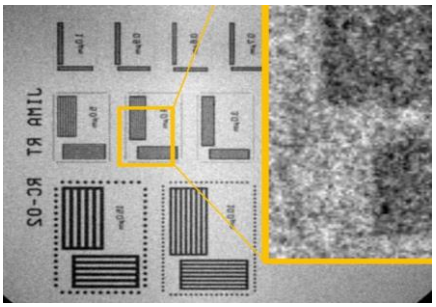
Open tube - COMET FXE 160：

Specifications:

HV range: 20 to 160 kV
Max. tube current: 1000 µA
Max. tube power 64 W
Max. target power 10 W
Beam angle 170°
Min. focus object distance < 300 µm
Max. resolution* < 0.6 µm
Microfocus tube: W* H*L 183*319*505 mm

X-RAY Principle Description

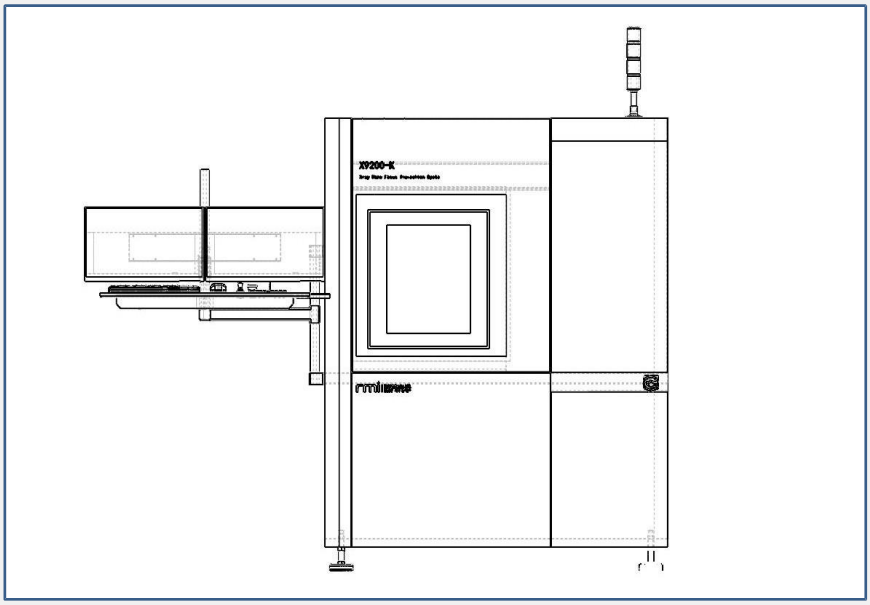


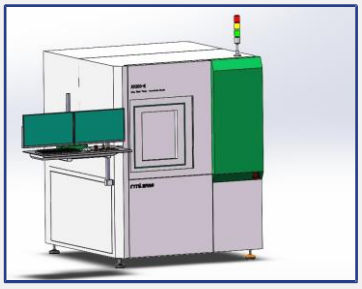


CT Capabilities:

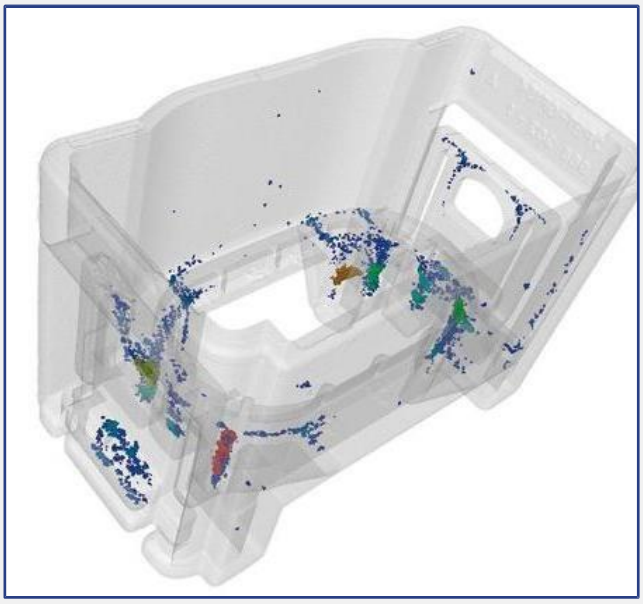
CT covers the entire workflow, from accurate reconstruction of 3D volume datasets to 3D and 2D visualization.

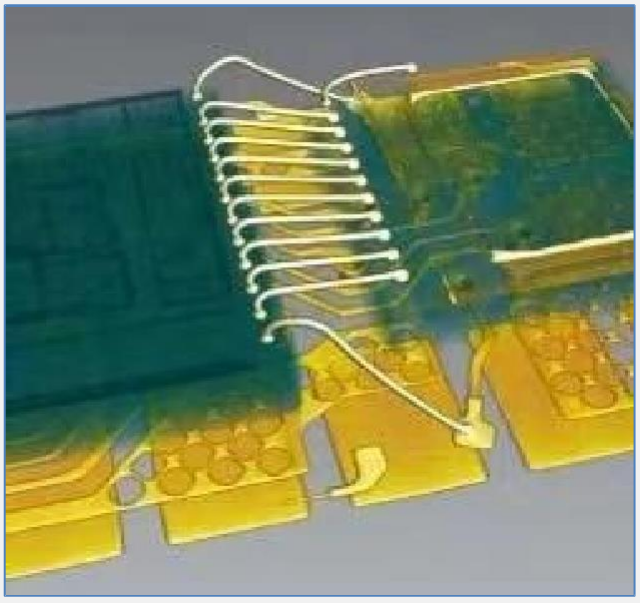
- 3D visualization is possible even for very large CT datasets. There is almost no limit on the volume of data.
- Real-time ray tracing for photo-realistic results.
- Combined visualization of voxel and polygonal data, including textured meshes.
- 2D slices can be oriented in any direction.
- Rotate a 2D slice around a custom axis.
- Grayscale classification of data sets.
- Multiple 3D cropping options.
- Unwrap objects in 2D or flatten freeform surfaces.
- Combine consecutive slices into a single 2D view.



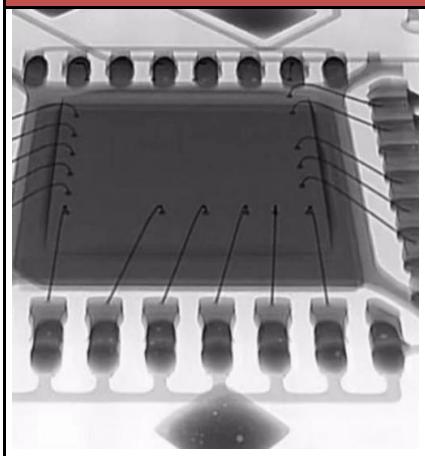
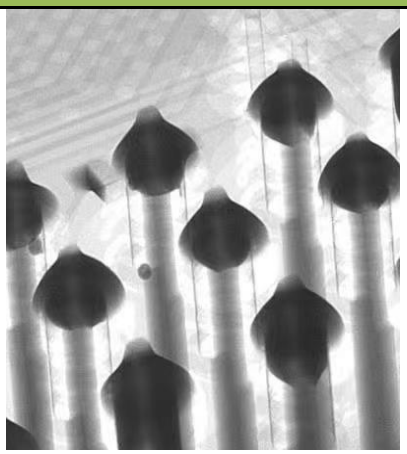
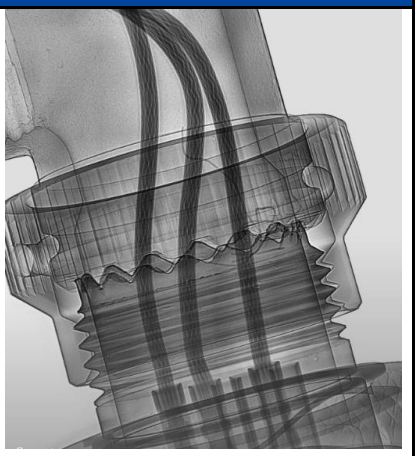
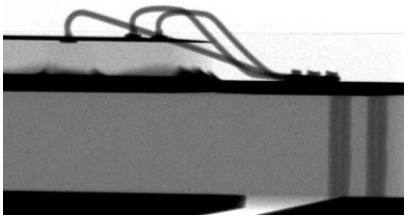
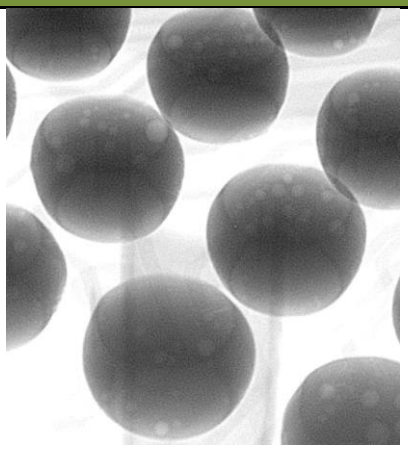
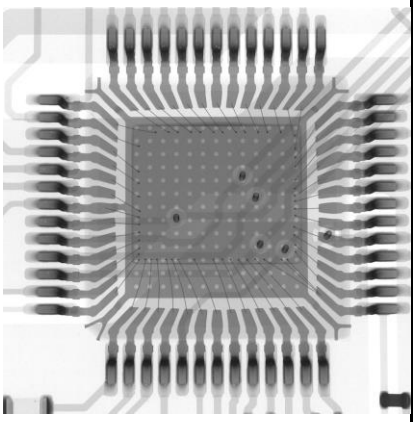


3D Image





Detection Cases:

IC WIRE	Via Hole	Aerospace Component
		
LED Bonding	**BGA**	**IC Welding**
		
Gold Wire Welding	**IGBT**	**Bonding Line**