



# Digital Precision CNC 2D Measuring System

## MODEL EX-1215CNC

PROTEC CNC 2D coordinate measuring machine series are highly reliable devices which hold precision and operability in high regard as their primary purposes. It can be used to measure dimensions, inspect hole pitch, and measure coordinates for wide range of relatively small sized plate products such as printed circuit boards, liquid crystal glass substrates, precision photomasks, screen masks, various films, block copies, several types of printed matter. Measured data can be printed, and also converted to Excel and CAD/CAM.



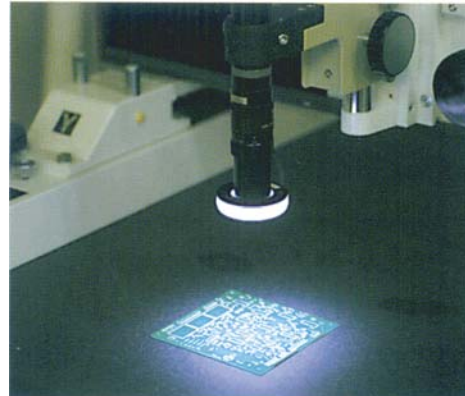
### Major characteristics

One-click automatic measurement	Due to CNC type, measurements are made by clicking one-click tool and pointing measurement points by mouse. Edges are automatically detected for measurement.
Easy to operate	Featuring edge sensor, thus eliminating errors by inspectors. Excellent system environment allowing free editing and operation.
Speedy and efficient	Measured data can be transferred to Excel files to save time in transcription. Factors can be graphically displayed for edit and comparison on CAD/CAM. Data can be saved in CAD DXF files.

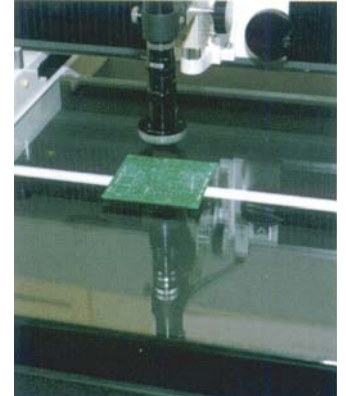
Zoom microscope (0.75~4.5x)



LED light

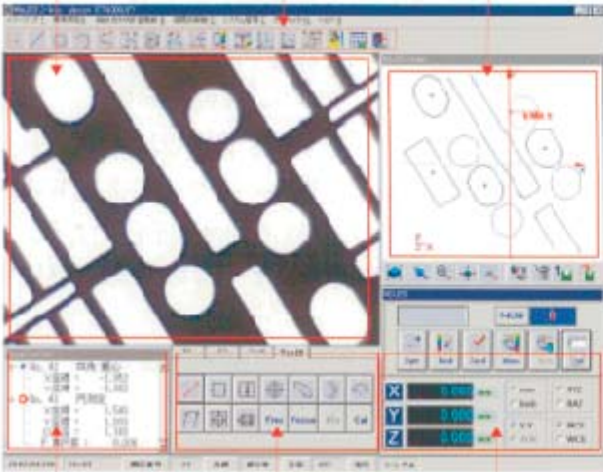


Transmitted illumination (Optional)



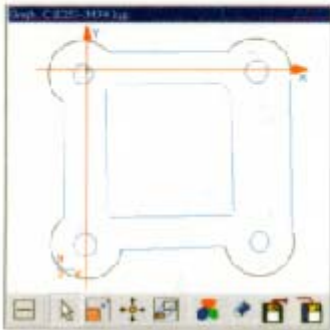
● Measuring Software Display (17 inch TFT)

CCD camera image    Tool for measurement    Graph



Data    One-click tool    Each counter

● Graphic display



- Draw figures at the same time of measurement
- Recalculation can be done by simply clicking measured parts on the graph instead of numbers of result recalculations.
- Graphs can be saved in DXF or BMP files, also can be transferred to CAD/CAM for editing.

● Wide range of variation from small to large scale

X=400 × Y=500mm

X=500 × Y=700mm

X=600 × Y=1000mm

X=1300 × Y=1500mm

X=1500 × Y=1800mm

Custom-made size is available.  
Please contact us detail.

● Equipped with edge sensor

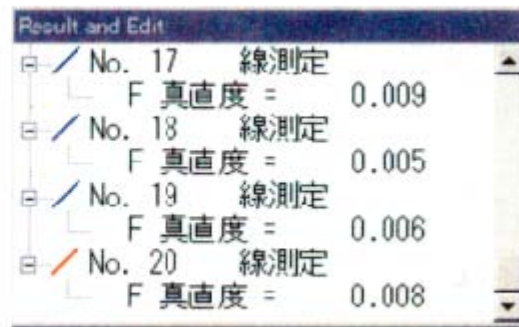
By mouse-clicking on measuring points, automatic measurement can be made, thus eliminating errors depending on inspectors.



Measuring circle    Measuring line    Measuring circular arc

- Basic measurements such as points, lines, circles and circular arcs (up to 500 points)
- Indirect measurements such as distance, angle midpoint
- Coordinate measurements such as axial adjustment and origin shift
- Rerunning by invocation

● Measured data



- Output of measured data includes geometric calculated value such as roundness other than X and Y axial lines.
- Shortest distance and longest distance can be calculated.
- Each measured data has measurement numbers attached. Recalculations are easy by inputting the measurement numbers in result recalculation mode.

■ Main specification

Model	EX-1215CNC	
Measuring range	1200 × 1500 × 100mm(XYZ axis)	
Minimum indication value	0.001mm	
Measurement accuracy	XY=5+5L/1000 μm, 20°C±1°C	
Method of operation	Automatic	
Sliding area	LM guide	
Sensor	Optical linear encoder	
Environmental condition	Temperature	15 ~ 40°C
	Humidity	30 ~ 80%
Image detection	High resolution CCD color camera	
Lighting system	Division into 4 LED epifluorescence lighting system	
Zoom lens-barrel	x0.75 ~ x4.5 (Approx. 23.6 ~ 152x in using 17inch monitor)*1	
PC	Windows XP on board personal computer included	
Monitor	17inch liquid crystal monitor	
Printer	A4 Color printer	
Power source	AC100V, 15A	
Mass	Approx. 3500kg*2	
Dimensions	1700(W) × 2000(D) × 1450mm(H)*3	

\*1: Magnifications quoted here are values by calculation, and not correspondent with actual magnification rates.  
\*2: Main unit weight only    \*3: PC and monitor are not included.

\* Specifications and design details may be subject to change.

Manufacturer :



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