PRÜFTECHNIK Schneider & Koch

LaserVision Compact

SYSTEM VERSIONS

LaserVision Compact 3
Tabletop-System equipped with color sensor module with GigE Vision technology, telecentric lense, drawer with adapter for PCBs as well as a lighting unit consisting of 10 independently programmable modules (Top + 8 sides + coaxial)

SYSTEM COMPONENTS, HARDWARE

Image processing computer
| 19" Rack PC with Microsoft Windows operating system
| LCD-Monitor

XY-positioning unit
| Working area   450 x 350 mm

PCB height
| Top: max. 45 mm
| Bottom: max. 45 mm

Orthogonal sensor module with megapixel technology

Resolution	Sensor/pixel	Field of vision/mm	Component size
17,5 µm	1624 x 1230	28,0 x 21,5	pitch 0.4 0402
10.0 µm	1624 x 1230	14,8 x 11,4	pitch 0.35 01005

Inspection speed
| Depending on board design and configuration:
  Typ.100.000 components/h

General data
| Power supply   230 V/3A
| Certificat   CE (EU-standarts, Machinera directive incl. EMC etc.)
| Dimensions in mm   850 x 920 x 440 (W x D x H)
| Weight   Approx. 60kg
| Operating temperature   10ºC to 35ºC
| Operating humidity   ‹ 80%, none-condensing

SOFTWARE

Standard routines for image processing
| Component angel 0 — 360º supported
| Presence and polarity verification on all THT and SMD components
| Measurement of component position (offset, angle)
| Solder joint inspection on SMD and THT components
| Solder joint inspection on ICs, including THT
| Short-circuit tests (solder bridges)
| Solder paste inspection (2-D)
| Initial sample test

Production tools, documentation
| Automatic storage of test results
| CAD data conversion tool, license for LVCad
| User definable result messages
| Data logging of test results, flexible output (ASCII) format, transfer to an external QMS
| Fault statistic, yield-meter, SPC (LVStat)
| Graphical repair station (LVRepair)
| Graphical board view (LVBoard)
| Offline serial debugging
| Remote service / debugging via internet
| Communication with production line over various interfaces
| Barcodes readable with camera
| Optical character verification (OCV) on components

Options
| Offline programming, remote station
| Further license for LVRepair, LVBoard, LVStat
| Angled-view module: four lateral cameras in addition to the main camera integrated into the lighting, max. PCB hight reduced to 40 mm

Program generation
| Automatic program generation from CAD data
| Wizzard (guided program generation)
| Automatic changemanagement of board revisions
| Automatic camera and test route optimisation
| Automatic generation of multi panel board inspection
| Array test for easy reproduction of similar individual routines
| Automatic generation of programs for first off (comparison with golden board)
| Inspection alternatives for component versions
| Support of insertion variants (up to 255)
| Inverting of test results of not assembled components
| Output of user-definable Pass/FAIL messages