DIGITAL MICRO-VICKER HARDNESS TESTER
(MHV-1000 SERIES)

FEATURES

- The operation is input by the touch key on the panel.
- Digital display.
- Converted to more hardness scales.
- Automatic (loading/dwelling/unloading).
- Built-in printer on machine.
- And can display the measurement of indentation length, hardness value, measurement times, etc.
- Executive standards ISO 6507, ASTM E384, JIS Z2244, GB/T 4340.2.

APPLICATIONS

- It is suitable for measuring small thin specimens and parts after surface plating.
- Can determine the micro Vickers and Knoop hardness of brittle materials such as agate, glass and ceramics. It is an ideal hardness testing instrument for research and testing by scientific research units, colleges and universities, production enterprises and testing institutions.

SPECIFICATIONS

MODEL	MHV-1000A	MHV-1000B
Turret	Automatic	Manual
Test force	10 gf (0.098 N), 25 gf (0.245 N), 50 gf (0.49 N), 100 gf (0.98 N), 200 gf (1.96 N), 300 gf (2.94 N), 500 gf (4.9 N), 1 kgf (9.8 N)	
Measuring range	5~3000 HV	
Converted scales	HRA, HRB, HRC, HRD, HRF, HV, HK, HBW, HR15N, HR30N, HR45N, HR15T, HR30T HR45T	
Hardness value resolution	0.1 HV	
Test mode	HV/HK (option probe for HK)	
Objective lens	10X (observation), 40X (measurement)	
Load dwell time	1~ 60 s	
X-Y test table	Size: 100×100 mm, distance of travel: 25×25 mm Resolution: 0.01 mm	
Data output	Touch screen readout, built-in printer	
Max. workpiece height	90 mm	
Distance from the center of the head to the outer wall	105 mm	
Light source	Halogen light source	
Power supply	AC220 V, 50 Hz	
Dimensions	490×340×570 mm	
Net weight	40 kg	

STANDARD DELIVERY

NAME	QUANTITY	NAME	QUANTITY
Main unit	1 pc	Cross table	1 pc
10X and 40X objective lens	1 set	Sheet holding table	1 pc
10X digital micrometer eyepiece	1 pc	Flat clamping table	1 pc
Micro vickers indenter	1 pc	Screwdriver	1 pcs
Standard weights	6 pcs	Level adjustment screw	4 pcs
Weight rod	1 pc	Level	1 pc
Standard hardness block 400~500 HV0.2	1 pc	External power cord	1 pc
Standard hardness block 700~800 HV1	1 pc	Fuses (2A)	2 pcs
Product certificate	1 pc	Product instruction manual	1 pc

# CAMERA AND SOFTWARE (OPTIONAL)

MODEL: SW-MHV1000A

FEATURES

- The SW-MHV1000A Vickers hardness image measurement system integrates multiple latest professional technologies such as optical imaging, mechanical displacement, electronic control, digital imaging, image analysis, computer processing, etc.

- Digitally imaging the hardness indentation on the computer screen and then through automatic reading, manual reading and other means can accurately measure the microhardness of metal and some non-metallic materials, various films and coatings, the depth of the hardened layer, the thickness of the film, the distance between two points, etc.

- This system breaks through the traditional hardness test method and realizes fast, high-precision and highly repeatable hardness test.
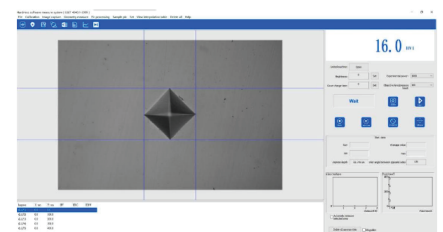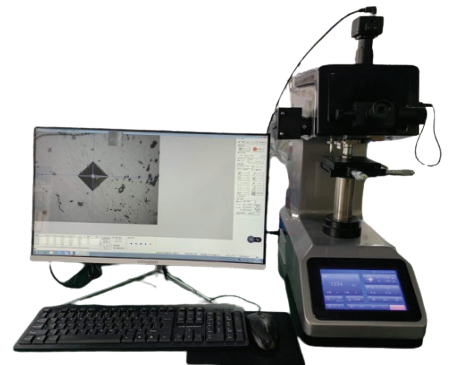
SPECIFICATIONS

- Applicable operating system: WIN10, WIN11 64 bit system.
- Digital imaging system:
  - 3 million pixels, high resolution; High-speed acquisition 1280X1024 resolution: 25 frames/sec; 800X600 resolution: 55 frames/sec.
  - High definition, black and white images, better clarity, target size, 1/2 inch.
- Automatic reading/manual reading:
  - Automatic reading time: The reading time of a single indentation is about 300 milliseconds.
  - Automatic measurement accuracy 0.1 μm.
  - Automatic measurement repeatability ±0.8% (700HV/500gf, clear imaging).
  - Manual reading: four point measurement, two diagonal measurement.
- Results save/output:
  - Store/output measurement data and experimental parameters, including D1, D2, HV, X, Y, etc.
  - Store/output effective hardened layer depth curve report.
  - Store/output image.

Software

Camera