

# Automatic Turret Digital Display Micro-Vickers Hardness Tester (Imaging and Automatic Measurement Software)

**Brand: JNG**

**Model: JG-120S**



**(Photo for reference only)**

## Product Introduction

JG-120S Automatic Turret Digital Display Micro-Vickers hardness tester come with LCD display screen, and the operation interface adopts menu structure. It also equipped with imaging sensing camera and automatic hardness measurement software. The hardness scale HV or HK can be selected on the operation panel. The hardness value tested will be automatically calculated and displayed. Various hardness values can be converted to each other. The hardness error can be corrected by software input to make the hardness more accurate. Test results can be automatically stored, processed and printed.

The JG-120S digital display micro hardness tester has manual switch between the head and the objective lens during the test, and the test point positioning is accurate.

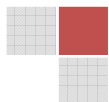


## Application

Heat treatment, carbonization, hardening layer, surface coating, steel, nonferrous metals, small and thin parts, etc.

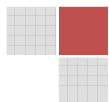
## Technical Specifications

Model	JG-120S
Test Force	10gf (0.098N), 25gf (0.245N), 50gf (0.49N), 100gf (0.98N), 200gf (1.96N), 300gf (2.94N), 500gf(4.9N), 1kgf (9.8N)
Minimum Test Unit	0.031 $\mu$ m
Exchange Scales	HRA, HRB, HRC, HRD, HRF, HV, HK, HBW, HR15N, HR30N, HR45N, HR15T, HR30T, HR45T
Measurement Range	5~3000HV
Test Method of Force Application	Automatic (loading, dwelling, unloading)
Test Microscope Magnification	100X (Objective) 4000X (Measurement)
Test Load Dwell Time	0~60s
X-Y Table	Size: 100*100mm Max. Movement: 25*25mm
Data Output	LCD Display, Built-in printer and RS-232 interface
Max Height of Specimen	110mm
Distance from the center of the Head to the Outer Wall	110mm
Power Supply	AC220V +5%, 50-60Hz
Dimensions	405*290*480mm
Weight	40Kg

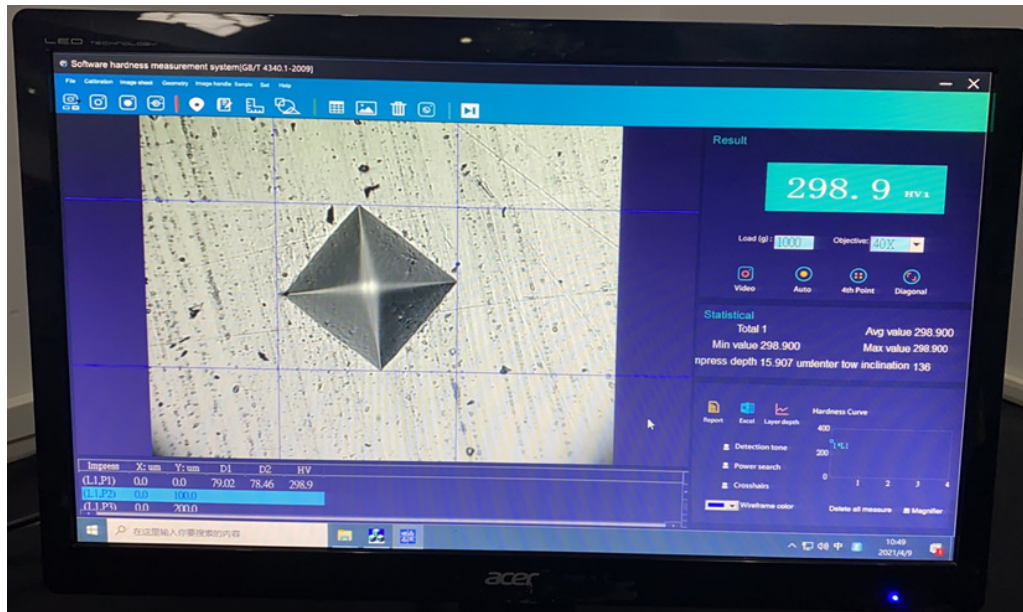


## Packing List

Name	Quantity
Farmar Shaft	1
Cross Test Machine	1
Flat Mouth Clamping Table	1
Screwdriver	1
Small Spirit Level	1
Micro Vickers hardness block (High Block, Low Block)	1
Power Line	1
Product Instruction	1
Standard Weight	6
Water Holder	1
Fine Wire Clamping Table	1
Adjusting Screw	4
10X Test Eyepiece	1
Backup Fuse (2A)	2



## Automatic Image Measurement System for Micro Hardness Tester



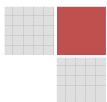
### I. Application

Applicable to steel production, ship manufacturing, automobile manufacturing, aircraft manufacturing, high-pressure vessels, electrical components, bearings, standard parts, metal textile accessories and instrumentation accessories and other metal products related to the production enterprises. The analysis results provided by the software can provide more scientific basis for enterprise quality control, improve the level of enterprise management and appearance, and be an effective tool for enterprises to engage in the development of new scientific and technological products and product quality control. The software can also be used as an effective tool for theoretical teaching, experimental analysis and basic scientific research in research institutes, manufacturing factories and universities related to metal materials

### II. Function

Computer image analysis system for accurate correction and gradient diagrams. It can also be measured by eyepiece. Output measurement data, image, metallographic and hardness gradient diagram, which can be printed or saved.

- ✓ the hardness value of the test indentation was measured by the software's signal conversion.
- ✓ it is possible to test vickers, brinell, knoop, carburizing layer, nitriding layer, etc. adjust contrast and brightness of indentation image.



- ✓ edge detection can be performed for the indentation of samples with poor finish.
- ✓ indentation can be enlarged by 2× in order to better measure the test value.
- ✓ image files and data files can be opened, stored and printed in English and Chinese respectively, and the data can be transferred to Excel file, etc.
- ✓ data files and image files can be viewed at any time. Data files are printed in the form of tables and curves.
- ✓ choose a high or low power objective lens as required.
- ✓ support WIN9X, WIN2000, WINXP and other operating systems. Available in various microdurometers, vickers/knoop durometers, with measurement of length, angular attack energy, can be used as a simple projector.

### **III. Systematic**

1. Adapter and interface
2. Image sensing camera (SONY chip color 1/3 "hd CCD 700 line) (standard)
3. Image capture card (high resolution real-time image acquisition card secondary development software package)
4. Automatic hardness measurement software (multifunctional version)
5. Microcomputer and printer: one computer, 19 inch LCD, one HP color printer (optional)

