

Digital Hardness Tester for Field or Laboratory Applications

DHT-20



DHT-20, shown
actual size.

- ✓ **Conforms to ASTM A956**
- ✓ **Quick and Reliable**
- ✓ **Wide Measuring Range in HL Value and Direct Display of Converted Hardness Values in Rockwell HRB, HRC, Vickers HV, Brinell HB, and Shore HS**
- ✓ **Impact Device Provides Testing at Any Angle, Even Upside Down**
- ✓ **1250 Data Point Internal Memory**
- ✓ **Date and Time Display**
- ✓ **Low-High Settings**
- ✓ **RS232 Output Jack with PC Data Logging Kit Includes RS232 to USB Adaptor**
- ✓ **Auto Power Off (Can be Disabled for Data Logging)**

The DHT-20 is an advanced portable hardness tester, characterized by its high accuracy, wide measuring range and simplicity of operation. It's designed to measure the hardness of ordinary metals and is widely used in quality and test and measurement laboratories in industries such as petroleum, chemical processing, machinery, heat treating, and electric power.

The DHT-20 uses the Leeb Hardness testing procedure. To determine the target's Leeb hardness value, a parameter designated HL, is determined by using the plungers rebound velocity and an algorithm in the DHT-20. These can be displayed in a variety of units. The operator's manual includes a hardness table of typical industrial materials as a reference guide.

Typical Applications:

- ✓ **Measuring Surface and Coating Hardness**
- ✓ **Permanent Installations in Machine or Assembly Systems**
- ✓ **Monitoring Molding Surface of Dies**
- ✓ **Measuring Bearings and Other Production Parts in the Assembly Line**
- ✓ **Quality Assurance Test Records**

Specifications

Measurement: Leeb hardness measurement

Measurement Accuracy: $\pm 0.5\%$

Relative Repeatability Accuracy: $\pm 0.8\%$

Memory: 1250 readings

Display: 112 x 64 pixel LCD

Hardness Scales: HL/HRB/HRC/HV/HB/HS

Materials: Most common metals including; Steel/cast steel, alloy tool steel, stainless steel, grey cast iron GG, nodular cast iron, cast aluminum, copper-zinc brass, copper aluminum, wrought copper

Display Options: Hardness scale, hardness value, times, average indicator and average value, impact direction, type of impact device connected, memory reference, date, time, battery power consumption

Auto Off: 2 minutes of no activity

Working Environment: 0 to 45°C (32 to 113°F)

Dimensions: 108 L x 62 W x 25 mm D (4.25 x 2.44 x 1")

Display: 48 L x 28 mm W (1.88 x 1.12")

Weight: 180 g (6.4 oz) including impact device and printer

Power Source: 2 "AAA" batteries (included)



Hardness Ranges

Materials	HL	HRC	HRB	HB 30D ₂	HB 10D ₂	HS	HV
Steel	300 to 900	20.0 to 68.0	38.4 to 99.5	80 to 647		32.5 to 99.5	80 to 940
Tool Steel	300 to 640	20.4 to 67.1	46.5 to 101.7				80 to 898
Stainless Steel	300 to 800	19.6 to 62.4		85 to 656			85 to 802
Cast Iron GG	360 to 650			90 to 334			
Cast Iron GGG	400 to 660			131 to 367			
Cast Aluminum	174 to 560				20 to 190		
Brass	200 to 550		13.5 to 95.3		40 to 173		
Bronze	300 to 700				60 to 290		
Copper	200 to 690				45 to 315		

To Order

Model No.	Description
DHT-20	Digital hardness tester

Comes complete with DHT-20, hard carrying case, soft case for display, hardness probe, standard hardness test block (797HLD), RS232 to USB adaptor, mini CD with software, 2 "AAA" batteries and operator's manual.