H12 Micro IRHD Hardness Tester

- Tests small/thin samples and O-rings
- One touch, fully automatic operation
- Accurate and consistent results
- Easy access to sample area
- Operator dependency reduced
- Range of sample tables

The Wallace H12 is a digital IRHD bench-mounted micro hardness tester that measures the hardness of most rubber samples . The instrument has been specifically designed to accurately test thin sections and small test pieces such as O-rings to a high level of accuracy.

The robust, 'C' frame design allows the operator easy access from front and sides to safely insert and remove samples. The indenter mounting is frictionless and its position sensed by an LVDT, providing the instrument with outstanding sensitivity. Adjustable anti-vibration feet reduce the effect of external vibration.

By simply pressing the start button, the instrument begins to operate automatically, allowing accurate and repeatable results to be recorded in much less time than traditional models.

As minimal training is required, new operators soon become confident with the H12 and can achieve consistent readings right from the start. A range of optional sample tables is available (see page 8). These are designed to accommodate samples of varying shapes and include special sample holding fixtures. The O-ring adaptor table (H19/ORA) is engineered to ensure that the centre point of the ring is directly beneath the centre line of the indentor

The Up and Down Touchpad Keys on the front panel can be used to simply adjust the measuring head up or down to suit the sample height. Once the Start Key is pressed, the foot descends to secure the sample. This is followed by the indenter, which descends through the centre of the foot with a primary force of 8.3mN to find its datum position. After 5 seconds, in line with the testing standards, the force is then increased to 145mN and applied for a further 30 seconds. At this point the instrument identifies the indenter position and the hardness value is automatically frozen and displayed clearly on the LCD Display Screen. Four instrument models are available: (see page 4 for details):

H12/1 Basic, stand alone
H12/2 With printer
H12/3 With printer and data input terminal
H12/PC Hardness value sent to PC



Specification for H12 Micro IRHD Hardness Tester	
Weight	7.5 Kg
Dimensions	214(w) x 255 x (d) x 300mm (h)
Resolution	<0.1 units
Indenter shape	Sphere
Indenter diameter	0.395mm
Full range display	0.3mm
Force method	Weight
Foot Force	235mN
Primary Indenter force	8.3mN
Secondary force	145mN
Force duration	5 + 30 seconds
Minimum sample thickness	1.5mm
Standards	BS ISO 48, DIN 53519, DIN ISO 48, ASTM D 1415