DektakXT

Specifications

Measurement Technique	Stylus profilometry (contact measurement)
Measurement Capability	Two-dimensional surface profile measurements; Optional three-dimensional measurement/analyses
Sample Viewing	Digital magnification, 0.275 to 2.2mm vertical FOV
Stylus Sensor	Low Inertia Sensor (LIS 3)
Stylus Force	1 to 15mg with LIS 3 sensor
Low Force Option	N-Lite+ Low Force with 0.03 to 15mg (optional)
Stylus Options	Stylus radius options from 50nm to 25µm; High Aspect Ratio (HAR) tips 10µm x 2µm and 200µm x 20µm; Custom tips available upon request
Sample X/Y Stage	Manual 100mm (4 in.) X/Y, manual leveling; Motorized 150mm (6 in.) X/Y, manual leveling
Sample R-Theta Stage	Manual, continuous 360 degrees; Motorized, continuous 360 degrees
Computer System	64-bit multi-core parallel processor, Windows® 7.0; Optional 23in. flat panel display
Software	Vision64 Operation and Analysis Software; Stress Measurement; Microform; Optional: Stitching; 3D Mapping; 3D Stress
Vibration Isolation	Vibration isolation solutions available
Scan Length Range	55mm (2in.); 200mm (8in.) with scan stitching capability
Data Points Per Scan	120,000 maximum
Max. Sample Thickness	50mm (1.95in.)
Max. Wafer Size	200mm (8in.)
Step Height Repeatability	<5Å, 1sigma on 0.1µm step
Vertical Range	1mm (0.039in.)
Vertical Resolution	1Å max. (@ 6.55µm range)
Input Power	100 – 240 VAC, 50 – 60Hz
Temperature Range	Operating Range, 20 and 25°C (68 to 77°F)
Humidity Range	≤80%, non-condensing
System Dimensions and Weight	455mm W x 550mm D x 370mm H (17.9in. W x 22.6in. D x 14.5in. H); 34kg (75lbs.); Enclosure: 550mm L x 585mm W x 445mm H (21.6in. L x 23in. W x 17.5in. H); 5.0kg (11lbs.)

Cover images
Foreground: DektakXT advanced system with optional isolation pads.
Background: Solar cell surface roughness in 3D.

Bruker Nano Surfaces Division

Tucson, AZ · USA
Phone +1.520.741.1044/800.366.9956 ext. 3
productinfo@bruker-nano.com

www.bruker.com