

Atomic Force Microscopy





Features:

- * Integrated scanning-probe and sample-stage enhances the anti-interference ability of the spring suspension system.
- * Precision laser and probe positioning device makes probe changing and spot adjusting simple and convenient.
- * The sample-to-probe auto-approaching provides an efficient way to prevent cantilever crash.
- * The vertical sample probe approaching allows achieving precise positioning of area of interest.
- * Sample scanning area of interest may be freely selected with an high-precision/wide-range XY table.
- * Top-view CCD system warrants real-time observation and positioning of the probe on the selected sample region.
- * Modular design of electronic control system facilitates maintenance and continuous improvements.
- * The compact model 2000 may be easily transported inside an aluminum luggage.
- * The hermetic box in model 1000 provides a controlled environment.

Technical Parameters:

Model	BK-AFM1000
Working Modes	Contact mode and lapping mode
	Optional modes: Phase, Friction (LFM), Magnetic (MFM), Electrostatic (EFM)
Sample Size	Φ≤90mm, H≤20mm
Scanners Available	10*10µm, 20x20µm, 50*50µm,100*100µm
Scanning Resolution	0.2nm in XY direction, 0.05nm in Z direction
Range of Sample Movement	±6.5mm
Step-motor Pulse Width	10±2ms
Image Sampling Points	512*512
Optical Magnification 4X	Optical resolution 2.5µm
Scan Rate 0.6Hz~4.34Hz	Scan angle 0°~360°
Scanning Control	18-bit D/A in XY direction, 16-bit D/A in Z direction
Data Sampling	14-bitA/D, doublel6-bit A/D multi-channel synchronous sampling
Feedback	DSP digital feedback
Feedback Sampling Rate	64kHz
Computer Interface	USB 2.0
Operating System	Windows XP/7/8/10
Supply Power	AC220V, 50/60Hz; 110V, 50/60Hz(optional)
Package Size	550*550*1150mm
Gross Weight	65kg