

AFM microscope

The Nano-Observer is the result of many years of collaboration with different AFM players and laboratories.

Based on 20 years of experience in this field, we created this product to provide an AFM full of performance that is affordable...

AFM performs all the major modes and also advanced applications for a very competitive value.

Designed to achieve the best of AFM measurements, the Nano-Observer is a clever balance between analog and digital electronics and premium components to offer the lowest noise and greatest accuracy on a robust and flexible instrument.





66 Designed to achieve the best of AFM measurements.

» Microscope head

- 4 quadrants photo-detector (large bandwidth)
- Low coherence and low noise laser 658nm - Power < 1mW
- Compatible with multiple environments (gas, temperature and liquids)
- Size: 161mm diameter 255mm height

Sample stage

- 100µm X-Y and up to 10µm in Z
- 24 bit scan control (XYZ)
- Noise level: typ. 0.05nm up to 0.035nm(mode dependent)
- Sample size: up to 50mm diameter 15 mm thickness
- Motorized vertical approach (software control)
- Integrated bottom illumination
- 10 mm X-Y travel

>> Patented flexure stage technology

A patented flexure stage with 3 independent low voltage piezoelectric devices to make high resolution routine as large scans in a single scanner.

- Flexure stage to avoid old piezotube defects (bow, X-Y crosstalk...)
- 3 independent axis
- Low voltage drive for a lower noise level
- Massive and robust platform



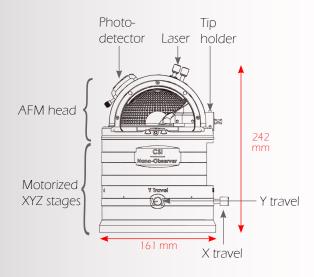
>> Color CCD camera views

- Top and Side view
- Viewing and illumination software controlled
- Field of View 5.5x4.0mm
- Magnification X70
- Pixel resolution about 4µm

>> HD camera (option)

- Integrated optics
- Field of View 1.4x1.0mm
- Magnification X300
- Pixel resolution better than 1µm

AFM configuration



>> Tip holders

- Liquid tip holder
- Thermal tip holder
- Conductive tip holder
- Pre-alignment tip holder
- Akyama tip holder
- Customization ...

