



SOLAR 1000

Ultra Micro
Spectrophotometer



LABORATORY



Description

SOLAR 1000 is a full-wavelength (190 ~ 1000 nm) ultra-micro spectrophotometer. It uses a self-produced high-performance fiber spectrometer and a high-stability pulsed xenon lamp produced by Hamamatsu, Japan. Detect nucleic acid and protein. At the same time, it is easy to use, consumes less samples (only 0.5 ~ 2 μ l), does not require preheating, can quickly clean up residual samples, does not require cuvettes or other sample positioning devices, and samples do not need to be diluted. The SOLAR 1000 ultra-micro spectrophotometer is very easy to use. When testing, you can directly use a pipette to point the sample on the measuring probe and close the cover to perform the measurement; after the measurement, you can directly wipe off the sample or Recover the sample. SOLAR 1000 has become a standing instrument in many laboratories. SOLAR 1000 Ultra Micro Nucleic Acid Analyzer is a micro ultraviolet spectrophotometer mainly used to detect nucleic acids and proteins. It uses a high-energy pulsed xenon light source to provide 230nm, 260nm and 280nm spectral detection. SOLAR 1000 is based on the Android operating system and comes with a 7-inch capacitive touch screen. It does not require a computer connection and can be tested in a single machine. The test data can be printed or output via USB, which is convenient for users to analyze and store.

Application Range

- Research laboratory
- Hospital
- Biological laboratory
- Chemical laboratory
- Environmental testing

Features

- Detection of nucleic acids, proteins and full-band scanning
- Only 0.5-2 μ l sample is required for each test
- Fast detection: <3s
- Wide spectral range: 190-1000nm;
- Full touch screen operation, convenient and quick;
- 7 inch high-definition capacitive touch screen;
- Long-life light source, up to 10 years
- Built-in high-performance optical fiber spectrometer
- High stability pulsed xenon light source
- Advanced calculation algorithm;
- User self-modeling function;
- USB data output function;

Features

Parameters	Specifications	Notes
Sample Size	0.5 - 2.0 μL	
Measurement Cycle	~ 3 seconds	
Optic Path Length	1.0 mm	0.5, 0.25 and 0.05mm are optional
Wavelength Range	190 ~1000 nm	
Light Source	Xenon flash lamp	
Detector Type	2048 pixel linear CCD array	
Wavelength Accuracy	1 nm	
Wavelength Resolution	≤ 2 nm (FWHM at Hg 546 nm)	
Absorbance Precision	0.003 Abs(1mm)	
Absorbance Accuracy	1% (0.76 at 257 nm)	
Detection Limit	2 ng/ μL (dsDNA)	
Max Concentration	15,000 ng/ μL (dsDNA)	
Absorbance Range	0.04 ~ 300 (10mm)	
DNA range	2 ~ 4500ng/ul (dsDNA)/2 ~ 15000ng/ μL (Optional)	
Surface Construction	304stainless steel and quartz fiber	
Operation System	Android OS	
Panel Type	Capacity Touch Panel	

Features

Parameters	Specifications	Notes
Panel Size	7 inch	
Panel Resolution	1920 X 1020	
Endurance Time	6 hrs	
Li-ion Battery	55 Wh	
Operating Voltage	12V DC	
Power Consumption	9 W	
Standby Power	3 W	
Dimensions	290 X 210 X 220 mm	
Weight	3.2kg	