BioLAB

PRODUCT CATALOG

NANO SPECTROPHOTOMETER BGH1S3 (BSNA-101)

CE ISO9001 CERTIFIED

www.biolabscientific.com

NANO SPECTROPHOTOMETER BGH1S3

MICRO-SPECTROPHOTOMETER

User-Friendly Software, Easy to Use
Graphical software operation, more intuitive interface, the results can be directly exported, easy to save, view and output data.
Micro-Volumes Measuring
Only 0.5 μL-2 μL sample is needed for each test. After the measurement, the samples can be recovered and the precious samples can be studied with confidence.
Long Life Light Source, Do Not Need to Warm Up
Xenon flash, life span is 10^9 (up to 10 years). No preheating, direct use, ready to test at any time.
High Concentration Detection
The maximum concentration of the detectable sample is 15000 ng/μL, and the sample basically does not need to be diluted.

SPECIFICATIONS

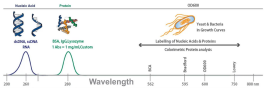
Model	BGH1S3
Old Model	BSNA-101
Wavelength range	260 nm, 280 nm
Minimum sample size	1.0~2.0 μL
Path length	0.5 mm
Light source	UV LED
Detector type	UV-silicon photocell
Wavelength accuracy	/
Spectral resolution	≤ 8 nm
Absorbance precision	0.005 Abs
Absorbance accuracy	2 % (7.332 Abs at 260 nm)
Absorbance range	0.2~50 A
Nucleic acid detection range	10~2500 ng/μL (dsDNA)
Measurement time	< 6 s
Dimension (WxDxH) mm	208x280x186
Weight	2.0 kg
Sample pedestal material	Aluminum alloy and quartz fiber
Operating voltage	DC 24 V 2 A
Operating power	25 W
Standby power	5 W
Software compatibility	Android system
Cuvette Mode (OD600 Measurement)	
- Light source	LED
- Wavelength range	600±8 nm
- Absorbance range	0~4 A
Fluorometer Mode	
- Sensitivity	/
- Linear dynamic range	/
- Repeatability	/
Alt Name	Micro-Spectrophotometer

FEATURES

User-Friendly Software, Easy to Use
Graphical software operation, more intuitive interface, the results can be directly exported, easy to save, view and output data.
Micro-Volumes Measuring
Only 0.5 μL-2 μL sample is needed for each test. After the measurement, the samples can be recovered and the precious samples can be studied with confidence.
Long Life Light Source, Do Not Need to Warm Up
Xenon flash, life span is 10^9 (up to 10 years). No preheating, direct use, ready to test at any time.
High Concentration Detection
The maximum concentration of the detectable sample is 15000 ng/μL, and the sample basically does not need to be diluted.
Convenient and Easy to Use
Directly point the sample on to the sample plate without dilution or cuvette. The sample concentration can be measured as 50 times of the conventional uv-visible photometer, and the result can be directly output as the sample concentration.
Fast Detection
No dilution or cuvette needed in the detection process; 5 s can complete the test and display the result.
Single Machine Operation, Convenient and Efficient

It is a fixed wavelength (260 nm, 280 nm, 365 nm) ultra-micro nucleic acid analyzer, which is used for routine analysis of micro sample testing and is a supplement to the full wavelength instruments.
Android system, 7-inch capacitive touch screen, no computer connection required.
LED light source, long life component.
It is mainly used to detect the concentration and purity of nucleic acid, and to detect the concentration of nucleic acid at 260 nm, the concentration of protein at 280 nm. The 260 / 280 ratio is used to measure purity.
Newly designed OD600 optical path detection system, new cuvette mode, convenient for the concentration detection of bacteria, microorganisms and other culture solutions.
The test data is transferred to the computer via USB for easy sorting and analysis.
Easy-to-use data printing options, can print the report directly through the built-in printer.

APPLICATIONS



Different Fluorescence Channels:

UV Channel:
Excitation wavelength: 365±20 nm
Common reagent: Hoechst 33258, 4-MU, EnzChek Caspase
Nucleic acid quantification, plant GUS reporter gene detection, apoptosis detection

Blue Channel:
Excitation wavelength: 460±20 nm
Common reagent: PicoGreen, oligreen, RiboGreen, GFP, Protein, Fluorescein
dsDNA, ssDNA, GFP, gene detection, fluorescein detection, protein quantification.

Green Channel:
Excitation wavelength: 525±20 nm
Common reagent: Rhodamine, Cy3, RFP Vybrant Cytotoxicity
Rhodamine detection, Cy-3 fluorescence labeling detection, RFP gene detection, cytotoxicity detection.

Red Channel:
Excitation wavelength: 625±20 nm
Common reagent: Cy5, Quant-iT RNA
Cy-5 fluorescence labeling detection, RNA quantification

MORE INFO

Fluorescence Detection Mode (Can Be Customized)

Model	Nano500U (optional)	Nano500 (standard)	Nano500G (optional)	Nano500R (optional)
Channel	UV	Blue	Green	Red
Excitation wavelength	365±20 nm	460±20 nm	525±20 nm	625±20 nm
Emission wavelength	420-480 nm (60 nm)	525-570 nm (45 nm)	575-640 nm (65 nm)	670-725 nm (55 nm)

Fluorescence Detection Mode - Specification

Parameter	Specification
Light source	LED
Dynamic range	5 orders of magnitude
Linearity	R≥0.995
Detector	Photodiode
Repeatability	≤1.5 %
Stability	≤1.5 %
Sensitivity	dsDNA: 0.5 pg/μL
Measurement speed	3 s (once)

Biolab Scientific Ltd.
Trillium Executive Center, East Tower, 675 Cochrane Dr, Markham, Ontario L3R 0B8, Canada
Email: info@biolabscientific.com | Website: www.biolabscientific.com