

Performance Specifications (G4212B)

Table 7 Performance Specifications G4212B

Type	Specification	Comments
Detection type	1024-element photodiode array	
Light source	Deuterium lamp	Equipped with RFID tag that holds lamp typical information.
Wavelength range	190 – 640 nm	
Short term noise (ASTM) Single and Multi-Wavelength	$< \pm 3 \times 10^{-6}$ AU at 230 nm/4 nm	see "Specification Conditions" below
Drift	$< 0.5 \times 10^{-3}$ AU/hr at 230 nm	see "Specification Conditions" below
Linear absorbance range	> 2.0 AU (5 %) at 265 nm	see "Specification Conditions" below
Wavelength accuracy	± 1 nm	After recalibration with deuterium lines
Wavelength bunching	2 – 400 nm	Programmable in steps of 1 nm
Slit width	G4212B: 4 nm	Fixed slit
Diode width	~ 0.5 nm	
Signal data rate	80 Hz (G4212B)	
Spectra Data rate	80 Hz (G4212B)	
Flow cells	Max-Light Cartridge Cell (10 mm, V(σ) 1.0 μ l), 60 bar (870 psi) pressure maximum Max-Light Cartridge Cell (60 mm), V(σ) 4.0 μ L), 60 bar (870 psi) pressure maximum Max-Light Cartridge Test Cell	pH range 1.0 —12.5 (solvent dependent) Cartridge type, equipped with RFID tags that holds cell typical information.
Control and data evaluation	Data System 1 Agilent ChemStation for LC 2 EZChrom Elite 3 MassHunter	For G4212B: 1 B.04.02 DSP3 or above 2 3.3.2 SP2 or above 3 B.04.00 and B.03.01 SP2 or above
Local Control	Agilent Instant Pilot (G4208A)	B.02.11 or above
Test and diagnostic software	Agilent LabAdvisor	B.01.03 SP4 or above
Analog outputs	Recorder/integrator: 100 mV or 1 V, output range 0.001 – 2 AU, one output	

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Type	Specification	Comments
Communications	Controller-area network (CAN), RS-232C, APG Remote: ready, start, stop and shut-down signals, LAN	
Safety and maintenance	Extensive diagnostics, error detection and display (through control module and ChemStation), leak detection, safe leak handling, leak output signal for shutdown of pumping system. Low voltages in major maintenance areas.	
GLP features	Early maintenance feedback (EMF) for continuous tracking of instrument usage in terms of lamp burn time with user-settable limits and feedback messages. Electronic records of maintenance and errors. Verification of wavelength accuracy with the emission lines of the deuterium lamp.	
Housing	All materials recyclable.	

Performance Specifications (G1314F)

Table 8 Performance Specifications G1314F

Type	Specification	Comments
Detection type	Double-beam photometer	
Light source	Deuterium lamp	
Wavelength range	190 – 600 nm	The UV-lamp is equipped with RFID tag that holds lamp typical information.
Short term noise	$\pm 0.25 \cdot 10^{-5}$ AU at 230 nm (G1314F)	Under specified conditions. See “Specification Conditions (VWD)” on page 48 below the table.
Drift	$< 1 \cdot 10^{-4}$ AU/h at 230 nm	Under specified conditions. See “Specification Conditions (VWD)” on page 48 below the table.