

UC INSTRUMENTS GM82004xx PC Control Tunable Laser Source Modules

Technical Specifications Ver 1.08
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GM82004xx Tunable Laser Source Modules

The GM82004C, GM82004L and GM82004CL tunable laser modules offer superior performance in testing DWDM components, AWG & PLC components, optical amplifiers, and performing other general-purpose fiber optical test and measurement applications.

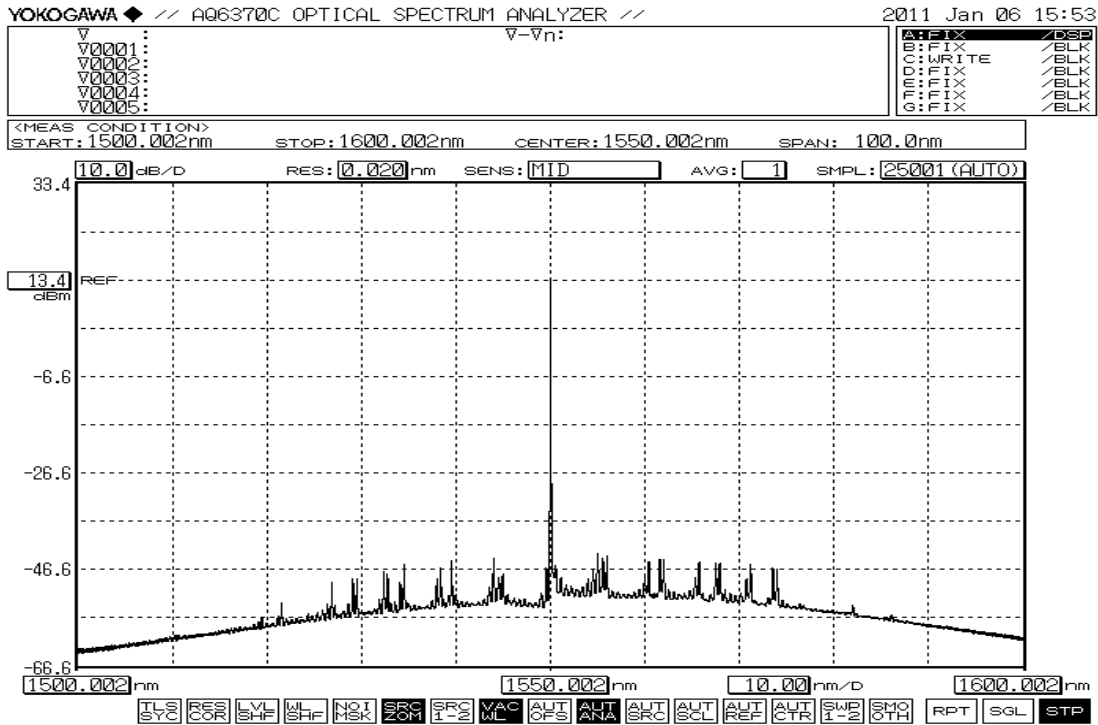
Each of the three tunable laser modules (i.e., GM82004C, GM82004L, GM82004CL) can be connected to a PC through a USB cable, making a high accuracy, high power, compact dimensions, fast startup, affordable tunable laser source system. This system provides C band, L band, or C+L band tunable laser sources options. These modules can be integrated into customers' products system with RS232 interface control. UC Instruments also provide modules control software.

Features

- High wavelength accuracy
- Continuous wavelength tunability
- High power laser source
- Rapid tuning speed
- Fast startup
- Compact size
- Competitive price

Applications

- WDM, GFF, isolator, AWG, PLC components tests
- Fiber sensor/sensor array developments
- PMD and PDL measurements
- Fiber optical, telecom R&D lab tests and system integration



Tunable laser source spectrum

Specifications

Model #	GM82004C	GM82004L	GM82004CL
Wavelength range	1528.00 to 1568.00 nm	1568.00 to 1610.00 nm	1528.00 to 1610.00 nm
Output Power	≥ 13 dBm	≥ 10 dBm	≥ 7 dBm
Wavelength resolution	1.0 pm		
Absolute wavelength accuracy	± 10 pm, Typ. < 5 pm		
Relative wavelength accuracy	± 5 pm, Typ. ± 2 pm		
Wavelength repeatability	± 2 pm, typ. ± 1 pm		
Wavelength stability (typ., 24 hrs at constant temperature)	$\leq \pm 2$ pm		
Tuning speed	≤ 0.02 s per step		
Power stability	± 0.05 dB, 1 hour; Typ., ± 0.1 dB, 24 hours.		
Power repeatability	± 0.05 dB		
Power linearity	± 0.3 dB		
Power flatness versus wavelength	0.3 dB typ., 0.5 dB max.		
Side-mode Suppression ratio	≥ 40 dBc		
Relative intensity noise (RIN. Typ.)	< -135 dB		
Output optical interface	PM, FC/PC connector		
Interface	USB or RS232(optional)		
Power	3.3 V; 3 A		
Dimensions	40 mm H, 150 mm W, 170 mm D		
Weight	0.5 kg		

UC INSTRUMENTS' Test and Measurement Supports, Services and Assistance

UC INSTRUMENTS provides high performance, high value, low cost, affordable test and measurement instrument solutions for our customers. Our extensive support sources can help you choose right UC INSTRUMENTS' products for your specific applications and apply them successfully. Every instrument /system we sell has a global warranty. All of our instruments are with at least 12 months factory warranty.

Our Promises

All of UC INSTRUMENTS' test and measurement instruments and systems meet their advertised performance and functionality. When you select a UC INSTRUMENTS' product, we can help your product operation with our decade experiences, and provide the basic measurement assistance for the use of special capabilities.

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