OSICS TLS-AG Low Linewidth WDM Tunable Laser Source

The OSICS TLS-AG modules are tunable laser sources with high output power and low linewidth thanks to external cavity design. The wavelength can be tuned to any wavelength in C or L band.

With more than +13 dBm (20 mW) output power, plus high power and wavelength stability, this is the ideal laser for coherent WDM transmission testing.

Specifications

	C Band	L Band
Grid Selection	Adjustable to any wavelength grid (ITU-T 100 GHz, 50 GHz and arbitrary grid)	
Wavelength Range	196.25 to 191.5 THz 1527.60 to 1565.5 nm	190.95 to 186.35 THz 1570.01 to 1608.76 nm
Output Power	20 mW (+13 dBm)	
Power Range (typ.)	+7 to +14 dBm	
Relative Frequency (Wavelength) Accuracy (typ.)	±0.5 GHz (±4 pm)	
Absolute Frequency (Wavelength) Accuracy (typ.)*1	±1.5 GHz (±12 pm)	
Frequency Setting Resolution*2	Down to 1 MHz	
Tuning Speed*3	20 s (typ. between two channels)	
Power Stability*2	±0.03 dB	
Absolute Output Power Deviation Across Tuning Range	±0.2 dB	
Instantaneous Linewidth (FWHM)	< 100 kHz	
SBS Suppression Ability*4	Yes	
Side Mode Suppression Ratio	50 dB (typ.)	
SSER (typ.)*5	60 dB	
RIN*6	-145 dB/Hz	
Operating Temperature Range	+15 to +35 °C (+59 to +95 °F)	
Optical Interface	FC/APC connector on PMF PER > 20 dB	
Control interface	Status LED, laser on/off button	
Dimensions (WxHxD) & Weight	35 x 130 x 250 mm (single slot), 1 kg	
Laser Safety	Class 1 M	

- 1: ±2.5 GHz (±22 pm) end of life.

- *2: At a constant temperature.
 *3: 30 s max, including power stabilization
 *4: At a dither frequency of 20.8 kHz and a FM p-p modulation width from 0 to 1000 MHz.
- *5: Integrated over a 0.1 nm band. *6: At +13 dBm, average RIN on 10 MHz-40 GHz

Key Features

- **SBS** suppression
- Turn on and off the laser in one click
- Selection of pre-configured channel or any wavelength in the covered wavelength range
- High power: +13 dBm Ideal for optical amplifier testing or WDM test-beds.
- Low linewidth: < 100 kHz Ideal for use as local oscillator in coherent transmission.
- Polarization maintaining output for use with external modulator
- **Handy Operation** The platform user-friendly interface allows direct adjustment of the laser from the front panel, as well as simultaneous display of all power and wavelength values on the OSICS front panel.

+1 609 423 0890 Americas sales-am@yenista.com Asia Pacific sales-apac@yenista.com +65 6631 8520 China sales-china@yenista.com +86 21 6225 3573 **EMEA** sales-emea@yenista.com +33 2 9648 3716

> Information and specifications are subject to change without notice OSICS-TLS-AG_DS_3.0v2.0 (2014-5)

