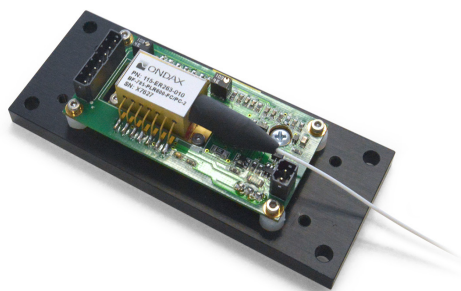


785/830nm, 600mW OEM Butterfly Module



High Power, Narrow Linewidth
Fiber Coupled Output

Features:

- Compact footprint - only slightly larger than the 14-pin butterfly laser
- High power - up to 600mW
- Narrow spectral linewidth - <0.15nm
- Wavelength stability across operating range 0.01nm/°C
- Fiber coupled output - 105 μ m MM fiber
- NoiseBlock™ narrow-band ASE suppression filters and beamsplitters available in matching wavelengths to further reduce linewidth and ASE noise

Applications:

- Raman Spectroscopy
- Metrology
- Bio-instrumentation
- Sensing
- Analytical Instrumentation

Ondax's 785nm and 830nm Raman OEM Butterfly Laser is a wavelength-stabilized, high-power, compact fiber-coupled laser module designed specifically for incorporation into Raman spectroscopy systems. The ultra-compact electronics provide constant temperature control, along with variable analog current control and an interlock connection to simplify integration. An included base plate allows for mounting in virtually any orientation.

All SureLock™ Series lasers are stabilized using the Ondax PowerLocker® Volume Holographic Grating (VHG), ensuring precise, ultra-stable center wavelengths, low temperature dependence, and consistent optical performance over the locked region. The narrowed linewidth, low power consumption, and broad stabilized temperature operating characteristics deliver affordable, portable instrument-quality performance.

Comes with an FC/PC connector.

Specifications:

Specification Summary

Parameter	Symbol	Min	Typ	Max	Unit
Output Power	P_o			600	mW
Center Wavelength (vacuum)	L_p	784.5	785	785.5	nm
Linewidth	$\Delta\lambda$		0.07	0.15	nm
Central Stabilized Temperature ¹	T_c	20		40	°C
Stabilized Temperature Range ¹	T_r	14			°C

Operating Specifications

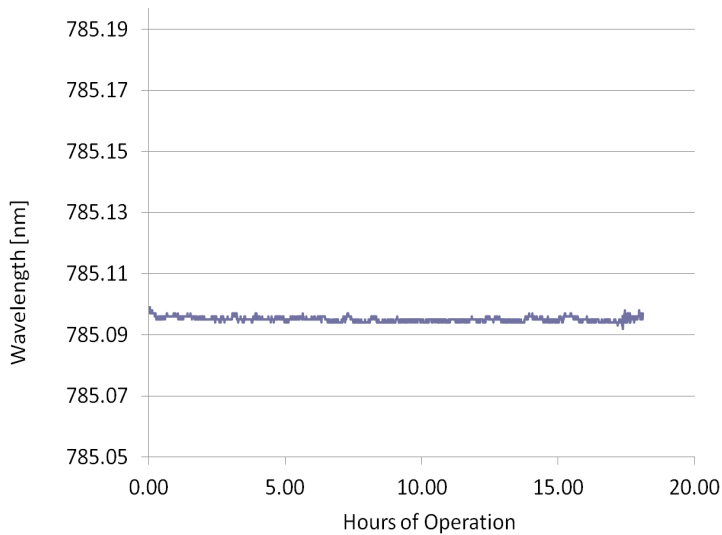
Parameter	Symbol	Min	Typ	Max	Unit
Current	I_{th}		1.3		mA
Input Voltage	V_{op}		5		V
Fiber Type		105 μ m core/ 900 μ m tubing			
Connector		FC/PC			
Numerical Aperture	NA		0.22		
Operating Temperature ²	T_{op}	0	25	50	°C
Storage Temperature ²	T_s	-20		80	°C

¹ Temperature set point is internal TEC set point. R-T thermistor data is available to determine actual thermistor setting. All specifications are at rated power with a case temperature of 25°C unless otherwise noted.

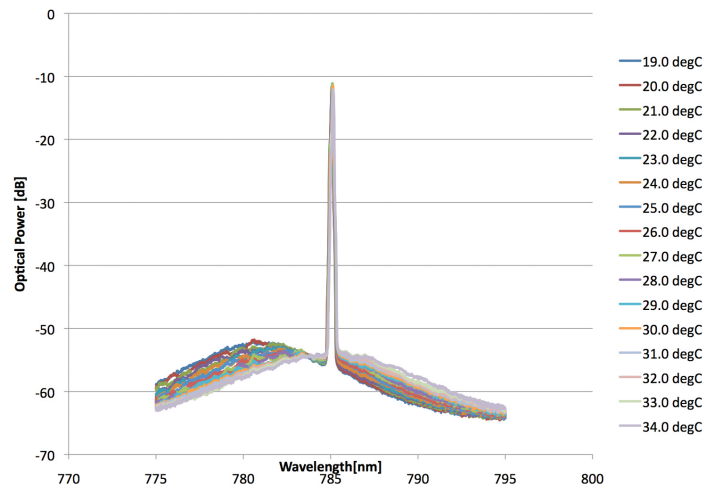
²Non-condensing

785/830nm, 600mW OEM Butterfly Module

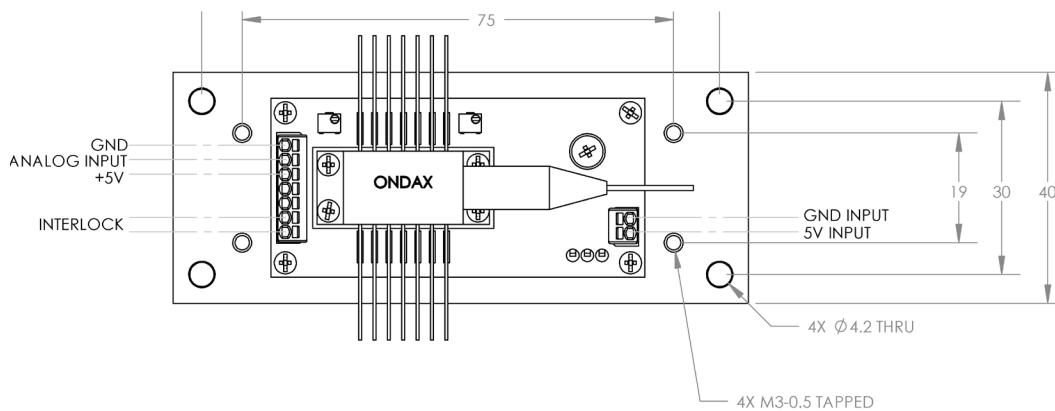
Wavelength Stability



Optical Spectrum (Sample)



Top View



Pinout

Pin	Description
1	Ground
2	Analog Input (Power Control)
3	+5V
4	N/A
5	N/A
6	Interlock (Shorted to Pin 7 Default)
7	Interlock (Shorted to Pin 6 Default)

Side View

