

Perfect for Photoacoustic Imaging!

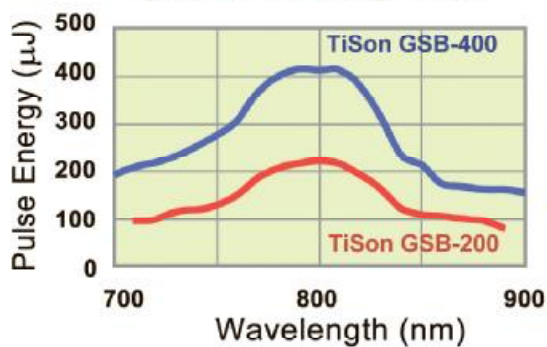
# TiSon GSB

HIGH-ENERGY BROADLY TUNABLE COMPACT NANOSECOND  
Ti:Sapphire LASER

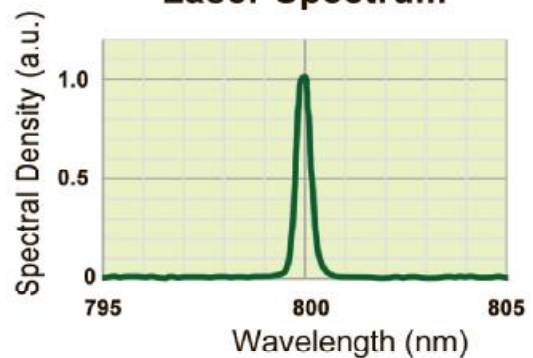


**> 400  $\mu\text{J}$**   
**@ 800 nm**  
 $\tau < 6 \text{ ns}$ ,  $\Delta\lambda < 1.2 \text{ nm}$   
rep. rate 1 kHz

Typical Tuning Curve



Laser Spectrum



## FEATURES

- High pulse energy
- Short pulse duration
- High pulse-to-pulse stability
- Perfect beam quality
- Excellent pointing stability
- Maintenance-free operation
- Cost-effectiveness
- Fully automated wavelength tuning
- Fast wavelength change (< 1ms)
- Random wavelength access
- Air-cooled
- Ultra-compact footprint
- Fully integrated packaging.
- No free standing pump laser

 Laser-compact group  
Laser-export Co.Ltd



[www.laser-export.com](http://www.laser-export.com)

## Specification

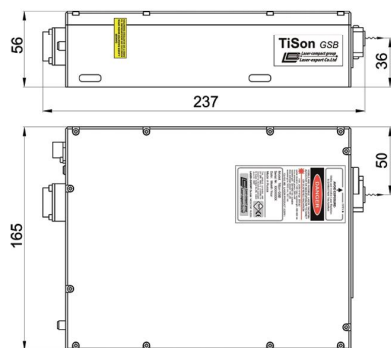
	TiSon GSB-200	TiSon GSB-400
Wavelength Range, nm	710-890	700-900
Wavelength Tuning Method	automatic, PC controlled	
Wavelength Switching Time (between any wavelength in custom wavelength scanning mode)	< 1 ms	
Pulse Energy at 1 kHz, mJ	> 90 at 710 nm	> 180 at 700 nm
	> 125 at 750 nm	> 250 at 750 nm
	> 200 at 800 nm	> 400 at 800 nm
	> 100 at 850 nm	> 200 at 850 nm
	> 75 at 890 nm	> 150 at 900 nm
Average Output Power, W	> 0.2	> 0.4
Linewidth of Laser Emission, nm	< 1.2	
Range of Pulse Repetition Rate	single pulse - 1 kHz	
Pulse Duration (FWHM), ns	< 7	< 6
Pulse-to-Pulse Stability- StdDev/Mean	< 2%	
Long-term Stability (Av. Power (RMS) / Av. Power)	< 4% / 8 hrs	
Beam Profile	TEM <sub>00</sub>	
Beam Diameter (1/e <sup>2</sup> , at output aperture)	1 ± 0.2	
Beam Divergence (full angle, 1/e <sup>2</sup> ), mrad	< 1.6	
Beam Quality, M <sup>2</sup>	< 1.2	
Polarization Linearity	> 100:1, horizontal (< 5°)	
Dimensions* (LxHxW), mm	Laser Head	237 x 56 x 165
	Power Supply	198 x 100 x 230
Weight*, kg	Laser Head	3 ± 0.1
	Power Supply	3.5 ± 0.1
Operation Voltage, V	24 ± 10%	
Max. Current Consumption, A	< 6	< 8
Max. Power Consumption, W	< 140	< 210
Typical Power Consumption, W	< 90	< 135

Unless stated otherwise, parameters are specified at 800 nm, 1 kHz repetition rate.

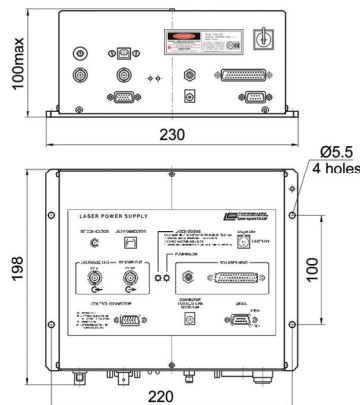
All specifications may change without notice.

\* without Fan Heat Sink

Drawing of Laser Head



Drawing of Power Supply



**ISO 9001:2008  
certified**

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