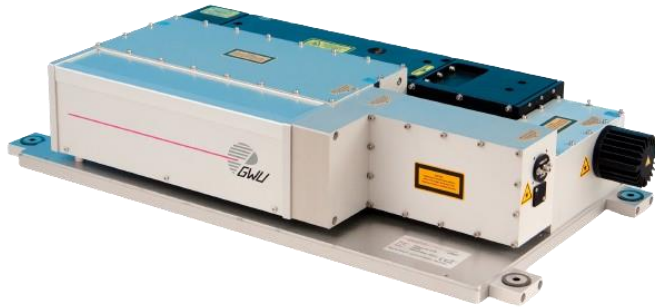


Peacock

Integrated Tunable Laser-OPO System



The Peacock is a compact, single-box, all integrated, pulsed Laser-OPO system. State-of-the-art laser technology paired with GWU's latest OPO technology provide high-efficient near IR laser output.

The Peacock is driven by a rugged flash-lamp pumped solid-state Nd:YAG laser providing high-energy pulses at 532 nm and a pulse repetition rate of up to 30 Hz. Following GWU's design philosophy, the integrated OPO is using a soft pumping scheme with low fluence, ensuring maximum reliability and lifetime. The wavelength can be tuned from 680 nm to 2200 nm, offering a pulse energy of up to 35 mJ. Our new, extremely fast tuning technology allows for fully automated shot-to-shot change of the wavelength, arbitrary across the available range. The output is prepared for factory-configured or customer-defined fiber coupling but can also be used free-space.

The Peacock is a worry-free tool for all users in medical, biotechnology or spectroscopy applications. Especially for photoacoustic imaging, the analog and digital real-time energy and wavelength monitoring signals can be of great benefit. The rugged and turn-key design, paired with an intuitive GUI and programming interface, ensure convenient usability and best reliability.

Peacock Specification

	Peacock 532		
Repetition Rate	10 Hz	20 Hz	30 Hz
Input Energy @ 532 nm	130 mJ	130 mJ	110 mJ
Output Energy @ 725 nm	35 mJ	33 mJ	25 mJ
Beam Diameter at Exit Aperture	6 mm		
Tuning Range Signal Wave	680 nm – 980 nm		
Tuning Range Idler Wave	1150 nm – 2200 nm		
Linewidth @ 725 nm ¹	< 3 nm		
OPO Pulse Width	< 9 ns		

¹: Depends on wavelength

Features and Benefits

All integrated Laser-OPO platform

Fast, shot-to-shot wavelength tuning

Real-time OPO energy signals

Fully automated for hands-free operation

Fiber-delivery or free-space output

Integrated wavelength measurement

Soft pumping scheme for high reliability and long lifetime

Applications

- Medical & Biotechnology
- Photoacoustic Imaging
- Spectroscopy
- Remote Sensing
- Multiphoton interactions

Notes

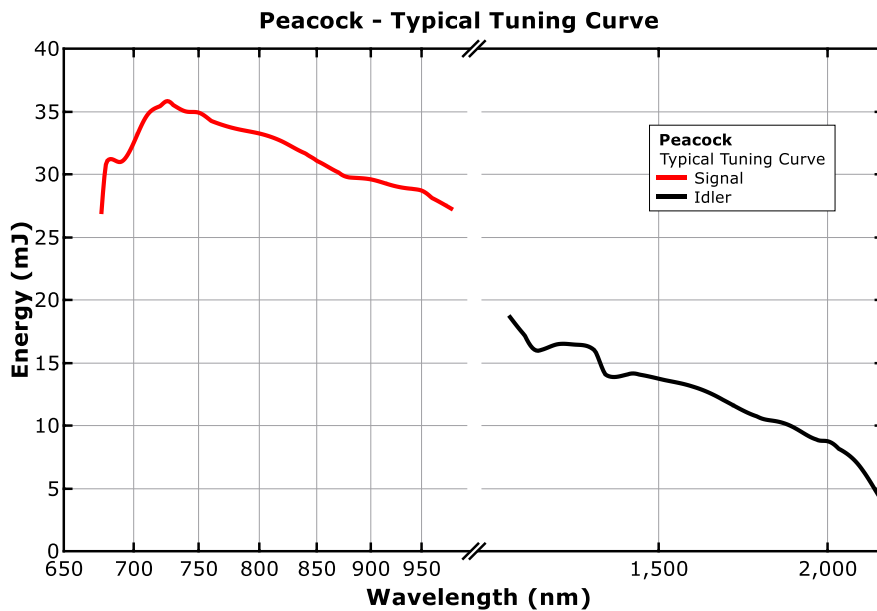
All specifications are subject to change without notice. The Peacock is a joint product of GWU-Lasertechnik and Quantel by Lumibird.



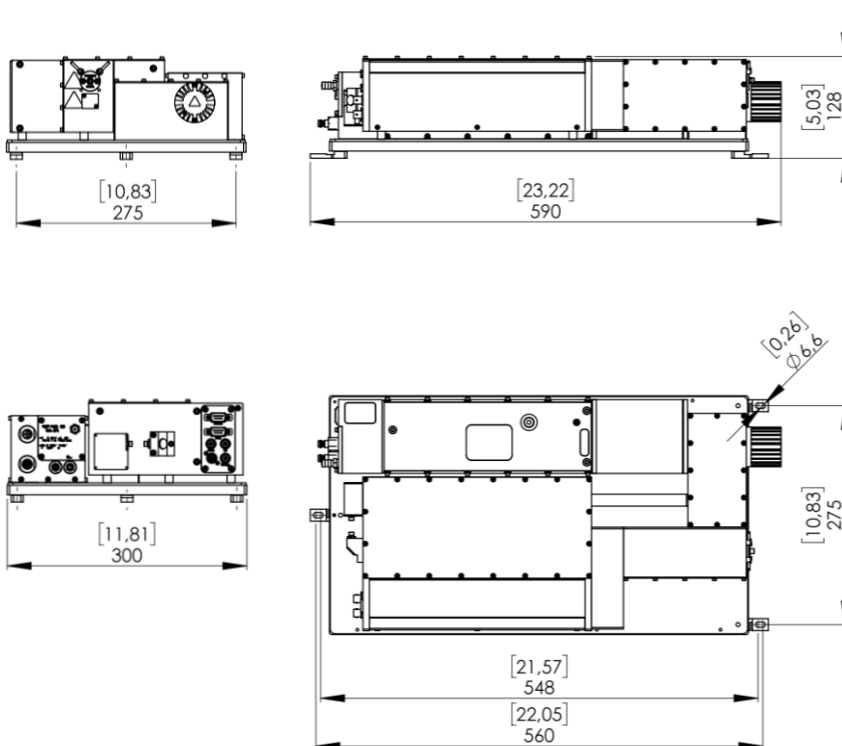
Scan Me!

Peacock Performance

Typical performance at 10 Hz repetition rate, not a guaranteed or warranted specification



Peacock Dimensions



Mechanical + Utilities

Size OPO body
(L x W x H):
590 x 300 x 128 mm³

For dimensions with feet, and other protruding elements please refer to the dimensional drawing

Electric requirements:
100-240 VAC, 50-60 Hz
single phase

All dimensions in mm [inch]

