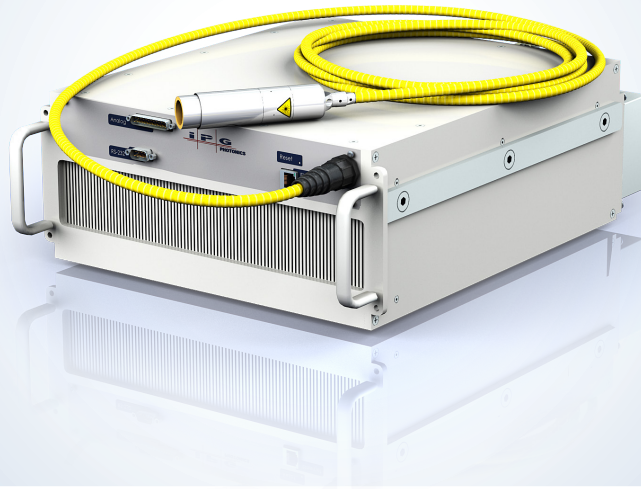


# TLM-50/500-QCW

## Quasi-CW Thulium Fiber Laser

NEW PRODUCT



### Applications

- ▶ Open and Endoscopic Surgery in Urology
- ▶ General Surgery
- ▶ Lithotripsy and Percutaneous Urinary Lithotripsy



### Features

- ▶ Wavelength 1880-2100 nm
- ▶ Pulse Energy up to 5 mJ
- ▶ Peak Power 500 W Pulse
- ▶ Duration 0.2-10 ms

IPG Photonics' has expanded its quasi-continuous wave (QCW) fiber laser series to longer wavelengths. IPG's TLM-50/500-QCW Thulium quasi-cw fiber laser provides up to 5 mJ per 1 millisecond pulse at 2 microns. These compact energy efficient and reliable lasers are designed for integration into medical devices for surgical procedures using open, laparoscopic and endoscopic inclusion, excision, resection, ablation, vaporization, coagulation and hemostasis of soft tissue in urology, urinary lithotripsy and general surgery. Dual wavelength 2.1 and 1.94 micron models are available upon request.

# TLM-50/500-QCW

## Quasi-CW Thulium Fiber Laser

### Optical Characteristics

Wavelength <sup>1</sup> , nm	1940 <sup>2</sup> ; typ. 1880 min., 2100 max.
Emission Bandwidth FWHM, nm	<10
Mode of Operation	Pulsed/ CW
Pulse Repetition Rate, Hz	Single Pulse -100
Max. Average Power, W	50
Max. Peak Power, W	500
Max. Pulse Energy, J	5 @ 10 ms
Pulse Duration, ms	0.2-10
Power Tunability, %	10-100
Power Stability <sup>3</sup> , %	±2.5
Output Fiber Core Diameter, μm	100
Fiber NA	0.22

<sup>1</sup> Other wavelengths in the specified range are available upon request. Please contact IPG for more details.

<sup>2</sup> Dual wavelength modules are available upon request. Please contact IPG for more details.

<sup>3</sup> Over 1 hour

### General Characteristics

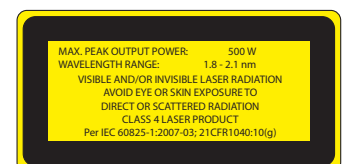
Pilot Beam Wavelength, nm	532
Pilot Beam Power, mW	<5
Dimensions <sup>4</sup> , mm	336 x 435 x 148
Weight, kg	<25
Cooling	Air-cooled
Supply Voltage, VDC	48
Power Consumption	500

<sup>4</sup> TLR-50/500-QCW Rack-mounted units are available upon request. Please contact IPG for more details.

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