

# 9xxnm, 400µm, Conduction-Cooled, Fiber-Coupled, Multi-Bar Module

## Features

- Conduction-cooled diode laser bars inside
- Single wavelength
- High coupling efficiency
- Scalable output power
- Industrial water cooling

## Optional Accessories

- Integrated pointer laser and power meter
- Integrated NTC temperature sensor
- Fiber detection sensor



## Device Specification

Optical Parameters <sup>1</sup>	Units			
Center Wavelength Range <sup>3</sup>	nm		9xx	
Center Wavelength Tolerance	nm		±3	
Output Power <sup>2</sup>	W	300	400	500
Spectral Width (FWHM)	nm		<4	
Slope Efficiency	W/A	>7	>8	>10
Wavelength Temp. Coefficient	nm/°C		~0.34	

Fiber Parameters		
Numerical Aperture	NA	0.22
Fiber Core Diameter	µm	400
Fiber Connector		QBH/HighYAG

Electrical Parameters <sup>1</sup>				
Power Conversion Efficiency	%		>45	
Threshold Current (I <sub>TH</sub> )	A		<7.5	
Operating Current (I <sub>OP</sub> )	A		<60	
Operating Voltage (V <sub>OP</sub> )	V	<16	<20	<24

Thermal Parameters				
Operating Temperature <sup>2, 3, 4</sup> (Cooling Plate)	°C		+20 to +25	
Operating Temperature <sup>2, 3, 4</sup> (Diode Laser Module)	°C		+30 to +35	
Storage Temperature <sup>3, 4</sup>	°C		0 to +55	
Coolant Flow Rate	l/h		250 to 400	
Operating Water Temperature	°C		+20 to +25	
Maximum Particle Size	µm		<10	
Recommended Cooling Capacity	W	>660	>800	>940

<sup>1</sup>Data at 20°C cold plate temperature, unless otherwise stated.

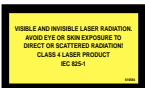
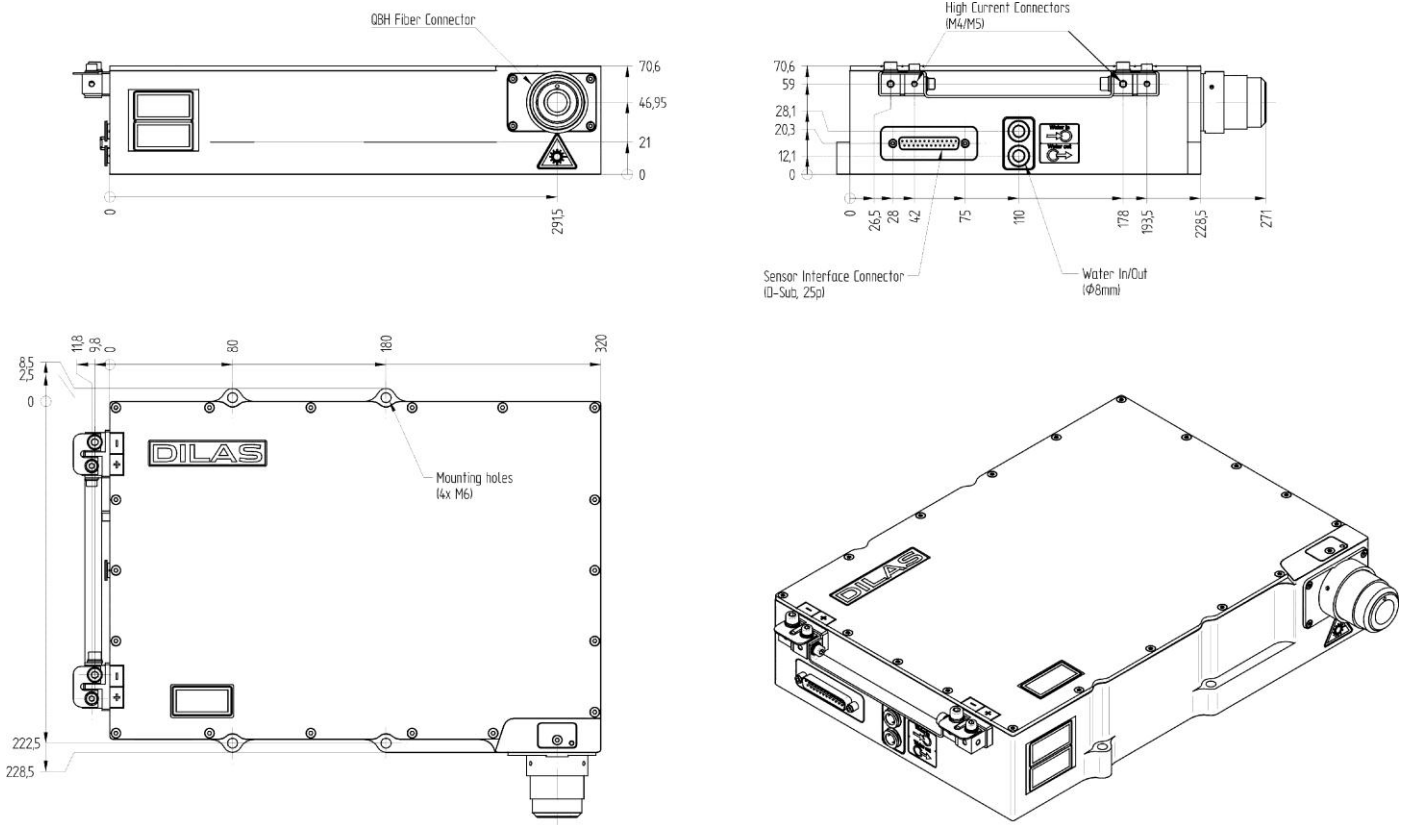
<sup>2</sup>Reduced lifetime if used above nominal operating conditions.

<sup>3</sup>Others available upon request.

<sup>4</sup>A non-condensing environment is required for storage and operation below the ambient dew point.

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## Package Dimension



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