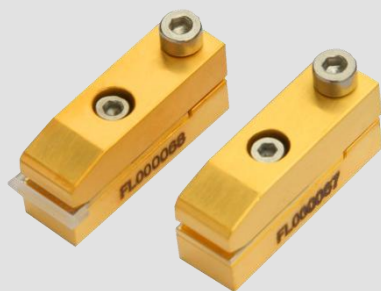


# FocusEngine™

## Micro-Channel Water Cooled Single Bar Diode Laser (CW)

MCC09



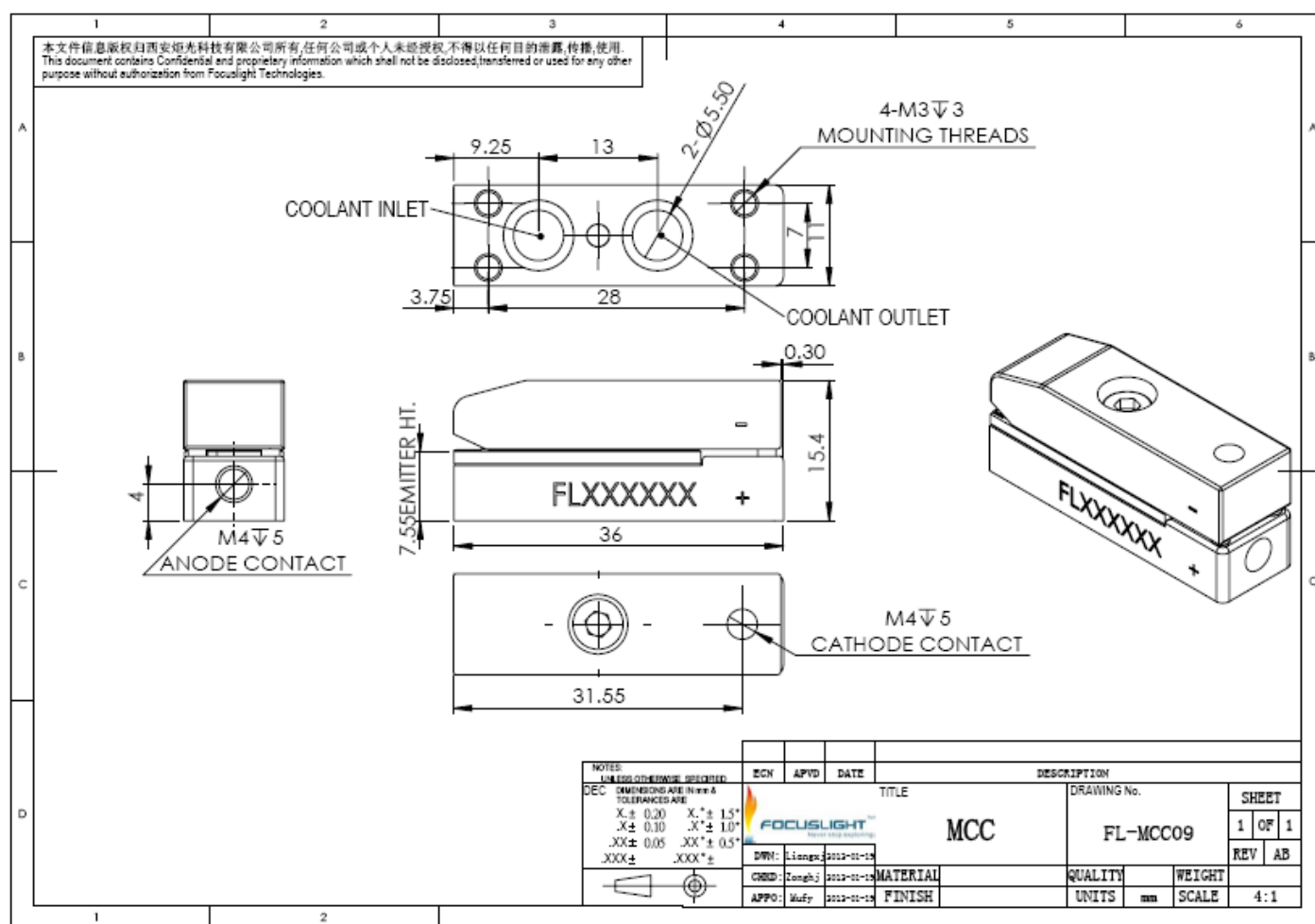
### Features

- Long lifetime
- Low smile
- High power
- Narrow spectrum

### Applications

- Pumping
- Scientific research
- Industry

## Device Dimension (mm)



This structure drawing is only for reference. For any other special requirement, please feel free to contact us.

## Specification

Module Type <sup>1</sup>	Units	FL-MCC09-100-808	FL-MCC09-120-976
<b>Optical <sup>2</sup></b>			
Center Wavelength $\lambda$	nm	808	976
Wavelength Tolerance	nm	$\pm 3$	$\pm 5$
Output Power	W	100	120
Number of the bar	-	1	1
Number of the bar available	-	1~2	1~2
Spectral Width FWHM	nm	$\leq 4$	$\leq 5$
Spectral Width FW90%E	nm	$\leq 6$	$\leq 8$
Fast Axis Divergence(FWHM) <sup>3</sup>	degree	35	35
Slow Axis Divergence (FWHM)	degree	8	8
Polarization Mode	-	TE/TM	TE
Wavelength Temp. Coefficient	nm/°C	$\sim 0.28$	$\sim 0.34$
<b>Electrical Parameters</b>			
Operating Current $I_{op}$	A	$\leq 120$	$\leq 120$
Threshold Current $I_{th}$	A	$\leq 25$	$\leq 20$
Operating Voltage $V_{op}$ <sup>4</sup>	V	$\leq 2$	$\leq 2$
Slope Efficiency <sup>4</sup>	W/A	$\geq 1.0$	$\geq 1.1$
Power Conversion Efficiency	%	$\geq 48$	$\geq 55$
<b>Thermal Parameters</b>			
Operating Temperature <sup>5</sup>	°C	20~30	20~30
Storage Temperature <sup>6</sup>	°C	0~55	0~55
Coolant	-	DI Water	DI Water
Flow Rate <sup>4</sup>	L/min	0.3-0.4	0.3-0.4
Max Inlet Pressure	kPa	380	380
Conductivity	$\mu S/cm$	$< 5$	$< 5$

<sup>1</sup> FL(abbreviation of Focuslight) -MCC09(structure code) -100(output power) -808(center wavelength).

<sup>2</sup> Data at 25°C temperature, unless otherwise stated.

<sup>3</sup> For fast axis collimation: divergence  $\leq 0.5^\circ$ .

<sup>4</sup>Parameters for single Bar.

<sup>5</sup>.Reduced lifetime if used above nominal operating conditions.

<sup>6</sup>A non-condensing environment is required for storage and operation below ambient dew point.

If there are any other requirements, please contact us.



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