

MCH Series 300ps SLM Microchip Laser



Applications

- Seed laser
- Micromachining
- Raman spectroscopy
- Laser ranging
- Laser-induced fluorescence (LIF)
- Laser ultrasonic imaging
- Bio-photonics
- Photolithography

Key Features

- ◆ Pulse width down to 300ps
- ◆ High energy stability
- ◆ Repetition rate up to 100kHz
- ◆ Spatial mode TEM₀₀
- ◆ Polarization-stable

Technical Specifications

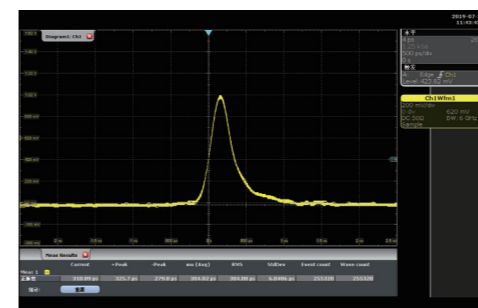
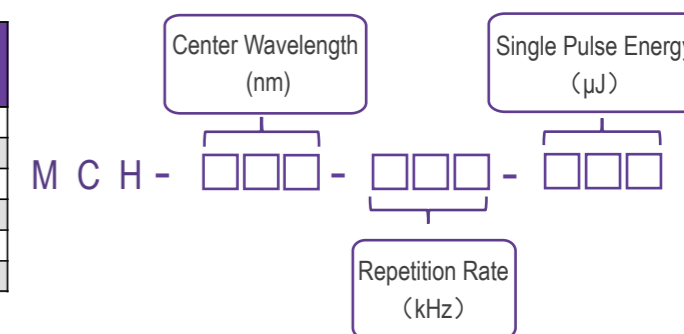
Optical Parameters						
Wavelength (nm)	1064			532		
Repetition rate (kHz)	20	50	100	20	50	100
Average power (mW)	60	100	100	30	50	50
Pulse energy (μJ)	3	2	1	1.5	1	0.5
Pulse width (ps)	350		500	300		500
Power stability (8h)	±3%					
Beam profile	TEM ₀₀					
Beam full divergence (typ., mrad)	Horizontal @1/e ²	25	30	16	25	
	Vertical @1/e ²	25	30	16	25	
Polarization ratio	>100:1					
System Parameters						
Supply power voltage	100-240 VAC, 50/60 Hz					
Control interface	RS232, USB					
Power consumption (W)	≤35	≤40	≤40	≤35	≤40	≤40
Power dimensions (W×H×L,mm)	168×88×140					
Laser head dimensions (W×H×L,mm)	45×33×120					
Operation temperature (°C)	15-35					
Storage temperature (°C)	0-60					

1. Wavelengths of 355nm and 266nm are available upon request.
2. Other repetition rates can be customized.
3. As products are constantly being updated, the right of final interpretation of technical specifications or illustrations in datasheet belongs to RealLight.

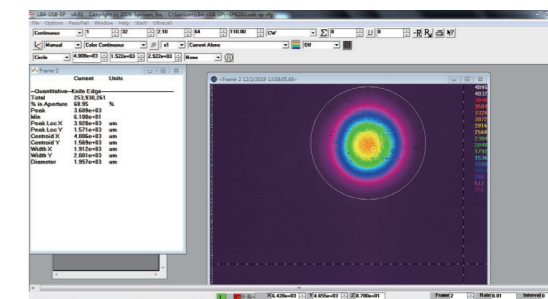
Order Information

Wavelength (nm)	Part Number	Repetition rate (kHz)	Pulse energy (μJ)
1064	MCH-1064-20-003	20	3
	MCH-1064-50-002	50	2
	MCH-1064-100-001	100	1
532	MCH-532-20-1.5	20	1.5
	MCH-532-50-001	50	1
	MCH-532-100-0.5	100	0.5

Part Numbering Schema

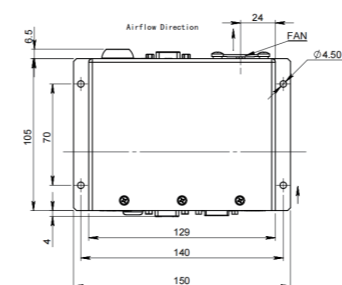
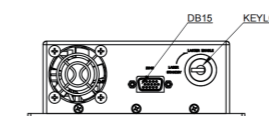
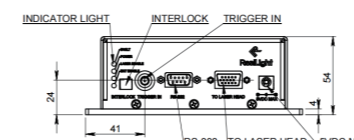


Typical Pulse

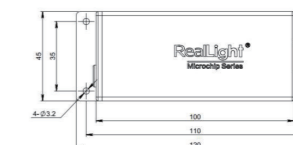


Beam Profile

Mechanical Drawings (in mm)



Power Supply



Laser Head

