355nm Nd:YAG q-switched nanosecond laser **MA Microchip laser system**



DESCRIPTION

Our 355nm laser is based on the technology of diode pump laser module and q-switch. Nd:YAG crystal is used to manufacture 355nm laser. ULaser can provide 1.5ns, 1ns, 500ps, 550ps and 300ps 355nm microchip laser.

Our 355nm microchip laser has narrow laser pulse width. At the same time, it has high pulse repetition frequency. As a microchip laser, its size is small and its weight is light certainly. Our laser's beam quality is excellent.

As a uv laser, 355nm microchip laser plays an important role in many fields. It can be used in environment monitoring systems, 3d dental scan, laser ultrasound, laser ionization mass spectrometry and so on.

FEATURES

- Pulse width up to 1ns
- Pulse energy up to 200µJ
- Repetition frequency up to 20kHz
- Beam mode is TEM₀₀
- Fully sealed design, high reliability

APPLICATIONS

- Lidar
- Laser ranging
- Atmospheric monitoring
- Laser ultrasonic inspection
- Optical metrology
- Laser-induced fluorescence

OUTLINE SIZE(mm)









Ulaser









DANGER

ASS 4 LASER RADIATI HEN OPEN AVOID EYE O KIN EXPOSURE TO DIREC OR SCATTERED RADIATIO SSEIED PER IEC 60825



WARNING

55 3B LASER RADIAT WHEN OPEN AVOID **KPOSURE TO THE BEAM**

Model		UL355-1kHz-30µJ-MA005	UL355-5kHz-10µJ-MA006	UL355-10kHz-5µJ-MA007	UL355-20kHz-3µJ-MA008
Optical parameter	Wavelength (nm)	355	355	355	355
	Repetition frequency (kHz)	1*	5*	10*	20*
	Average power (mW)	30	50	50	60
	Output energy (µJ)	30	10	5	3
	Pulse width (ps)	1500	1200	1200	1200
	Power stability (8h)	±3%	±3%	±3%	±3%
	Beam mode	TEM00	TEM ₀₀	TEM ₀₀	TEM00
	Full-angle divergence angle Typ. (Mrad) level $@1/e^2$	5	5	5	5
	Vertical @1/e ²	5	5	5	5
	Polarization characteristics	> 100:1	> 100:1	> 100:1	> 100:1
System parameters	System power consumption (W)	≤35	≤35	≤35	≤35
	Power input	100-240 VAC, 50/60Hz	100-240 VAC, 50/60Hz	100-240 VAC, 50/60Hz	100-240 VAC, 50/60Hz
	Control interface	RS232, USB	RS232, USB	RS232, USB	RS232, USB
	Power supply size (W×H×L, mm)	168×88×140	168×88×140	168×88×140	168×88×140
	Laser head size (W×H×L, mm)	45×30×120	45×30×120	45×30×120	45×30×120
	Working temperature (°C)	15-35	15-35	15-35	15-35
	Storage temperature (°C)	0-60	0-60	0-60	0-60

1.*The light outlet of the laser head is side outlet. See the mechanical dimension drawing for details

2. Customized internal beam expansion function to meet the requirements of small divergence angle (less than 2mrad)





355nm Nd:YAG q-switched picosecond laser MC Microchip laser system

OUTLINE SIZE(mm)



DESCRIPTION

Our 355nm laser is based on the technology of diode pump laser module and q-switch. Nd:YAG crystal is used to manufacture 355nm laser. ULaser can provide 1.5ns, 1ns, 500ps, 550ps and 300ps 355nm microchip laser.

Our 355nm microchip laser has narrow laser pulse width. At the same time, it has high pulse repetition frequency. As a microchip laser, its size is small and its weight is light certainly. Our laser's beam quality is excellent.

As a uv laser, 355nm microchip laser plays an important role in many fields. It can be used in environment monitoring systems, 3d dental scan, laser ultrasound, laser ionization mass spectrometry and so on.

FEATURES

- Pulse width up to 550ps
- Pulse energy up to 120µJ
- High polarization direction stability
- Maximum repetition rate up to 10kHz
- Beam mode is TEM
- · Fully sealed design, high reliability

APPLICATIONS

- Seed source
- Micromachining
- Biomedical science
- Laser ultrasonic inspection
- · Laser ionization mass spectrometry
- Optical parametric oscillating pump source









Ulaser









DANGER

ASS 4 LASER RADIATIO EN OPEN AVOID EVE OR V EXPOSURE TO DIREC



WARNING 3B LASER RADIAT WHEN OPEN AVOID SURE TO THE BEAM

Model		UL355-1kKHz-20µJ-MC005	UL355-5kHz-10µJ-MC006	UL355-10kHz-5µJ-MC007
Optical parameter	Wavelength (nm)	355	355	355
	Repetition frequency (kHz)	1*	5*	10*
	Average power (mW)	20	50	50
	Output energy (µJ)	20	10	5
	Pulse width (ps)	650	650	650
	Power stability (8h)	±3%	±3%	±3%
	Beam mode	TEM00	TEM00	TEM ₀₀
	Full-angle divergence angle Typ. (Mrad) level $@1/e^2$	5	8	8
	Vertical @1/e ²	5	8	8
	Polarization characteristics	> 100:1	> 100:1	> 100:1
	System power consumption (W)	≤25	≤25	≤30
System parameters	Power input	100-240 VAC, 50/60Hz	100-240 VAC, 50/60Hz	100-240 VAC, 50/60Hz
	Control interface	RS232, USB	RS232, USB	RS232, USB
	Power supply size (W×H×L, mm)	168×88×140	168×88×140	168×88×140
	Laser head size (W×H×L, mm)	45×30×120	45×30×120	45×30×120
	Working temperature (°C)	15-35	15-35	15-35
	Storage temperature (°C)	0-60	0-60	0-60

1.*The light outlet of the laser head is side outlet. See the mechanical dimension drawing for details

2. Customized internal beam expansion function to meet the requirements of small divergence angle (less than 2mrad)





355nm Nd:YAG q-switched picosecond laser **MD Microchip laser system**



DESCRIPTION

Our 355nm laser is based on the technology of diode pump laser module and q-switch. Nd:YAG crystal is used to manufacture 355nm laser. ULaser can provide 1.5ns, 1ns, 500ps, 550ps and 300ps 355nm microchip laser.

Our 355nm microchip laser has narrow laser pulse width. At the same time, it has high pulse repetition frequency. As a microchip laser, its size is small and its weight is light certainly. Our laser's beam quality is excellent.

As a uv laser, 355nm microchip laser plays an important role in many fields. It can be used in environment monitoring systems, 3d dental scan, laser ultrasound, laser ionization mass spectrometry and so on.

FEATURES

- Pulse width up to 550ps
- Pulse energy up to 120µJ
- · High polarization direction stability
- · Maximum repetition rate up to 10kHz
- Beam mode is TEM
- Fully sealed design, high reliability

APPLICATIONS

- Seed source
- Micromachining
- Fluorescence lifetime measuremen
- Laser-induced fluorescence
- Laser ionization mass spectrometry
- Non-linear optical measurement

OUTLINE SIZE(mm)









Ulaser









DANGER

LASS 4 LASER RADIATIO HEN OPEN AVOID EYE OF KIN EXPOSURE TO DIRECT OR SCATTERED RADIATIO ASSEIED PER JEC 60825-1-20



WARNING SS 3B LASER RADIATIO WHEN OPEN AVOID XPOSURE TO THE BEAN

Model		UL355-0.1k⊦
	Wavelength (nm)	355
	Repetition frequency (kHz)	0.1*
	Average power(mW)	1.5
	Output energy (µJ)	15
Optical parameter	Pulse width (ps)	300
Optical parameter	Power stability (8h)	±3%
	Beam mode	TEM00
	Full-angle divergence angle Typ. (Mrad) level $@1/e^2$	8
	Vertical @1/e ²	8
	Polarization characteristics	> 100:1
System parameters	System power consumption (W)	≤25
	Power input	100-240 VA0
	Control interface	RS232、USB
	Power supply size (W×H×L, mm)	168×88×140
	Laser head size (W×H×L, mm)	45×30×120
	Working temperature (°C)	15-35
	Storage temperature (°C)	0-60

1.*The light outlet of the laser head is side outlet. See the mechanical dimension drawing for details

2. Customized internal beam expansion function to meet the requirements of small divergence angle (less than 2mrad)





-15μJ-MD002
C,50/60Hz
0

355nm Nd:YAG q-switched picosecond laser **MO Microchip laser system**



DESCRIPTION

Our 355nm laser is based on the technology of diode pump laser module and q-switch. Nd:YAG crystal is used to manufacture 355nm laser. ULaser can provide 1.5ns, 1ns, 500ps, 550ps and 300ps 355nm microchip laser.

Our 355nm microchip laser has narrow laser pulse width. At the same time, it has high pulse repetition frequency. As a microchip laser, its size is small and its weight is light certainly. Our laser's beam quality is excellent.

As a uv laser, 355nm microchip laser plays an important role in many fields. It can be used in environment monitoring systems, 3d dental scan, laser ultrasound, laser ionization mass spectrometry and so on.

FEATURES

- Maximum repetition rate up to 100kHz
- Pulse width up to 500ps
- Pulse energy up to 5µJ
- Single longitudinal mode
- Beam mode is TEM
- High polarization direction stability

APPLICATIONS

- Laser processing
- Seed source
- Analysis instrument
- Bioluminescent molecule

OUTLINE SIZE(mm)



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44.5







Ulaser

Optical fiber output size diagram

250

Wavelength (nm) 355 Repetition frequency (Hz) 1-200 Maximum output energy of space beam (µJ) 25 Fiber Coupling Maximum Output Energy (µJ) 20 Pulse width (ns) ≤1 Energy Stability(rms) <3% Energy Regulation Step Accuracy <2% Beam mode (spatial beam output) TEM ₀₀ Full-angle divergence angle Typ. (Mrad) level @1/e ² <2 Vertical @1/e ² <2 Polarization characteristics >100:1 Fiber parameters (fiber coupled output optional) 200µµ/0.2 System parameters Power input 24V DC Modulation input TTL0-5V,S Control interface RS232 System Peak Power Consumption (W) <10 200µW/0.2 System Average Power Consumption (W) <10 200µW/0.2 Quer size (W × H × L, mm) 82×102.8> Norking temperature (°C) 15-35	Model		UL355-200H
Repetition frequency (Hz) 1-200 Maximum output energy of space beam (µJ) 25 Fiber Coupling Maximum Output Energy (µJ) 20 Pulse width (ns) <1		Wavelength (nm)	355
Optical parameter Maximum output energy of space beam (µJ) 25 Fiber Coupling Maximum Output Energy (µJ) 20 Pulse width (ns) <1		Repetition frequency (Hz)	1-200
Optical parameterFiber Coupling Maximum Output Energy (µJ)20Pulse width (ns)<1		Maximum output energy of space beam (µJ)	25
Optical parameter Pulse width (ns) <1		Fiber Coupling Maximum Output Energy (µJ)	20
Optical parameterEnergy Stability(ms)<3%Energy Regulation Step Accuracy<2%		Pulse width (ns)	≤1
System parameters Energy Regulation Step Accuracy <2%	Optical parameter	Energy Stability(rms)	≤3%
Beam mode (spatial beam output) TEM ₀₀ Full-angle divergence angle Typ. (Mrad) level @1/e ² <2	Optical parameter	Energy Regulation Step Accuracy	≤2%
Full-angle divergence angle Typ. (Mrad) level @1/e ² <2		Beam mode (spatial beam output)	TEM ₀₀
Vertical @1/e ² <2		Full-angle divergence angle Typ. (Mrad) level @1/e ²	≤2
Polarization characteristics ≥100:1 Fiber parameters (fiber coupled output optional) 200µm/0.2 Power input 24V DC Modulation input TTL0-5V,S Control interface RS232 System Peak Power Consumption (W) <20		Vertical @1/e ²	≤2
Fiber parameters (fiber coupled output optional)200µm/0.2Power input24V DCModulation inputTTL0-5V,SControl interfaceRS232System Peak Power Consumption (W)<10		Polarization characteristics	≥100:1
Power input24V DCModulation inputTTL0-5V,SControl interfaceRS232System Peak Power Consumption (W)< 20		Fiber parameters (fiber coupled output optional)	200µm/0.22
System parametersModulation inputTTL0-5V,SControl interfaceRS232System Peak Power Consumption (W)<20		Power input	24V DC
System parametersControl interfaceRS232System Peak Power Consumption (W)<20		Modulation input	TTL0-5V,SM
System parametersSystem Peak Power Consumption (W)< 20System Average Power Consumption (W)< 10		Control interface	RS232
System parameters System Average Power Consumption (W) < 10	System parameters	System Peak Power Consumption (W)	< 20
Laser size (W × H × L, mm)82×102.8>Working temperature (°C)15-35Storage temperature (°C)0-60	System parameters	System Average Power Consumption (W)	< 10
Working temperature (°C)15-35Storage temperature (°C)0-60		Laser size (W \times H \times L, mm)	82×102.8×2
Storage temperature (°C) 0-60		Working temperature (°C)	15-35
		Storage temperature (°C)	0-60

1. The supported operating frequency is 16~200Hz in continuous mode and burst mode.

2. Fiber core diameter: 200µm.

3. The power supply adapter is shipped with matching power supply, which can support 90~260VAC power supply input.





z-25/20µJ-MO002
A
B connector
40(space)/ 82x79x250(optical fiber)

