

Φ4mm 635nm Red Laser Module

Features:

- Smallest size for Φ4*10mm
- APC (auto power control) Driver Circuit
- High quality glass lens for beam

Applications:

- Industrial areas / Medical
- Biochemical / Laser Tag

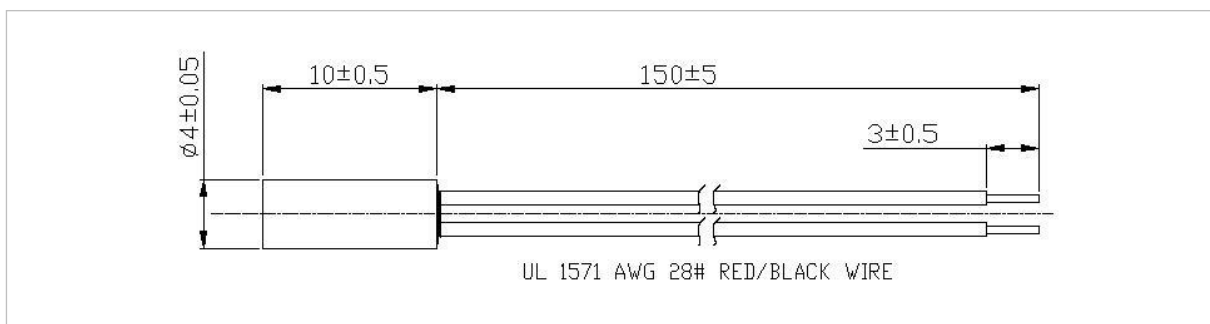


Optical and Electrical Characteristics:

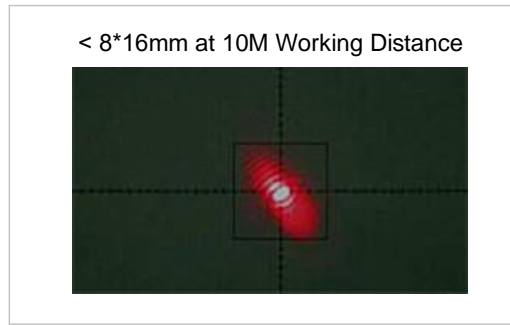
(TC = 25°C, unless otherwise specified)

Item	Symbol	High End
Mode		CW
Wavelength	λ	635nm
Size	mm	D4X10mm
Lens		Glass
Spot Size	D	<8*16mm at 10m
Output Power	mW	<0.39mW, <1mW, <5mW
Operating Voltage	V	3V/5V DC
Operation Current	mA	10~42mA, 50mA Max
Power Stability		<5%
Divergence Angle	mrad	<0.7
Operating Temperature	To	-10°C ~ +50°C
Storage Temperature	Ts	-40°C ~ +85°C
Housing Material		Aluminum
Mean Time to Failure	H	>8,000 hrs

Mechanical Drawing:



Spot Size Define:



Ordering Code:

H	4	3	635	5	D	C	C	Options
Series	Diameter	Voltage	Wavelength	Output Power	Laser Pattern	Power Option	Focus	
H: High End	3=φ3.3mm	1=1.5VDC	395nm	05=<0.39mw	D=Dot/Ellipse	C=CW ,two wire On/Off	C=Collimated	Waterproof
S: Standard	4=φ4mm	2=2.6VDC	405nm	1=<1mW	Lxx= PMMA Line xx (xx=Fan angle)	T=TTL, by third wire Active high (Power adjustment With PWM)	F=Focusable	Coaxiality
	5=φ5mm	3=3VDC	450nm	5=<5mW	Cxx=PMMA Cross xx	A= Analog,by third wire Active high (Power adjustment With Voltage)	Fxx=Focussed to dd (dd=Distance)	Connector
	6=φ6mm	5=5VDC	488nm	10=<10mW	GLxx=GLASS Line xx	N= Without Driver PCB		OME Customer
	8=φ8mm	7=7VDC	505nm	30=<30mW	GCxx=GLASS Cross xx	more		Housing Material
	9=φ9mm	9=9VDC	520nm	50=<50mW	Pxx=Powell Line xx (Uniform Line)			more
	A=φ10mm	A=12VDC	635nm	100=<100mW	DOEyy=DOE Pattern yy (yy=DOE NO.)			
	B=φ12mm	B=24VDC	650nm	150=<150mW	S=Special Pattern			
	C=φ14mm	more	660nm	200=<200mW	more			
	D=φ16mm		670nm	500=<500mW				
	E=φ18mm		685nm	1000=<1000mW				
	more		780nm	more				
			808nm					
			850nm					
			905nm					
			940nm					
			980nm					
			1310nm					
			1550nm					
			more					

Laser Safety:

-CLASS I

The maximum permissible exposure (MPE) cannot be exceeded, it includes High-power lasers within an enclosure that prevents exposure to the radiation and that cannot be opened without shutting down the laser. For example, a continuous laser at 600nm can emit up to 0.39mW, but for shorter wavelengths, the maximum emission is lower.

-CLASS II

"Caution", visible laser light less than 1.0mW. Considered eye safe, normal exposure to this type of beam will not cause permanent damage to the retina.

-CLASS IIIA

"Danger", visible laser light between 1.0mW and 5.0mW. Considered eye safe with caution. Focusing of this light into the eye could cause some damage.

-CLASS IIIB

"Danger", infrared (IR), and high power visible lasers considered dangerous to the retina if exposed. NB: It is important to note that while complying with the above classifications, unless otherwise stated, our laser diode products are not certified and are designed solely for use in OEM products. The way in which the device is used in the final product may alter its original design classification, and it is the responsibility of the OEM to ensure compliance with the relevant standards.