



High Power CW Laser Diodes

Product Facts

- 0.5 5 Watts
- High efficiency devices
- Multiple package options
- High reliability
- Long life

Applications

- Diode based medical systems
- Diode pumped solid state lasers
- Analytical equipment
- Illuminators
- Reprographics
- Laser initiated ordnance



These series of High Power CW products are offered with an output range from 0.5 Watt to 5.0 Watts. These devices have a standard wavelength of 808nm \pm 3nm with a spectral width of 2.5nm FWHM.

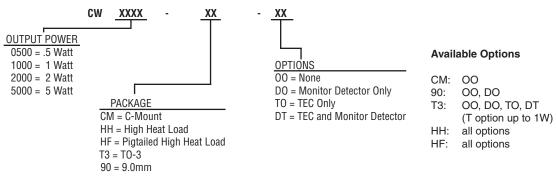
Specification and Limits @ 25° C

Common Characteristics	Unit	Min	Тур	Max
Peak wavelength	nm	-	808	-
Peak wavelength tolerance	nm	-	±3	-
Spectral width (50% points)	nm	-	2.5	-
Rise/fall times	ns	-	1.0	-
Far field beam divergence	deg	-	12x40	-
Efficiency at I _f	%	-	40	-
Operating temperature	°C	-20	-	+30
Storage temperature	°C	-40	-	+85

Single Diode Lasers

Laser Characteristics	Power (watts)	Source Size (µm)	Typical I _{th} (amps)	Max Current (amps)	Typical V _f (volts)
CW 0500 Series	0.5	50	0.15	0.75	2.0
CW 1000 Series	1.0	100	0.3	1.5	2.0
CW 2000 Series	2.0	200	0.6	3.0	2.0
CW 5000 Series	5.0	460	1.3	6.5	2.0

Ordering Information



Laser Safety
Personal Hazard: Direct and prolonged exposure to a laser beam may cause eye damage. Observe precautions
accompanying the product and precautions appropriate to a Class IV laser.

Handling Precautions: Products are subject to the risks normally associated with sensitive electronic devices including static discharge, transients, and overload.

Gallium arsenide lasers emit infrared radiation which is invisible to the human eye. When in use, safety precautions should be taken to avoid the possibility of eye damage. Wear certified eye protection.

For Laser Diode Incorporated technical service, customer support, order information, or to discuss custom device requirements, please contact: Telephone: 732-549-9001 Fax: 732-906-1559 E-mail: sales@laserdiode.com

© Copyright 2004 by Tyco Electronics Corporation. All Rights Reserved. Dimensions are in millimeters with inches in brackets unless otherwise specified. Dimensions are shown for reference purposes only.

155

For technical data or samples, contact Laser Diode Inc. or visit the LDI website at: http://www.laserdiode.com/. Specifications subject to change. Consult Laser Diode Inc. for latest specifications. For other Tyco Electronics fiberoptic products call 1-800-522-6752 or visit http://www.tycoelectronics.com/fiberoptics.