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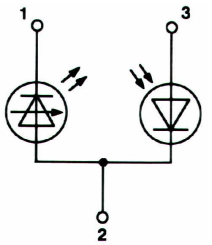
RLT78500G TECHNICAL DATA

High Power Infrared Wavelength Laserdiode

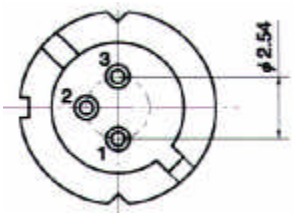
Structure: **AlGaAs/GaAs, Aperture: 50 x 1 µm²**
Lasing wavelength: **785 nm, multimode**
Typ. optical power: **500 mW**
Package: **9 mm**

NOTE!
LASERDIODE
MUST BE COOLED!

PIN CONNECTION:



1) Laser diode cathode
2) Laser diode anode and photodiode cathode
3) Photodiode anode



Absolute Maximum Ratings (Tc=25°C)

CHARACTERISTIC	SYMBOL	RATING	UNIT
LD Reverse Voltage	$V_{R(LD)}$	0.5	V
PD Reverse Voltage	$V_{R(PD)}$	5	V
Operation Case Temperature	T_C	-50 .. +25	°C
Storage Temperature	T_{STG}	-60 .. +70	°C

Optical-Electrical Characteristics (Tc = 25°C)

CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN	TYP	MAX	UNIT
Optical Output Power	P_o	cw		500		mW
Threshold Current	I_{th}	cw	300	350	400	mA
Operation Current	I_{op}	P_o = 500 mW	650	700	750	mA
Operating Voltage	V_{op}	P_o = 500 mW	1.8	2.0	2.2	V
Lasing Wavelength	λ_p	P_o = 500 mW	770	785	790	nm
Beam Divergence	$\theta_{//}$	P_o = 500 mW		8	10	°
Beam Divergence	$\theta_{\perp}$	P_o = 500 mW	30	40	45	°
Monitor Current	I_m	P_o = 500 mW	200	250	400	µA