

980 nm LASER DIODE

DL-LS6002

Tentative

SANYO

Ver.1 July. 2002

Features

- Wavelength : 980 nm (Typ.)
- Light output : 100 mW CW
- Low threshold current : $I_{th} = 15$ mA (Typ.)
- Small aspect ratio : 2.5 (Typ.)

Applications

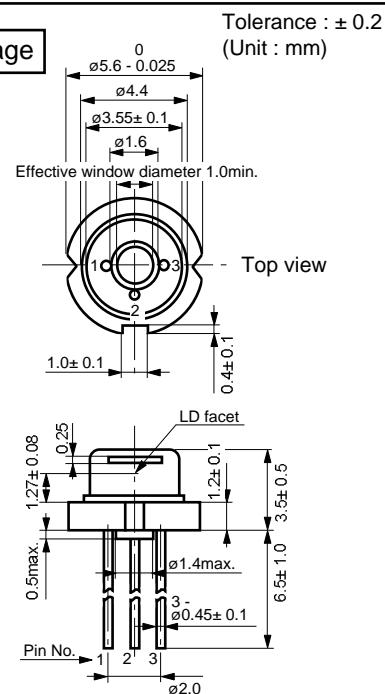
- Erbium-doped fiber amplifiers
- Free space optical communications

Absolute Maximum Ratings

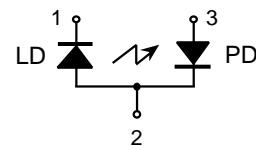
($T_c=25^\circ\text{C}$)

Parameter	Symbol	Ratings	Unit
Light Output	CW	P_o	mW
Reverse Voltage	Laser	2	V
	PD	30	
Operating Temperature	T_{opr}	-10 to +70	°C
Storage Temperature	T_{stg}	-40 to +85	°C

Package



Pin Connection



Electrical and Optical Characteristics

^{1) 2)}

($T_c=25^\circ\text{C}$)

Parameter	Symbol	Condition	Min.	Typ.	Max.	Unit
Threshold Current	I_{th}	CW	-	15	25	mA
Operating Current	I_{op}	$P_o=100\text{mW}$	-	130	160	mA
Operating Voltage	V_{op}	$P_o=100\text{mW}$	-	1.8	2.2	V
Lasing Wavelength	λ_p	$P_o=100\text{mW}$	970	980	990	nm
Beam Divergence ³⁾	Perpendicular	$P_o=100\text{mW}$	18	23	28	°
	Parallel	$P_o=100\text{mW}$	7	9	11	°
Off Axis Angle	Perpendicular	dQ_v	-	-	± 3	°
	Parallel	dQ_h	-	-	± 3	°
Differential Efficiency	dP_o/dI_{op}	-	-	0.9	-	mW/mA
Monitoring Output Current	I_m	$P_o=100\text{mW}$	-	-	-	mA

1) Initial values 2) All the above values are evaluated with Tottori Sanyo's measuring apparatus

3) Full angle at half maximum

Note : The above product specification are subject to change without notice.