LD65I7S-A/B/C-H

InGaAlP Laser Diode

Quantum Semiconductor International Co., Ltd.

Ver. 1 Jan. 2012

♦OVERVIEW

LD65I7S-A/B/C-H is a MOCVD grown 650nm band *InGaAlP* laser diode with quantum well structure.

It's an attractive light source, with a typical light output power of 35mW for optoelectronic devices such as DVD-RAM and Inderstrial Sensor.

♦APPLICATION

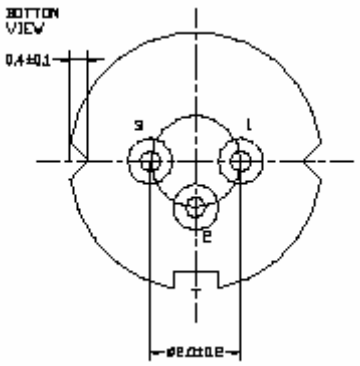
- Inderstrial Sensor
- DVD-RAM

♦FEATURES

- Visible Light Output : λp = 658 nm(typ.)
- Optical Power Output : 35mW CW
- Package Type : TO-18 (5.6mmϕ)
- Built-in Photo Diode for Monitoring Laser Diode

♦ELECTRICAL CONNECTION

Bottom View



Pin Configuration

A	LD cathode, PD anode (Fig. 1)
B	LD , PD anode (Fig. 2)
C	LD anode, PD cathode (Fig. 3)

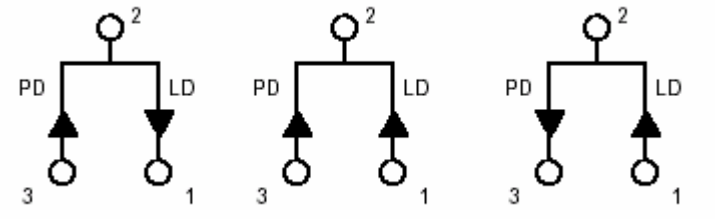


Fig. 1 **LD65I7SA-H**

Fig. 2 **LD65I7SB-H**

Fig. 3 **LD65I7SC-H**

♦ABSOLUTE MAXIMUM RATING at Tc=25°C

Items	Symbols	Values	Unit
Optical Output Power	Po(CW)	40	mW
Laser Diode Reverse Voltage	V_R	2	V
Photo Diode Reverse Voltage	V_R	30	V
Operating Temperature	Topr	–10 ~ +70	°C
Storage Temperature	Tstg	–40 ~ +85	°C

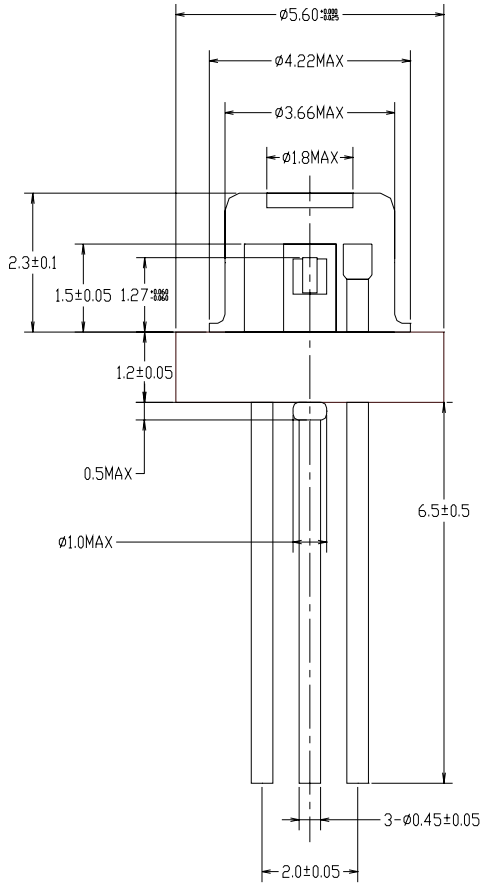
♦ELECTRICAL and OPTICAL CHARACTERISTICS at Tc=25°C

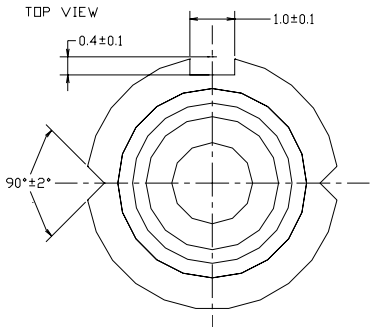
Items	Symbols	Min.	Typ.	Max.	Unit	Condition
Optical Output Power	Po	-	35	-	mW	-
Threshold Current	Ith	20	35	50	mA	-
Operating Current	Iop	40	75	110	mA	Po=35mW
Slope Efficiency	SE	0.6	0.85	1.1	mW/mA	25~35 mW
Operating Voltage	Vop	1.8	2.2	2.6	V	Po=35mW
Lasing Wavelength	λp	645	658	665	nm	Po=35mW
Beam Divergence	θ ∥	7	10	13	deg	Po=35mW
	θ ⊥	16	20	26	deg	Po=35mW
Beam Angle	Δθ ∥	-	-	±3	deg	Po=35mW
	Δθ ⊥	-	-	±3	deg	Po=35mW
Monitor Current	Im	0.05	0.30	1.5	mA	Po=35mW
Optical Distance	ΔX, ΔY, ΔZ	-	-	±60	μm	

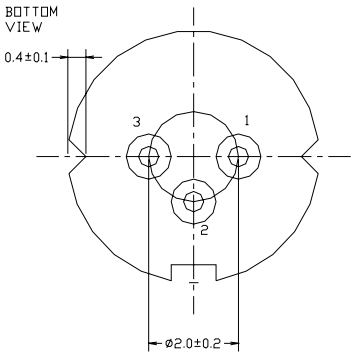
NOTICE : LD65I7S-A/B/C-H to be operated on APC

The above product specifications are subject to change without notice.

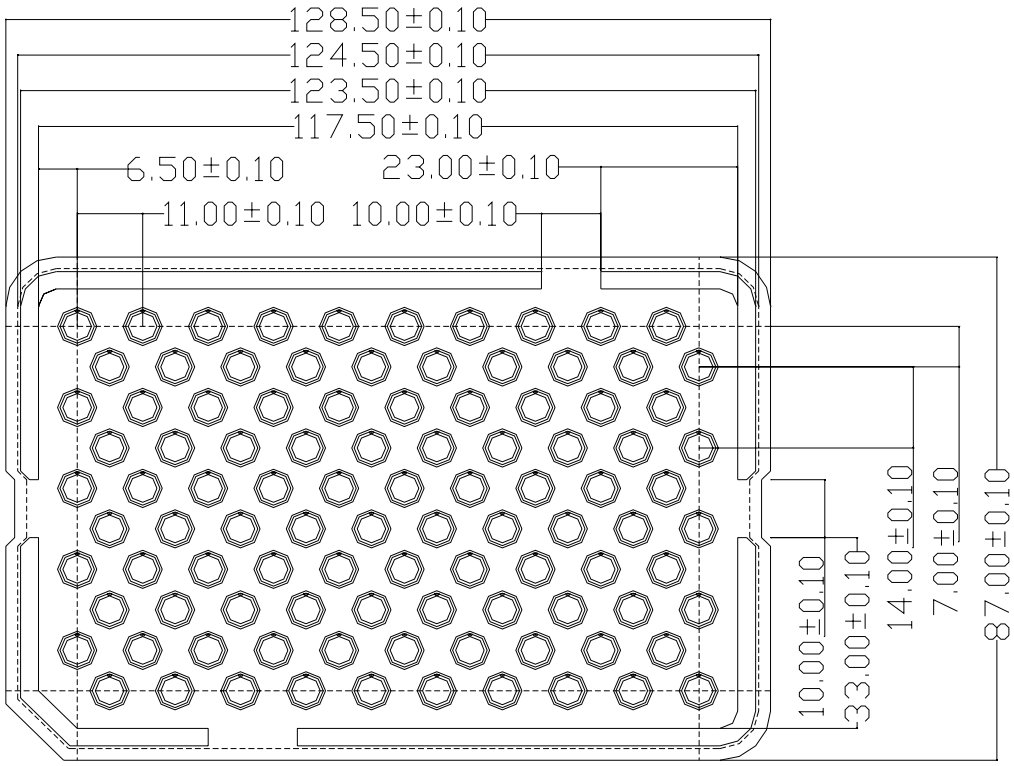
♦PACKAGE DIMENSION

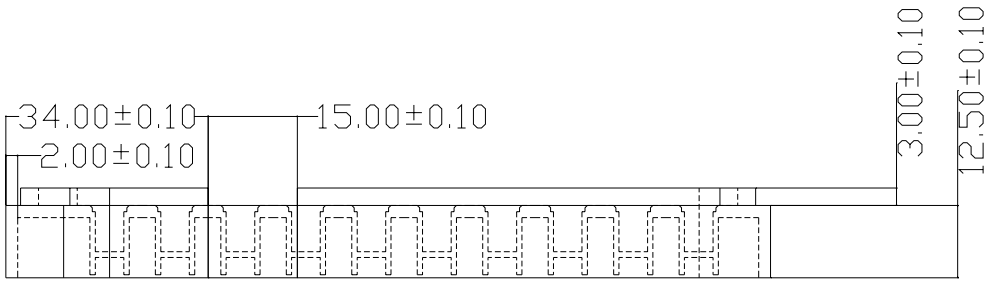






♦PACKING





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