

Peak Emission Wavelength: 4100nm

The 4100nm IR emitter is designed for applications requiring precise optical / mechanical axis alignment and IR radiation in the MWIR range. Custom package solutions and sorting are available.

FEATURES

- > TO-5 Metal Can Package
- > Wide Beam Angle
- > High Reliability

APPLICATIONS

- > Bio Medical Applications
- > Optical Sensors
- > Optical Communications
- > Gas Sensing



Absolute Maximum Ratings (Ta=25°C)



ITEMS	SYMBOL	RATINGS	UNIT
Forward Current (DC)	IF	--	mA
Forward Current (Pulse)*1	IFP	--	A
Reverse Voltage	VR	5	V
Power Dissipation	PD	--	mW
Operating Temperature Range	Topr	-20 ~ +85	°C
Storage Temperature Range	Tstg	-30 ~ +100	°C
Lead Soldering Temperature*2	Tls	260	°C

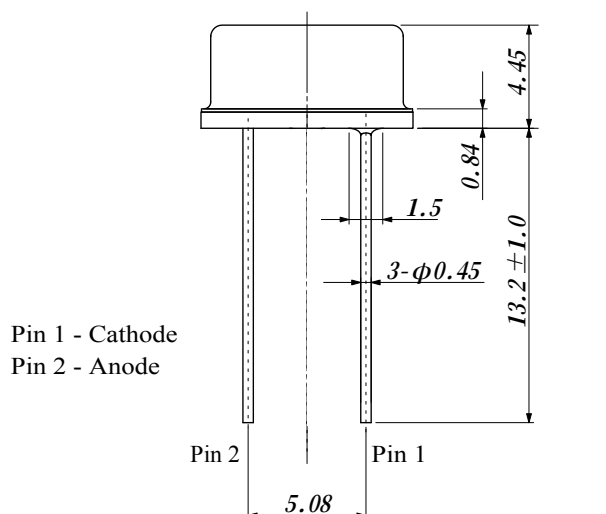
*1: Tw=10μsec, T=10msec; *2: Time 5 Sec max, Position: Up to 3mm from the body.

Electrical & Optical Characteristics (Ta = 25°C)

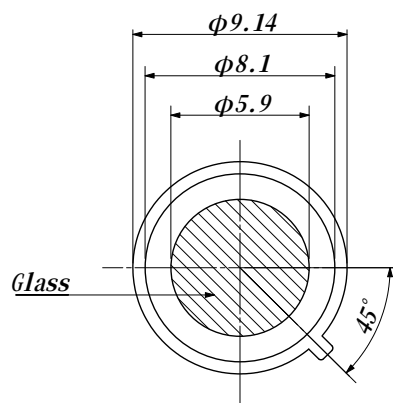
ITEMS	SYMBOL	CONDITIONS	MIN	TYP	MAX	UNIT
Power Output	PO	IF=300mA (QCW)	--	0.4	--	mW
Forward Voltage	VF	IF=300mA	--	0.3	--	V
Reverse Current	IR	VR=5V	--	--	100	uA
Peak Emission Wavelength	λ_p	IF=300mA	--	4.1	--	um
Spectral Line Half Width	$\Delta\lambda$	IF=300mA	--	--	--	nm
Half Intensity Beam Angle	Θ	IF=300mA	--	--	--	deg

* QCW (2Hz Duty 50%)

Package Dimensions



Note: The pin closest to the tab (pin 1) is Cathode.



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TOLERANCE ; ± 0.15

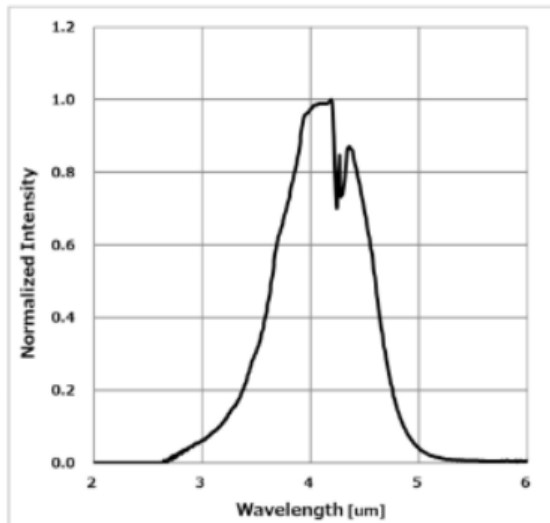


We reserve the right to make changes to improve technical design and may do so without further notice. Parameters can vary in different applications. All operating parameters must be validated for each customer application by the customer.

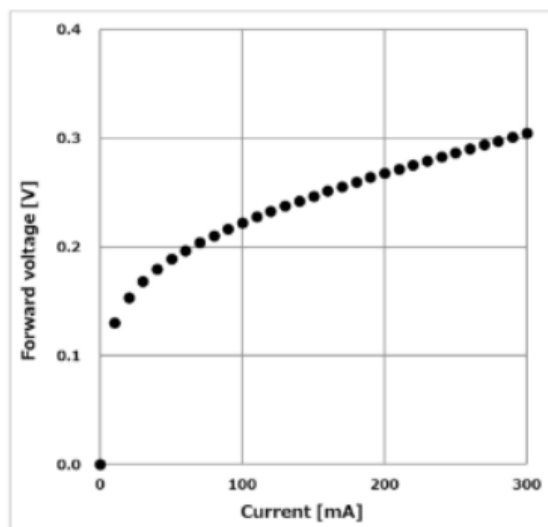
2025-05-08

Spectrum(typical data)

If=300mA



Forward voltage vs. current(typical data)



Optical power vs. current(typical data)

