DATASHEET

EOPD-525-1-0.9-2

Wavelength Selective GaP SMD Photodiode with lens

Features:

- Package: 3216 mm (1206 in)
- Size 3.2(L) x 1.6(W) x 1.9(H) mm
- Substrate: glass laminated epoxy
- Sensitivity: 410 nm – 580 nm
- Sensitive Area: 0,73 mm^2
- ROHS and REACH compliant
- Taped in 8 mm blister tape, cathode to transporting perforation

Applications:

- Sensing
- Visible light detection
- Medical applications

This compact SMD Photo Diode features high sensitivity in green and visible wavelength range.

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• Typical Electro-Optical Characteristics

Measurement conditions: $T_{ambient}$ = 23 °C; t_{test} ≤ 60 ms V_R = 0 V
Sensitive Area: 0.73 mm²

Parameter	Symbol	Condition	Min	Typ	Max	Unit
Color			Green			
Peak Sensitivity	λ_P			525		nm
Sensitivity Range	λ	@1% S_{max}	410		580	nm
Responsivity (1)	S	@525 nm		0.3		A/W
Dark Current	I_D	V_R = 5 V		5	30	pA
Capacitance	C			150		pF
Switching time	t	R = 50 Ω		35		ns

• Maximum Ratings

Parameter	Symbol	Min	Max	Unit
Operating Temperature	T_{op}	-20	+85	°C
Storage Temperature	T_{st}	-40	+100	°C

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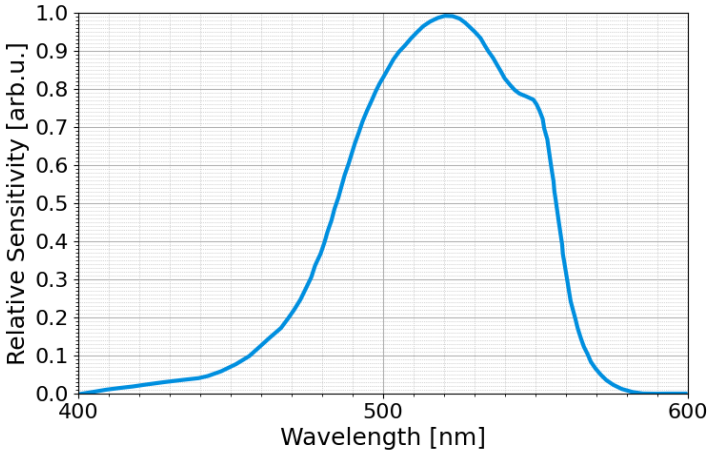
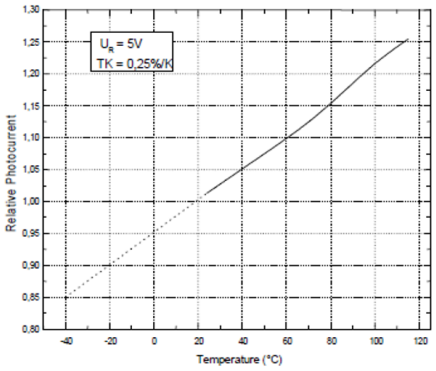
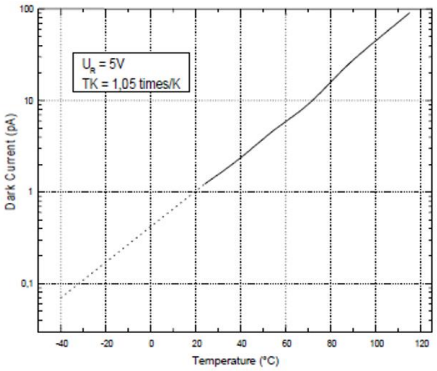
• Typical Performance



Relative Spectral Responsivity



Relative Photocurrent vs. Temperature



Dark Current vs. Temperature

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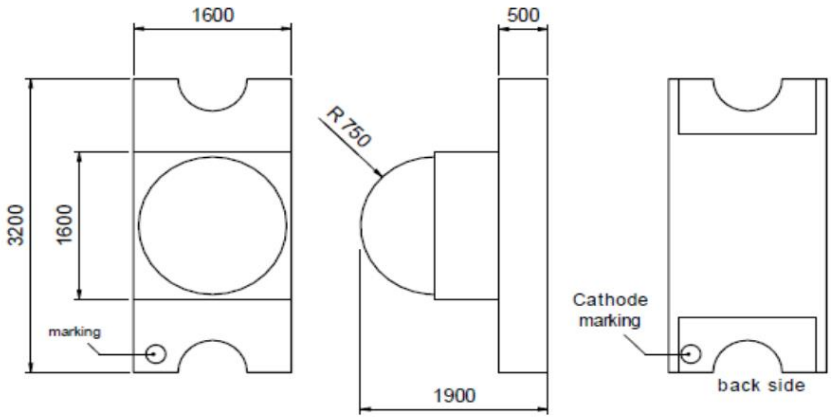
• Outline Drawing

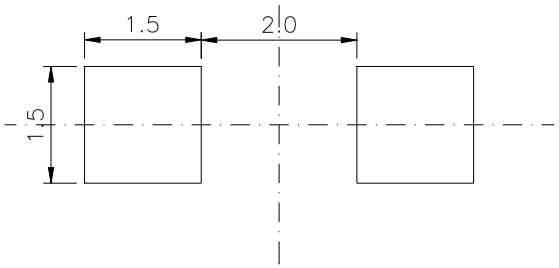
Unless otherwise specified, all drawing units are in mm
Tolerances are: ISO 2768-m



Marking at cathode

• Recommended PCB placement

Unless otherwise specified, all drawing units are in mm



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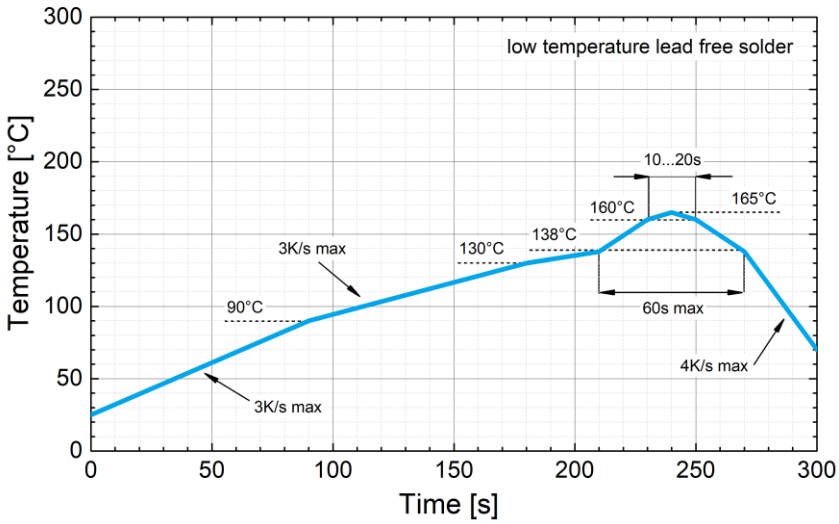
Soldering Profile



Recommended soldering profile for lead free soldering

Manual Soldering: Maximum soldering iron power, temperature and time 25 W / 300 °C for 3 s.

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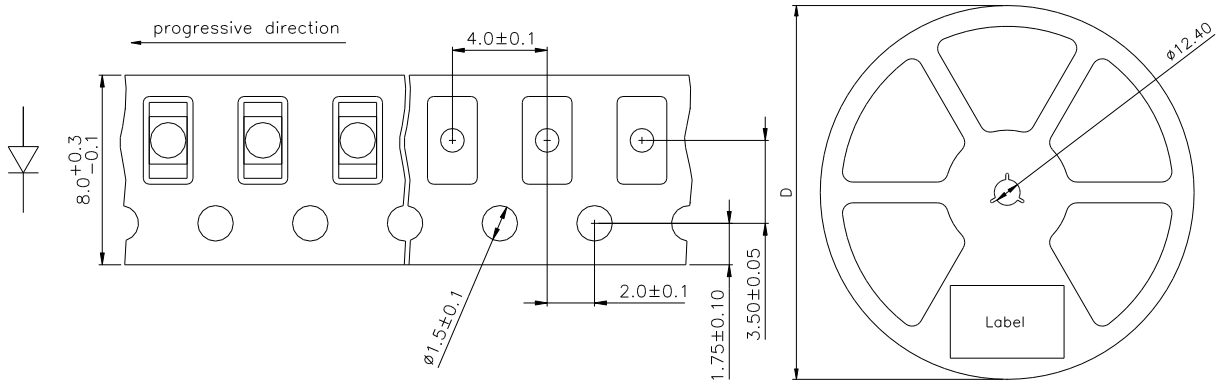
Tape And Reel Packaging



D	Parts/reel
7"	2000

Packaging The reel is sealed in a special plastic bag with integrated ESD protection including a silica dry-pack. Shelf life for sealed bag: 12 months on max. 30 °C and 60% Rh.
Floor life: 12 months under max. 30 °C and 60% Rh in a dust free environment.
Other bags (i.e. MBB, HIC, Vacuum pack, etc.) available on request.

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Notice

The information describes the type of component and shall not consider as assured characteristics. Terms of delivery and rights to change reserved. The data sheet may change without prior notification; The only valid issue and current revision will be on our website. Due to technical requirements, components may contain dangerous substances.
It is the responsibility of the customer to evaluate and ensure that the use of the products in their specific applications complies with relevant safety standards and regulations. Customers must assess the exposure conditions within their systems and ensure that appropriate measures are taken to prevent exceeding the permissible exposure limits outlined in IEC 62471. EPIGAP OSA Photonics GmbH does not assume liability for any non-compliance arising from the integration or usage of LEDs in customer systems.
Parameters can vary in different applications. The customer must validate all operating parameters for each customer application. EPIGAP OSA Photonics GmbH does not have the responsibility for the reliability and the degradation behavior of products made with EPIGAP OSA Photonics GmbH diodes because they depend not only on the diode but also on the conditions of manufacture or design of the final products. The customer is responsible to ensure the long-term stability of the product according to customer's requirements. If components are used in toys or, life support systems, then EPIGAP OSA Photonics GmbH must expressly authorize use of components prior to incorporation into the customer's systems!
Packaging: EPIGAP OSA Photonics GmbH uses recyclable packages; please use the recycling operators known to you.

EPIGAP OSA Photonics GmbH
www.epigap-osa.de

Köpenicker Str.325
12555 Berlin Germany
Tel. +49 (0)30 6576 3764
sales@epigap-osa.de

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