

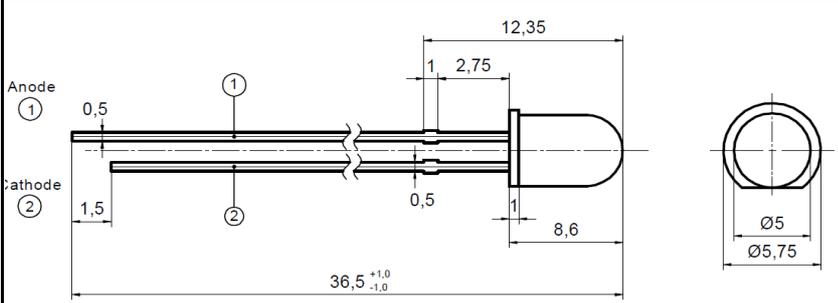
Product Data Sheet

LED Lamp Infra Red

EOLD-760-524

Rev. 01 aus 2011

Radiation	Type	Case
Infra Red	DDH	5mm plastic lens

	Description: High-power, high-speed infrared LED in standard 5 mm package, with lens for narrow beam focusing, housing with standoff leads
	Application: Optical communications, safety equipment, automation

Maximum Ratings

$T_{amb} = 25^{\circ}\text{C}$, unless otherwise specified

Parameter	Test Conditions	Symbol	Value	Unit
Forward Current		I_F	50	mA
Peak forward current	$(t_p \leq 50 \mu\text{s}, t_p / T = 1/2)$	I_{FM}	100	mA
Power dissipation		P_D	120	mW
Operating temp. range		T_{amb}	-20 to +80	$^{\circ}\text{C}$
Storage temp. range		T_{stg}	-55 to +100	$^{\circ}\text{C}$
Junction temperature		T_J	100	$^{\circ}\text{C}$
Lead soldering temp.	$t < 5\text{s}$, 3mm from case	T_{slg}	260	$^{\circ}\text{C}$

Optical and Electrical Characteristics

$T_{amb} = 25^{\circ}\text{C}$, unless otherwise specified

Parameter	Symbol	Conditions	Min	typ	max	Unit
Forward voltage	V_F	$I_F = 20\text{mA}$		1.7	2.0	V
Forward voltage*	V_F	$I_F = 50\text{mA}$		2.0		V
Reverse voltage	V_R	$I_R = 100\mu\text{A}$	5			V
Radiant Power	Φ_e	$I_F = 20\text{mA}$	4	6		mW
Radiant Power*	Φ_e	$I_F = 50\text{mA}$		14		mW
Radiant intensity	I_e	$I_F = 20\text{mA}$	24	30		mW/sr
Radiant intensity*	I_e	$I_F = 50\text{mA}$		70		mW/sr
Peak wavelength	λ_p	$I_F = 20\text{mA}$	750	760	775	nm
Spectral bandwidth at 50%	$\Delta\lambda_{0,5}$	$I_F = 20\text{mA}$		30		nm
Viewing angle	φ	$I_F = 20\text{mA}$		20		deg.
Switching time	t_r, t_f	$I_F = 20\text{mA}$		35		ns



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.