

Fig. 1 - Power Dissipation Limit vs. Ambient Temperature

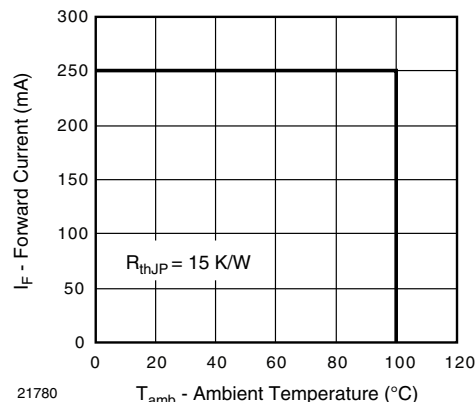


Fig. 2 - Forward Current Limit vs. Ambient Temperature

BASIC CHARACTERISTICS ( $T_{amb} = 25\text{ }^{\circ}\text{C}$ , unless otherwise specified)						
PARAMETER	TEST CONDITION	SYMBOL	MIN.	TYP.	MAX.	UNIT
Forward voltage	$I_F = 250\text{ mA}$ , $t_p = 10\text{ ms}$	$V_F$	-	1.7	2.0	V
Temperature coefficient of $V_F$	$I_F = 1\text{ mA}$	$TK_{V_F}$	-	-1.5	-	mV/K
Reverse current	$V_R = 5\text{ V}$	$I_R$	Not designed for reverse operation			$\mu\text{A}$
Radiant intensity	$I_F = 250\text{ mA}$ , $t_p = 10\text{ ms}$	$I_e$	30	55	90	mW/sr
Radiant power	$I_F = 250\text{ mA}$ , $t_p = 20\text{ ms}$	$\phi_e$	-	130	-	mW
Temperature coefficient of $\phi_e$	$I_F = 1\text{ A}$	$TK_{\phi_e}$	-	-0.5	-	%/K
Angle of half intensity		$\phi$	-	$\pm 60$	-	$^{\circ}$
Peak wavelength	$I_F = 250\text{ mA}$	$\lambda_p$	-	850	-	nm
Spectral bandwidth	$I_F = 250\text{ mA}$	$\Delta\lambda$	-	30	-	nm
Temperature coefficient of $\lambda_p$	$I_F = 250\text{ mA}$	$TK_{\lambda_p}$	-	0.2	-	nm/K
Rise time	$I_F = 250\text{ mA}$	$t_r$	-	8	-	ns
Fall time	$I_F = 250\text{ mA}$	$t_f$	-	10	-	ns

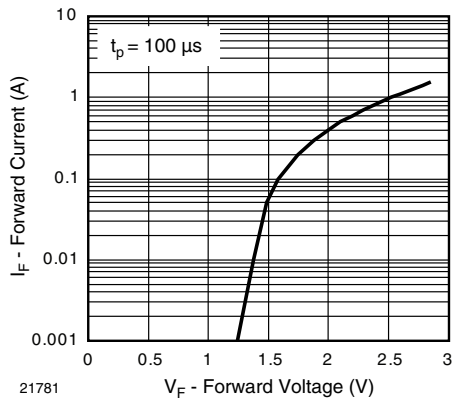
**BASIC CHARACTERISTICS** ( $T_{amb} = 25\text{ }^{\circ}\text{C}$ , unless otherwise specified)

Fig. 3 - Forward Current vs. Forward Voltage

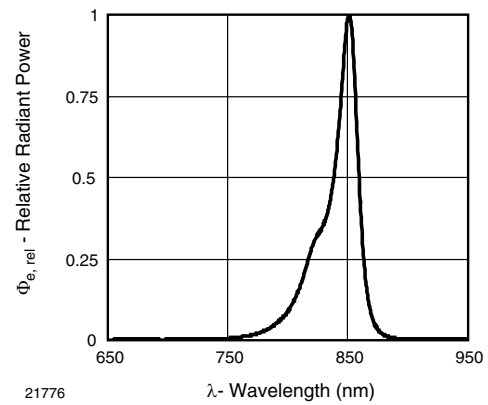


Fig. 5 - Relative Radiant Power vs. Wavelength

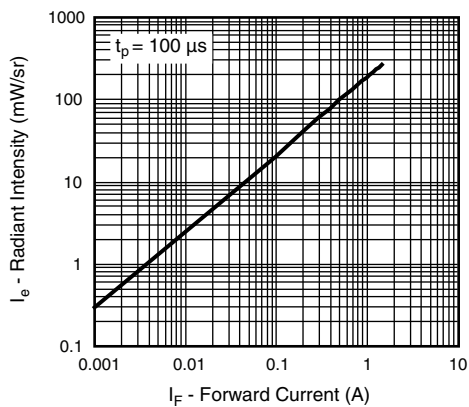
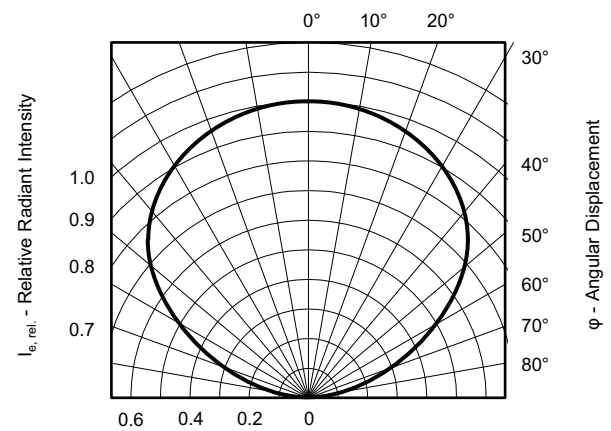
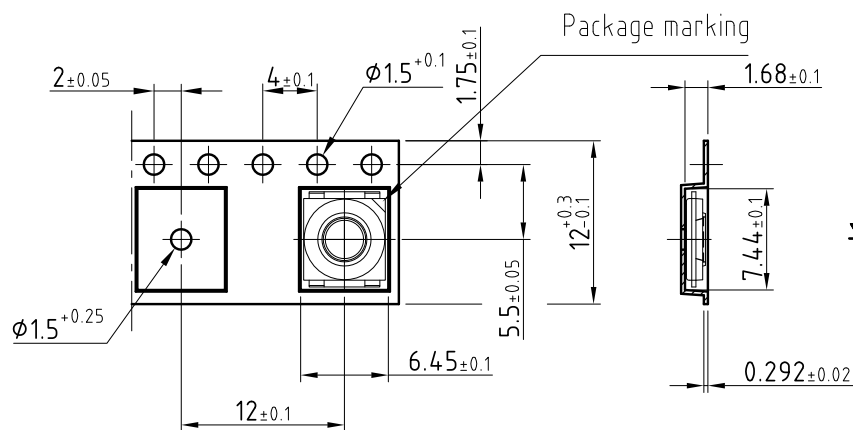
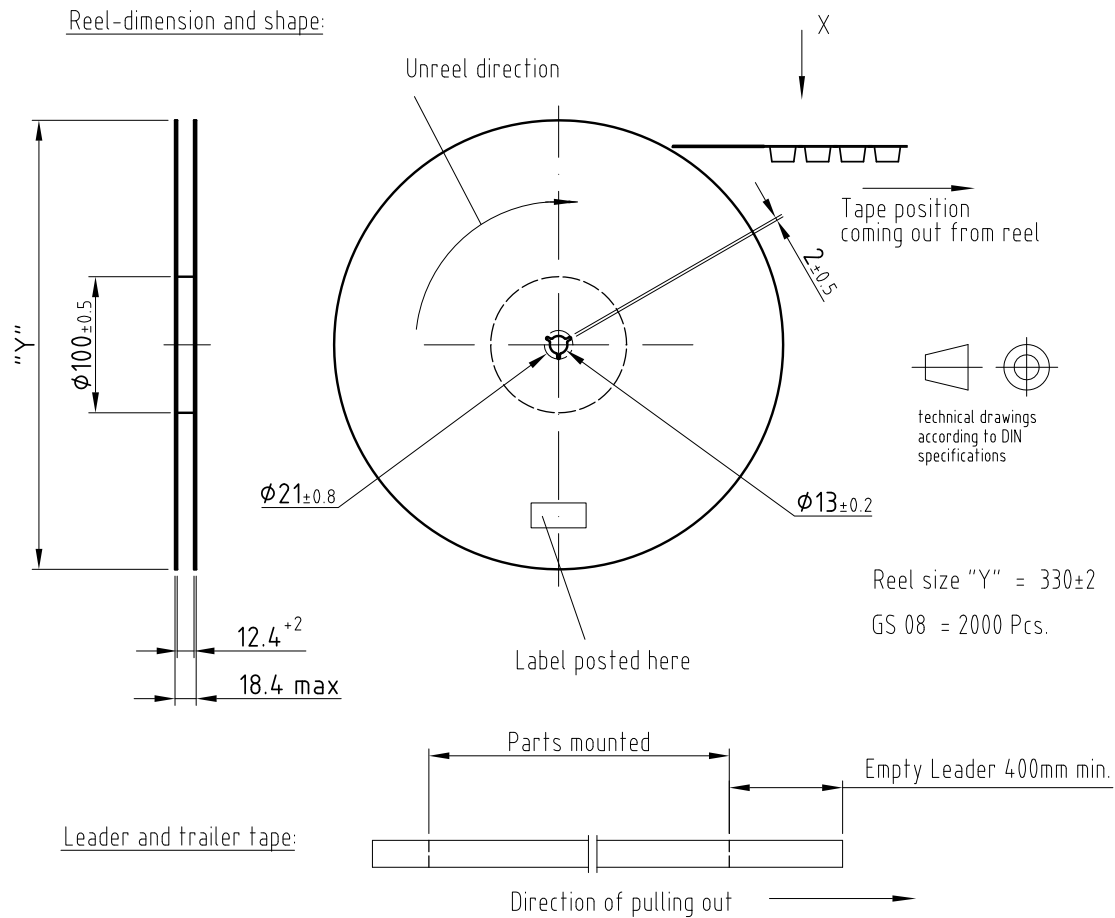


Fig. 4 - Radiant Intensity vs. Forward Current



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Fig. 6 - Relative Radiant Intensity vs. Angular Displacement

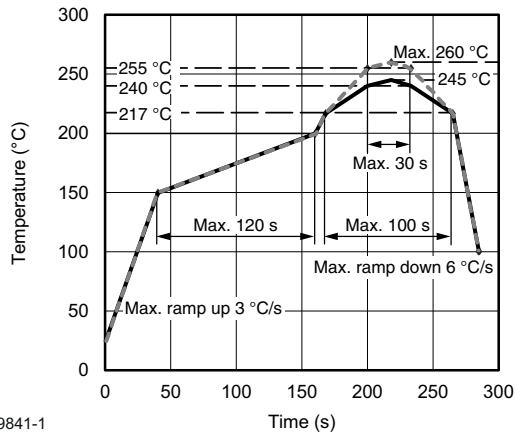
**TAPING DIMENSIONS** in millimeters

Drawing-No.: 9.800-5094.01-4

Issue: 3; 22.01.08

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**SOLDER PROFILE**

19841-1

Fig. 7 - Lead (Pb)-free Reflow Solder Profile According to J-STD-020 for Preconditioning According to JEDEC®, Level 2

**DRYPACK**

Devices are packed in moisture barrier bags (MBB) to prevent the products from moisture absorption during transportation and storage. Each bag contains a desiccant.

**FLOOR LIFE**

Floor life (time between soldering and removing from MBB) must not exceed the time indicated on MBB label:

Floor life: 1 year

Conditions:  $T_{amb} < 30\text{ °C}$ ,  $RH < 60\%$

Moisture sensitivity level 2, according to J-STD-020B

**DRYING**

In case of moisture absorption devices should be baked before soldering. Conditions see J-STD-020 or label. Devices taped on reel dry using recommended conditions 192 h at 40 °C (+ 5 °C),  $RH < 5\%$ .



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