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SEMICONDUCTOR



ESD



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MOV

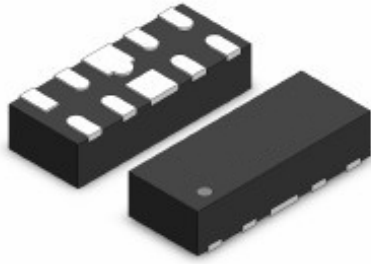


GDT



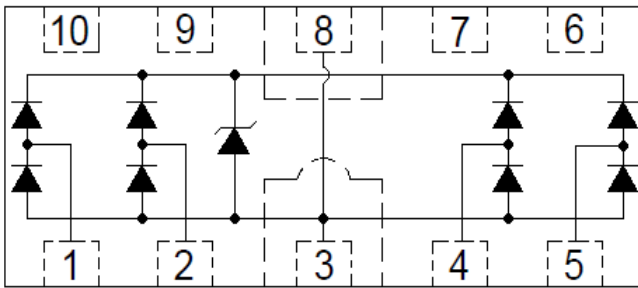
PLED

Product data sheet



SLP2710P8

**Schematic & PIN Configuration**



**Features**

- 60Watts peak pulse power (tp = 8/20µs)
- Bidirectional configurations
- Solid-state silicon-avalanche technology
- Low clamping voltage
- Low leakage current
- Low capacitance (Cj=0.2pF typ. I/O to I/O)
- IEC 61000-4-2 ±20kV contact ±25kV air
- IEC 61000-4-4 (EFT) 40A (5/50ns)
- IEC 61000-4-5 (Lightning) 4A (8/20µs)

**Applications**

- USB3.0, USB2.0, Ethernet
- HDMI 2.0, Displayport 1.3, eSATA
- Unified Display interface
- Digital Visual Interface
- High speed serial interface

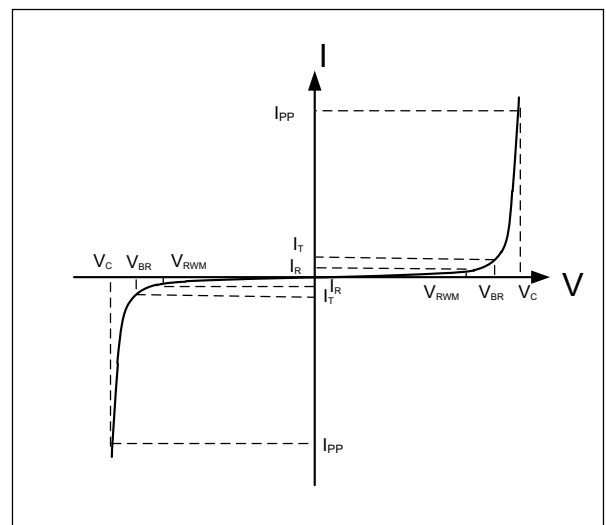
**Mechanical Data**

- Molding compound flammability rating: UL 94V-0
- Packaging: Tape and Reel
- RoHS/WEEE Compliant

**Electrical Parameters (TA = 25°C unless otherwise noted)**

	Parameter
I <sub>PP</sub>	Maximum Reverse Peak Pulse Current
V <sub>C</sub>	Clamping Voltage @ I <sub>PP</sub>
V <sub>RWM</sub>	Working Peak Reverse Voltage
I <sub>R</sub>	Maximum Reverse Leakage Current @ V <sub>RWM</sub>
V <sub>BR</sub>	Breakdown Voltage @ I <sub>T</sub>
I <sub>T</sub>	Test Current

Note: 8/20µs pulse waveform.



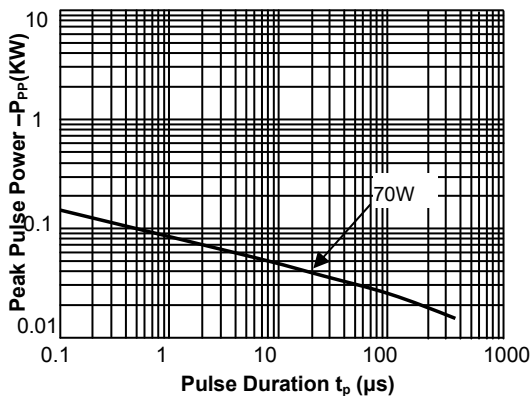
**Absolute Maximum Rating**

Rating	Symbol	Value	Units
Peak Pulse Power ( $t_p = 8/20\mu s$ )	$P_{PP}$	70	Watts
Peak Pulse Current ( $t_p = 8/20\mu s$ ) (note1)	$I_{PP}$	4.5	A
ESD per IEC 61000-4-2 (Air)	$V_{ESD}$	25	kV
ESD per IEC 61000-4-2 (Contact)		20	
Lead Soldering Temperature	$T_L$	260(10seconds)	$^{\circ}C$
Junction Temperature	$T_J$	-55 to + 125	$^{\circ}C$
Storage Temperature	$T_{stg}$	-55 to + 125	$^{\circ}C$

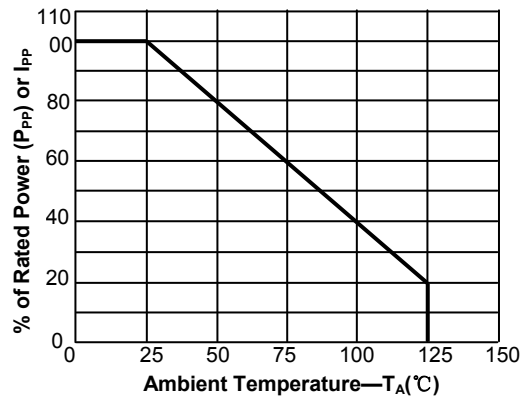
**Electrical Characteristics**

Parameter	Symbol	Conditions	Min	Typical	Max	Units
Reverse Stand-Off Voltage	$V_{RWM}$				5.0	V
Reverse Breakdown Voltage	$V_{BR}$	$I_T = 1mA$	6.0			V
Reverse Leakage Current	$I_R$	$V_{RWM} = 5V, T = 25^{\circ}C$			1	$\mu A$
Peak Pulse Current	$I_{PP}$	$t_p = 8/20\mu s$			4.5	A
Clamping Voltage	$V_C$	$I_{PP} = 4A, t_p = 8/20\mu s$			15	V
Junction Capacitance	$C_j$	$V_R = 0V, f = 1MHz$ I/O to I/O		0.2	0.3	pF
		$V_R = 0V, f = 1MHz$ I/O to GND		0.4	0.55	

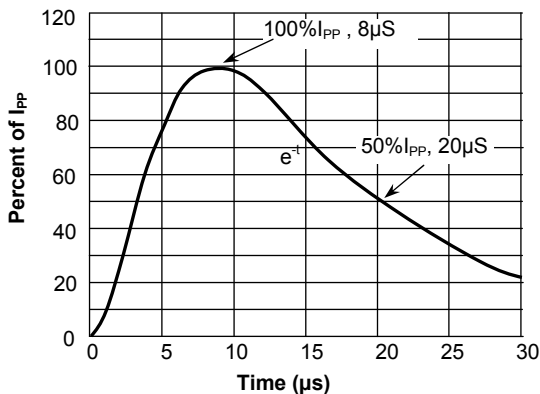
**Fig.1 Peak Pulse Power Rating Curve**



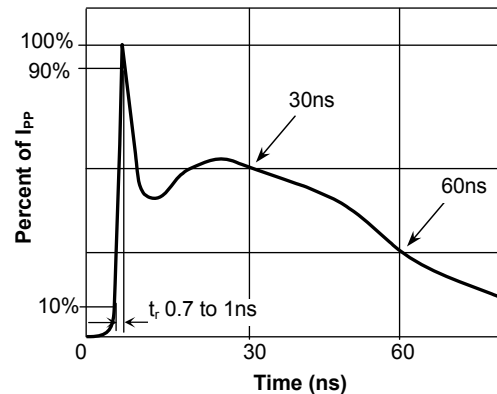
**Fig.2 Pulse Derating Curve**



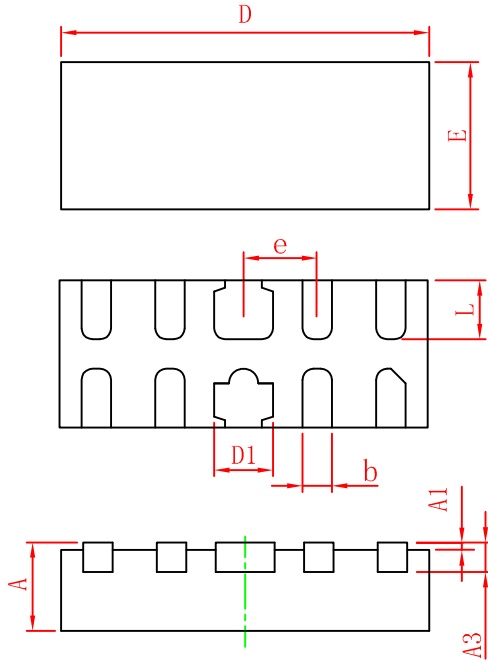
**Fig.3 Pulse Waveform-8/20μs**



**Fig.4 Pulse Waveform-ESD(IEC61000-4-2)**



**Outline Drawing –SLP2710P8(2.7mmx1.0mm)**



Symbol	Dimensions in millimeters		
	Min	Nom	Max
A	0.38	0.50	0.58
A1	-	0.02	0.05
A3	0.10	0.13	0.20
D	2.60	2.70	2.80
E	0.90	1.00	1.10
D1	0.35	0.40	0.45
b	0.15	0.20	0.25
e	0.60BSC		
L	0.30	0.38	0.45

**REEL SPECIFICATION**

P/N	PKG	QTY
RCLAMP0524J-MS	SLP2710P8	3000

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