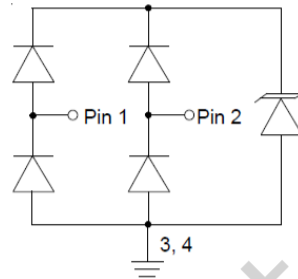


Features

- ◆ 100W(8/20 μ s)Peak Pulse Power
- ◆ Ultra Low Capacitance ESD Protection
- ◆ Flow Through DFN1.6x1.0-6L Package
- ◆ RoHS Compliant
- ◆ Matte TinLead finish(Pb-Free)
- ◆ Protect Two High Speed Data Lines
- ◆ Meet IEC61000-4-2 Level 4:
 Contact Discharge>12kV
 Air Discharge>17kV

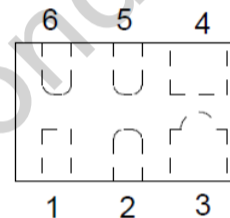
Circuit Diagram



Applications

- ◆ PCI Express
- ◆ MDDI Ports
- ◆ eSATA Interfaces
- ◆ Display Port Interface
- ◆ Digital Misual Interface(DV)
- ◆ High Definition Multi-Media Interface (HDMI)

PIN Diagram



Ordering information

Device	Package	Reel	Qty/Reel
ESD0522P	DFN1.6x1.0-6L	7 inch	3000

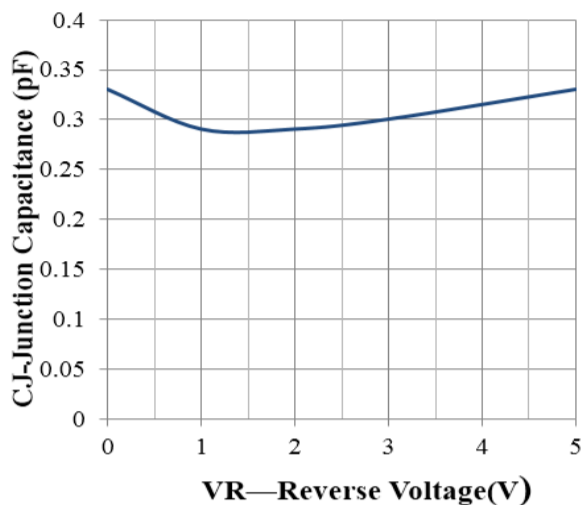
Maximum Ratings(Ta=25℃)

Symbol	Parameter	Value	Unit
PPK	Peak Pulse Power	150	W
IPP	Peak Pulse Current	4.5	A
VESD(Contact)	Contact ESD Voltage per IEC61000-4-2	12	kV
VESD(Air)	Air ESD Voltage per IEC61000-4-2	17	kV
TJ	Junction Temperature	-55 to+125	℃
TSTG	Storage Temperature	-55 to+150	℃

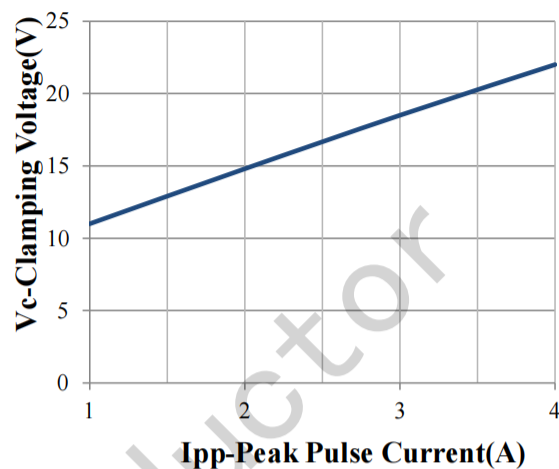
Electrical Characteristics(Ta=25℃)

Symbol	Parameter	Conditions	Min	Typ	Max	Unit
VRWM	Reverse Working Peak Voltage				5	V
VBR	Reverse Breakdown Voltage	IT=1mA	6			V
IR	Reverse Leakage Current	VRWM=5V			1	μA
VC	Clamping Voltage	IPP=4.5A(8/20μs)			25	V
CJ	Capacitance	VR=0V,f=1MHz Between I/O pins			0.5	pF
CJ	Capacitance	VR=0V,f=1MHz Any I/O pin to ground			0.9	pF

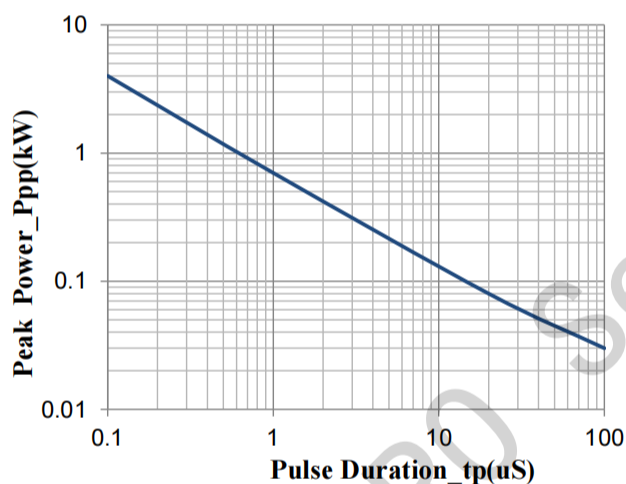
Typical Performance Curves



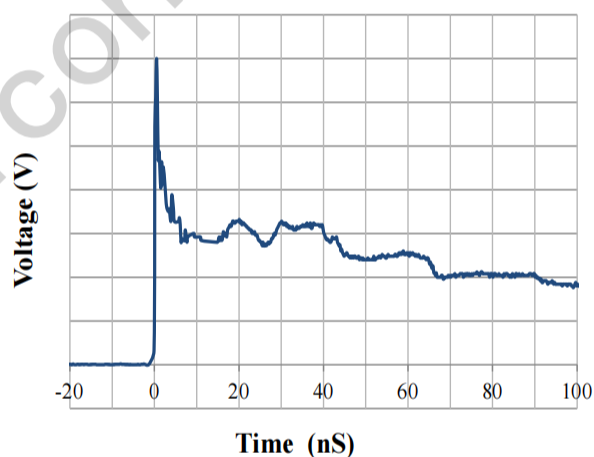
Junction Capacitance vs. Reverse Voltage



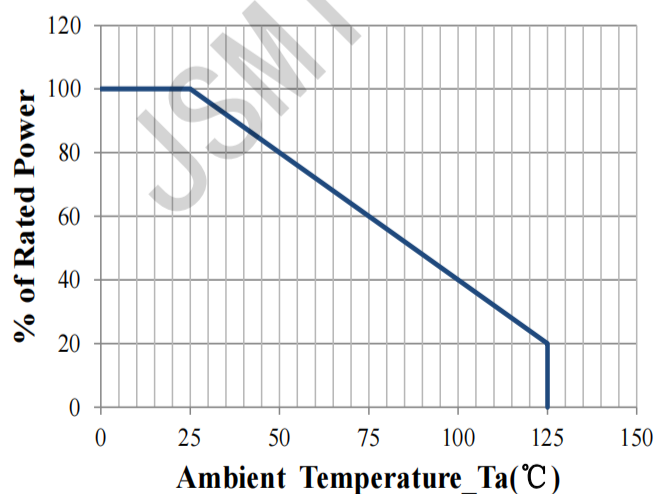
Clamping Voltage vs. Peak Pulse Current



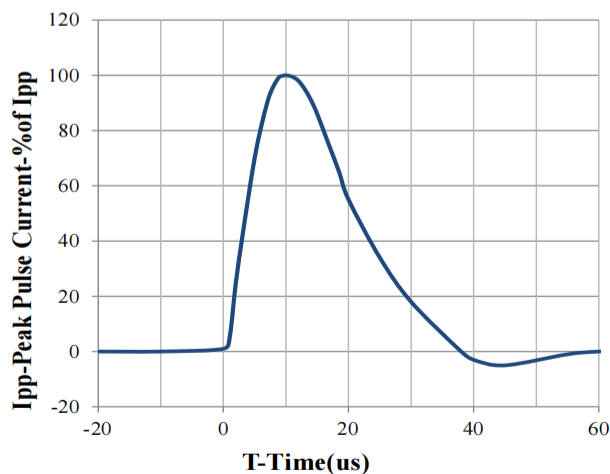
Peak Pulse Power vs. Pulse Time



IEC61000-4-2 Pulse Waveform

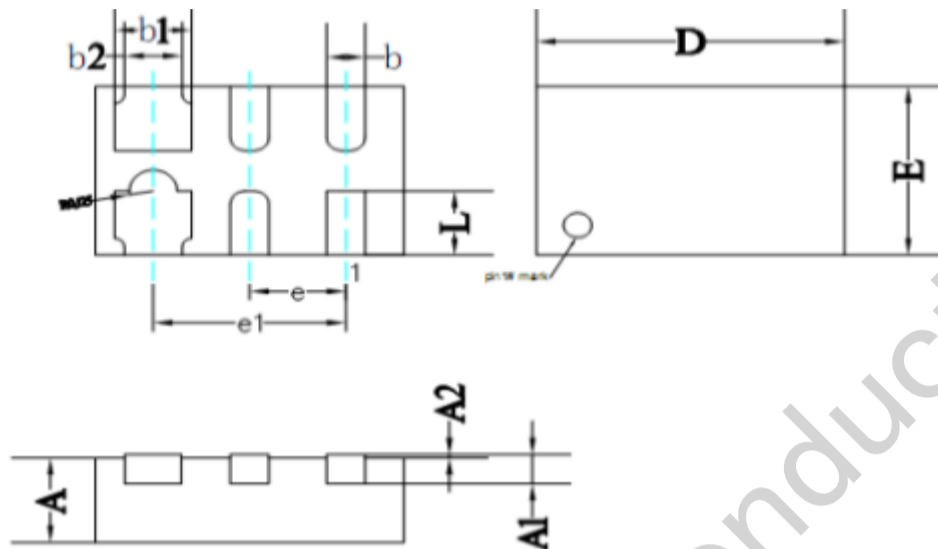


Power Derating Curve



8 X 20us Pulse Waveform

DFN1.6x1.0-6L Dimension



ALL DIMENSIONS IN MM

	MIN	NOM	MAX
D	1.55	1.60	1.65
E	0.95	1.00	1.05
L	0.33	0.38	0.43
b	0.15	0.20	0.25
b1	0.35	0.40	0.45
b2	0.25	0.30	0.35
e	0.50BSC		
e1	1.00BSC		
A	0.45	0.50	0.55
A1	0.15REF		
A2	0.00	—	0.05