

RoHS Compliant Product
A suffix of "-C" specifies halogen and lead-free

FEATURES

- Low Clamping Voltage

DFN1006



APPLICATIONS

- Personal Digital Assistants (PDAs)
- Portable Instrumentation
- Notebooks & Handhelds
- Digital Cameras
- Cellular Handsets and Accessories

MARKING

TN

PACKAGE INFORMATION

Package	MPQ	Leader Size
DFN1006	10K	7 inch

ORDER INFORMATION

Part Number	Type
SBESD03CL-C	Lead (Pb)-free and Halogen-free



ABSOLUTE MAXIMUM RATINGS

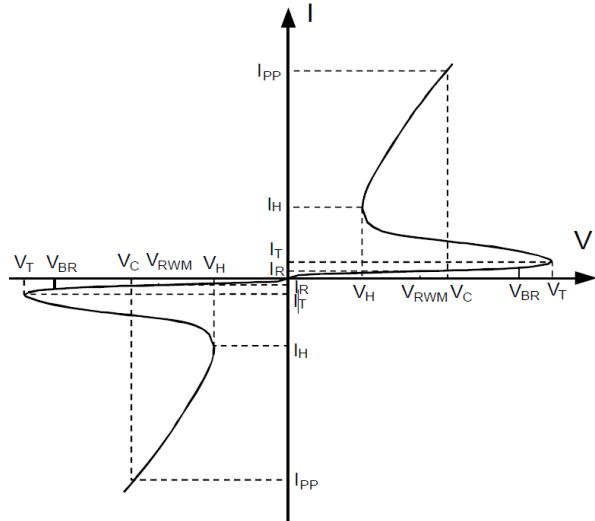
Parameter		Symbol	Ratings	Unit
IEC 61000-4-2	Air	V_{ESD}	± 15	kV
	Contact		± 12	
Peak Pulse Power @ $t_p=8/20\mu s$		P_{PP}	56	W
Peak Pulse Current @ $t_p=8/20\mu s$		I_{PP}	7	A
Operating Temperature Range		T_J	-55~125	$^{\circ}C$
Storage Temperature Range		T_{STG}	-55~150	$^{\circ}C$

ELECTRICAL CHARACTERISTICS ($T_A=25^\circ\text{C}$ unless otherwise specified)

Parameter	Symbol	Min.	Typ.	Max.	Unit	Test Conditions
Reverse Working Voltage	V_{RWM}	-	-	3.3	V	
Reverse Breakdown Voltage	V_{BR}	4.2	-	-	V	$I_T=1\text{mA}$
Reverse Leakage Current	I_R	-	-	0.2	μA	$V_{RWM}=5\text{V}$
Clamping Voltage @ $t_p=8/20\mu\text{s}$	V_C	-	-	5	V	$I_{PP}=1\text{A}$
		-	-	7		$I_{PP}=5\text{A}$
		-	-	8		$I_{PP}=7\text{A}$
Junction Capacitance	C_J	-	0.75	-	pF	$V_R=0, f=1\text{MHz}$

ELECTRICAL PARAMETERS ($T=25^\circ\text{C}$)

Parameter	Symbol
Reverse Peak Pulse Current	I_{PP}
Clamping Voltage @ I_{PP}	V_C
Reverse Stand-Off Voltage	V_{RWM}
Reverse Leakage Current @ V_{RWM}	I_R
Breakdown Voltage @ I_T	V_{BR}
Test Voltage	V_T
Test Current	I_T
Holding Voltage	V_H
Holding Current	I_H



RATINGS AND CHARACTERISTICS CURVES

FIG. 1-Power Derating Curve

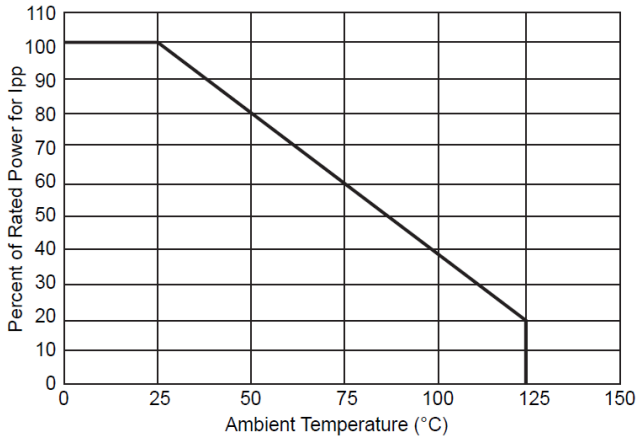


FIG. 2-Clamping Voltage

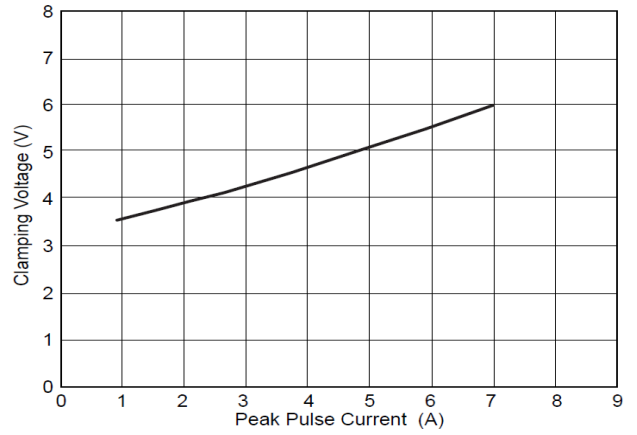


FIG. 3-Junction Capacitance

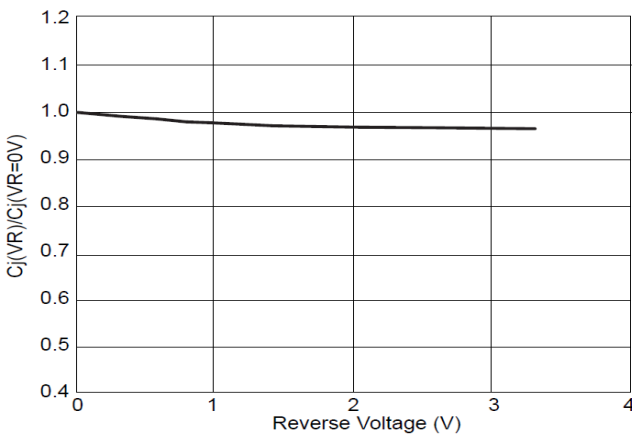


FIG. 4-8/20us Pulse Waveform

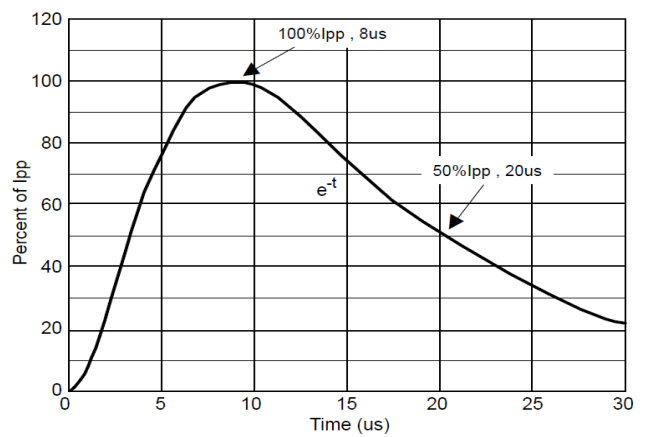
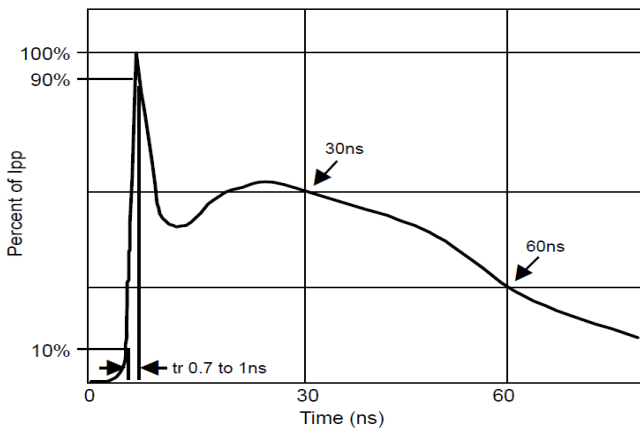
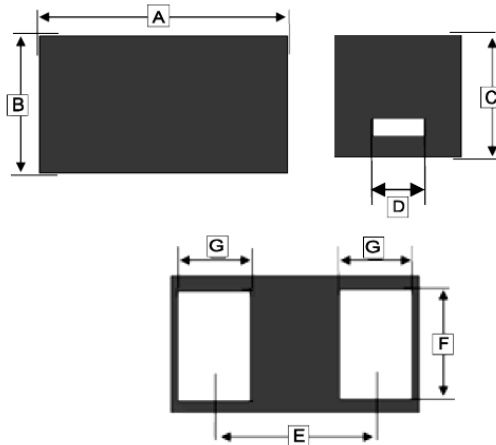


FIG. 5-ESD(IEC61000-4-2) Pulse Waveform



PACKAGE OUTLINE DIMENSIONS

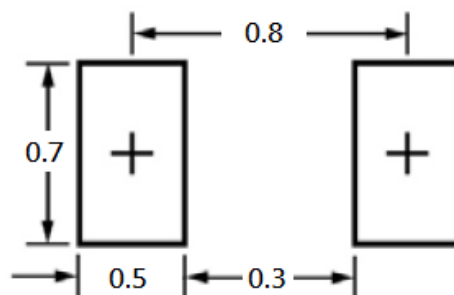
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REF.	Millimeter	
	Min.	Max.
A	0.90	1.10
B	0.50	0.70
C	0.32	0.55
D	0.10 TYP.	
E	0.65 BSC.	
F	0.20	0.60
G	0.15	0.55

MOUNTING PAD LAYOUT

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*Dimensions in millimeters