

Features

100 W (8/20 μ s) Peak Pulse Power

Low Capacitance ESD Protection

SOD - 723 Package

RoHS Compliant

Matte Tin Lead finish (Pb-Free)

Protect One High Speed Data Line

Meet IEC61000-4-2 Level 4:

Contact Discharge > 30kV Air

Discharge > 30kV

Applications

Communication System

Portable Instrumentation

Audio and Video Equipment

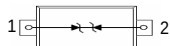
Computers and Peripherals

USB 1.1, USB 1.0 Ports

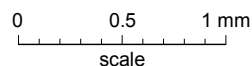
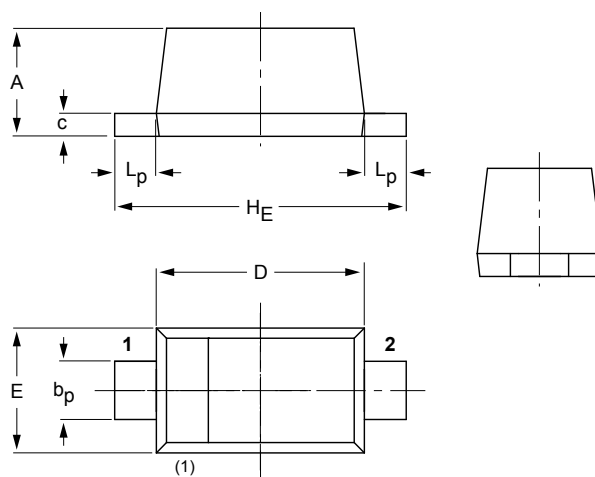
Circuit Diagram



SOD-723



SOD-723



DIMENSIONS (mm are the original dimensions)

UNIT	A	bp	c	D	E	HE	Lp
mm	0.55 0.49	0.32 0.25	0.15 0.08	1.05 0.95	0.65 0.55	1.45 1.35	0.27 0.13

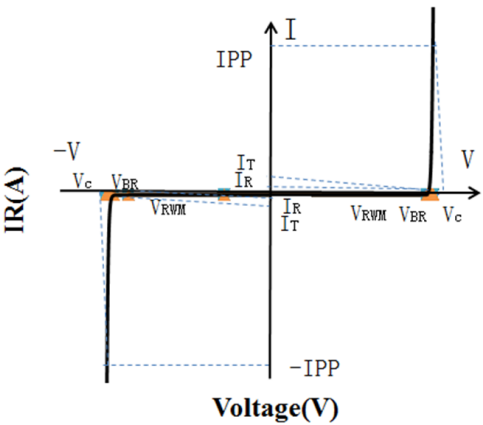
Maximum Ratings (Ta = 25°C)

Symbol	Parameter	Value	Unit
PPK	Peak Pulse Power	100	W
IPP	Peak Pulse Current	7	A
VESD (Contact)	Contact ESD Voltage per IEC61000-4-2	30	kV
VESD (Air)	Air ESD Voltage per IEC61000-4-2	30	kV
TJ	Junction Temperature	-55 to +150	°C
TSTG	Storage Temperature	-55 to +150	°C

CESDBLC5V0D7

Portion Electronics Parameter

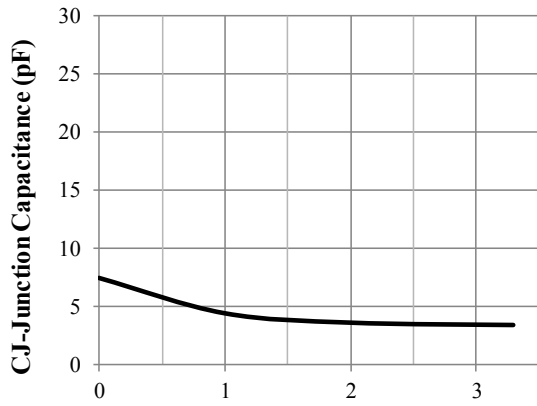
Symbol	Parameter
I_T	Test Current
I_{PP}	Maximum Reverse Peak Pulse Current
V_c	Clamping Voltage @ I_c



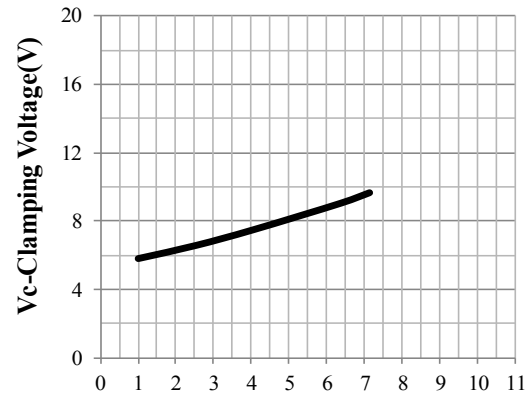
Electrical Characteristics ($T_a = 25^{\circ}C$)

Symbol	Parameter	Conditions	Min	Typ	Max	Unit
$VRWM$	Reverse Working Peak Voltage				5	V
VBR	Reverse Breakdown Voltage	$I_T = 1mA$	6		9	V
I_R	Reverse Leakage Current	$VRWM = 5V$			0.1	μA
V_C	Clamping Voltage	$IPP = 1A (8/20\mu s)$			10	V
V_C	Clamping Voltage	$IPP = 7A (8/20\mu s)$		9	15	V
C_J	Capacitance	$VR = 0V, f = 1MHz$		8	15	pF

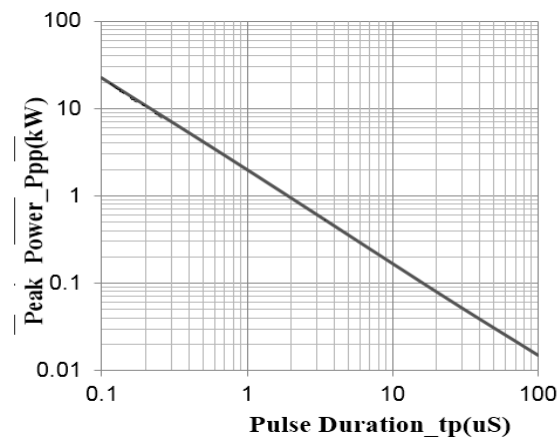
RATING AND VCHARACTERISTIC CURVES(CESDBLC5V0D7)



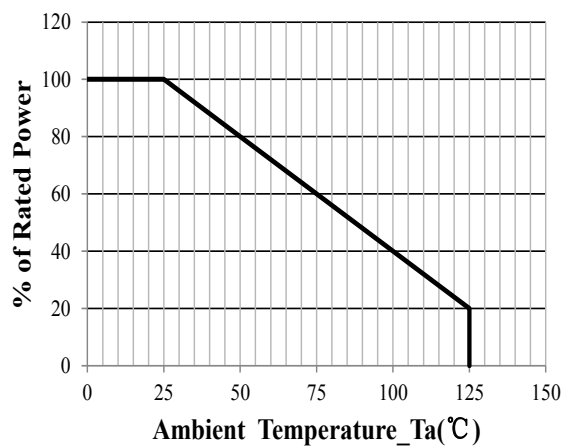
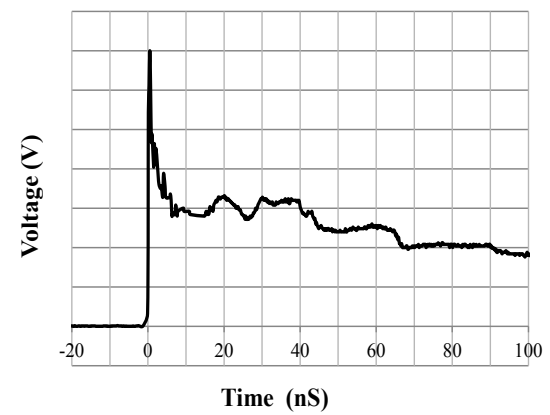
Junction Capacitance vs. Reverse Voltage



Clamping Voltage vs. Peak Pulse Current



Peak Pulse Power vs. Pulse Time



Power Derating Curve

