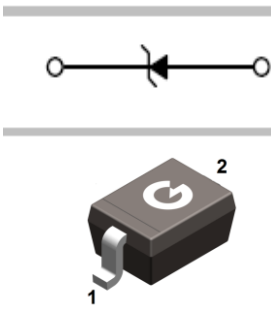
Single Line TVS Diode GESD8V0D3

FEATURES

- For sensitive ESD protection
- Excellent clamping capability
- Low leakage
- Fast response, response time less than 1ns

HF



SOD-323

APPLICATIONS

- Computers and peripherals
- Communication systems
- Audio and video equipment

ORDERING INFORMATION

Type No.	Marking	Package Code
GESD8V0D3	N6	SOD-323

MAXIMUM RATING @ Ta=25℃ unless otherwise specified

Parameter	Symbol	Limits	Unit
IEC61000-4-2(ESD) Air Contact	V_{ESD}	30	kV
Reverse standoff voltage	V_{RWM}	8	V
Peak pulse power dissipation(t_p=8/20μs)	P_{PP}	350	W
Peak pulse current(t_p=8/20μs)	I_{PP}	15	A
Junction temperature	T_J	-40 ~ +150	℃
Storage temperature range	T_{STG}	-40 ~ +150	℃
Thermal Resistance Junction to Ambient Air	$R_{\theta JA}$	460	℃/W

Single Line TVS Diode GESD8V0D3

ELECTRICAL CHARACTERISTICS @ Ta=25℃ unless otherwise specified

Parameter	Symbol	Conditions	Min	Typ	Max	Units
Reverse breakdown voltage	V_{BR}	I_R=1mA	8.5	9	11	V
Reverse leakage current	I_R	V_{RWM}=8V	-	-	1	μA
Diode capacitance	C_d	V_R=0V,f=1MHz	-	90	150	pF
Clamping voltage	$V_{(CL)}$	I_{PP}=15A	-	14.2	25	V

TYPICAL CHARACTERISTICS @ Ta=25℃ unless otherwise specified

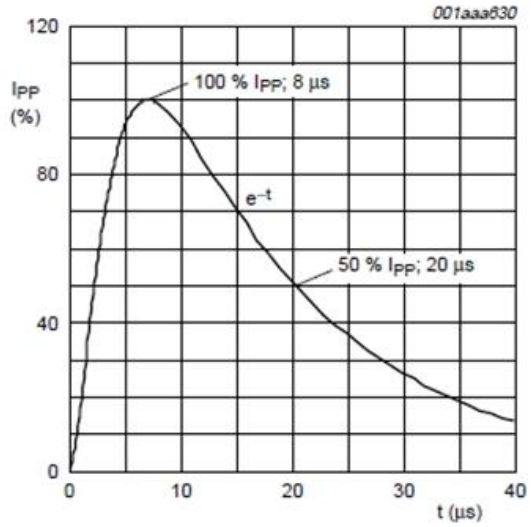


Fig1. 8/20us pulse waveform according to IEC61000-4-5

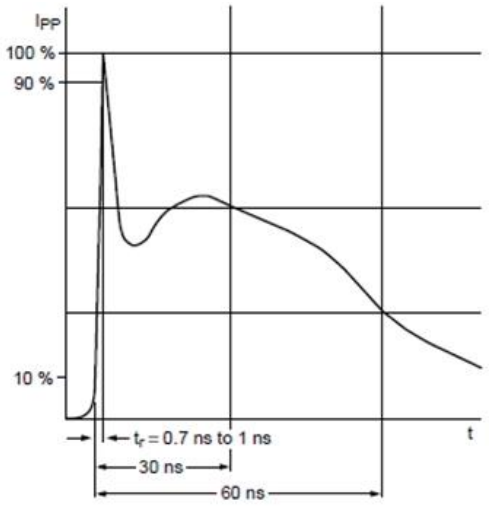


Fig2. ESD pulse waveform according to IEC61000-4-2

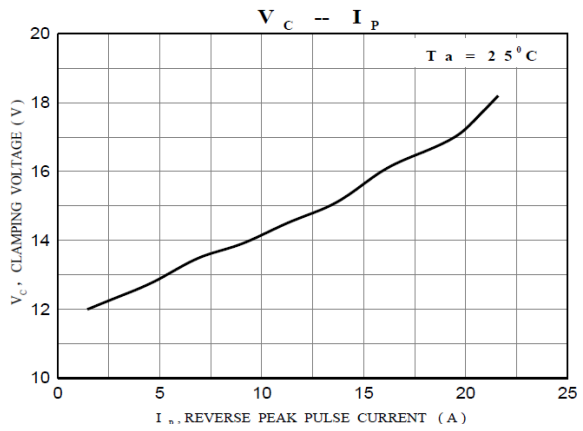


Fig3. VC/IPP Characteristic curve

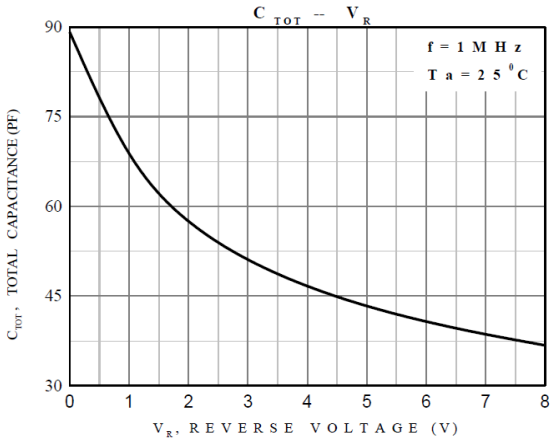
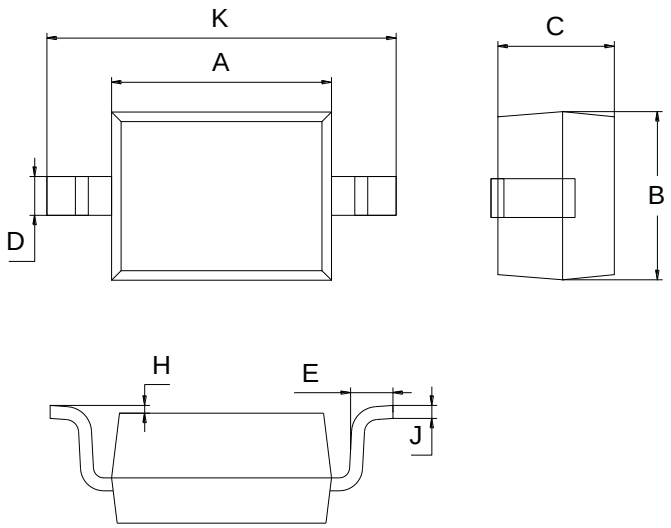


Fig4. VR/CJ Characteristic curve

Single Line TVS Diode GESD8V0D3

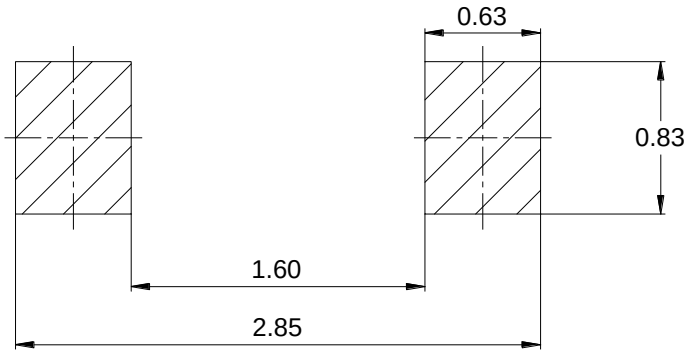
PACKAGE OUTLINE

Plastic surface mounted package SOD-323



SOD-323		
Dim	Min	Max
A	1.60	1.80
B	1.20	1.40
C	0.80	0.90
D	0.25	0.35
E	0.22	0.42
H	0.02	0.10
J	0.05	0.15
K	2.55	2.75
All Dimensions in mm		

SOLDERING FOOTPRINT



Unit: mm

PACKAGE INFORMATION

Device	Package	Shipping
GESD8V0D3	SOD-323	3000 pcs / Tape & Reel