

Plastic-Encapsulate Diodes

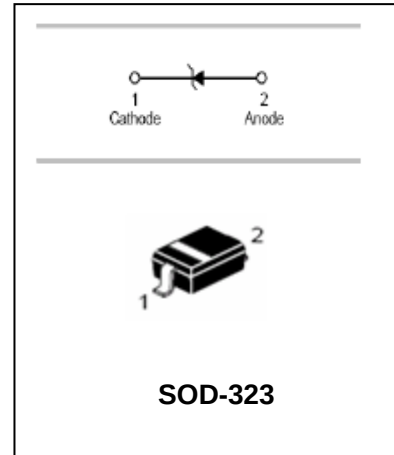
GESD12VD3

FEATURES

- Reverse working(Stand-off) voltages:12V.
- Low leakage.
- Response time is typically<1ns.
- ESD Rating of Class 3(>16kV) per Human Body Model.
- IEC61000-4-2Level 4ESD Protection.



HF



APPLICATIONS

- Designed to protect voltage sensitive components
- From ESD and transient.

ORDERING INFORMATION

Type No.	Marking	Package Code
GESD12VD3□	N3	SOD-323

□: none is for Lead Free package;
“G” is for Halogen Free package.

MAXIMUM RATING @ Ta=25°C unless otherwise specified

Parameter	Symbol	Limits	Unit
IEC 61000-4-2 (ESD) Air Contact	V_{ESD}	± 30	kV
ESD voltage per human body model per machine model	V_{ESD}	16 400	kV V
Total power dissipation on FR-5 board(Note 1)	P_D	150	mW
Junction and Storage temperature range	T_j, T_{stg}	-55 to+150	°C
Thermal Resistance Junction-to Ambient	$R_{\theta JA}$	833	°C/W
Lead solder temperature range (10 Second Duration)	T_L	260	°C

Note 1.FR-5=1.0*0.75*0.62in

Plastic-Encapsulate Diodes

GESD12VD3

ELECTRICAL CHARACTERISTICS @ Ta=25°C unless otherwise specified

Device	Device Marking	V _{RWM} (V)	I _R (μA) @V _{RWM}	V _{BR} (V) @I _T		I _T	V _C @ I _{PP}	I _{PP}	V _C @ Max I _{PP}	P _{PK}	C(pF)
		Max.	Max.	Min.	Max.	mA	V	A	V	W	pF
GESD12VD3G	N3	12	1.0	13.3	15.7	1.0	25	9.6	29	240	55

TYPICAL CHARACTERISTICS @ Ta=25°C unless otherwise specified

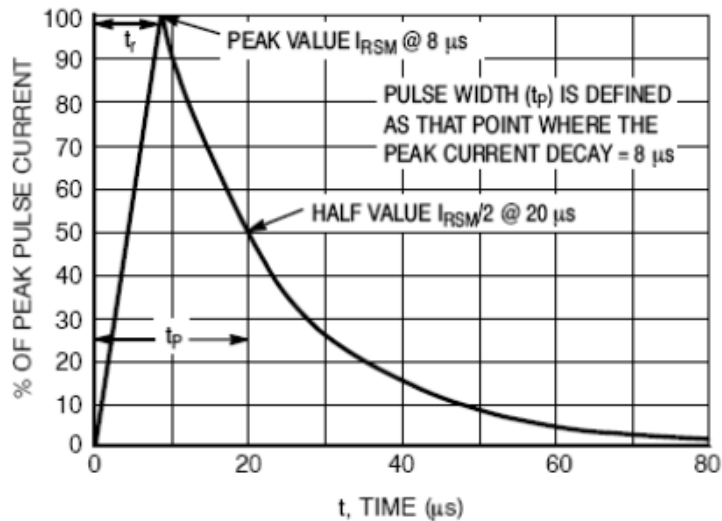


Figure 1. 8 x 20 μs Pulse Waveform

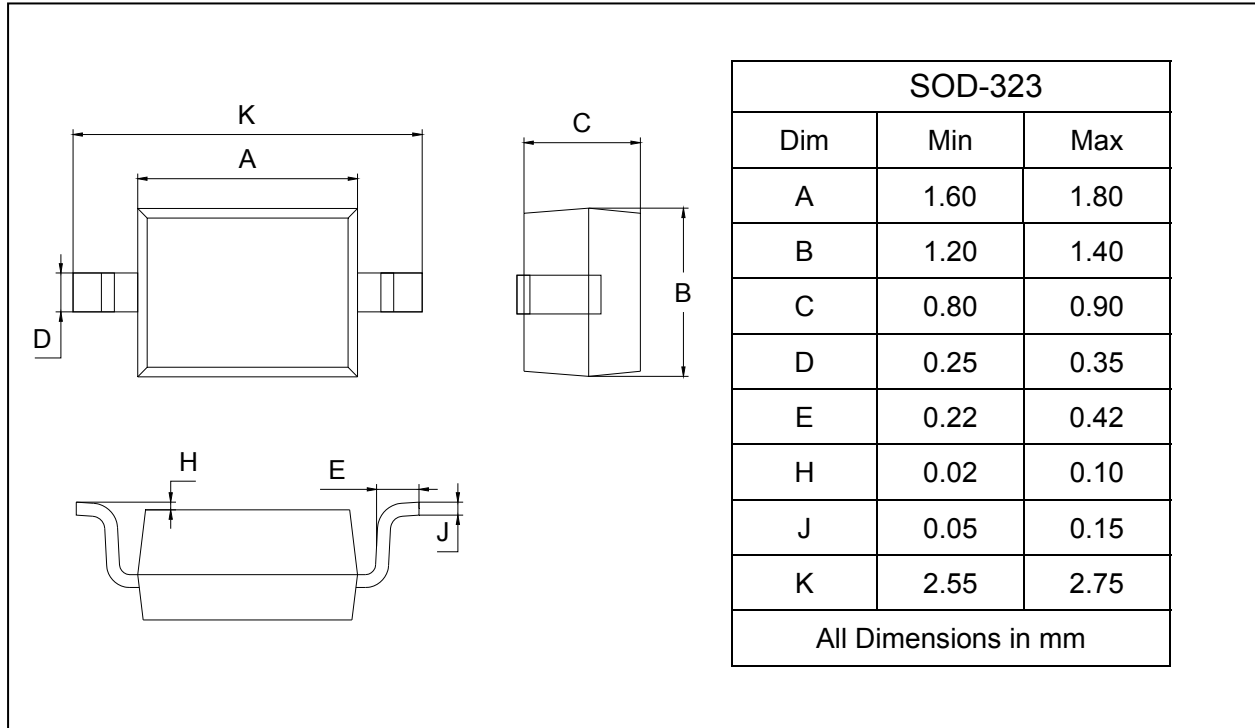
Plastic-Encapsulate Diodes

GESD12VD3

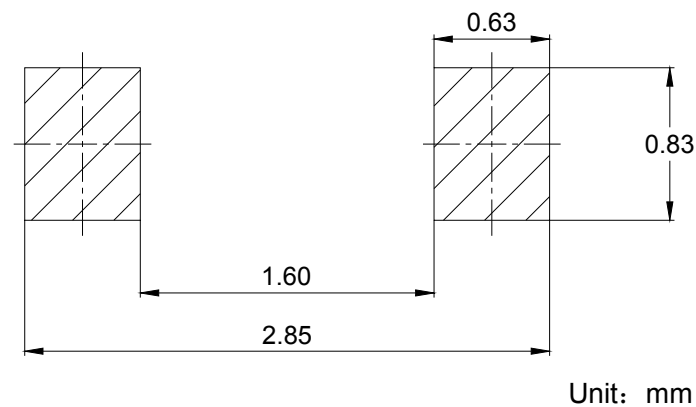
PACKAGE OUTLINE

Plastic surface mounted package

SOD-323



SOLDERING FOOTPRINT



PACKAGE INFORMATION

Device	Package	Shipping
GESD12VD3	SOD-323	3000/Tape&Reel