Elektronische Bauelemente

QG120A-C

Voltage 2000V, 1.0 Amp

Surface Mount Glass Passivated Standard Rectifier

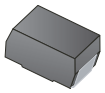
RoHS Compliant Product

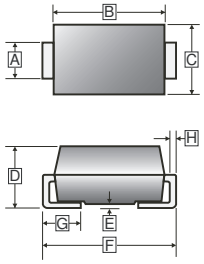
A suffix of "-C" specifies halogen-free and RoHS Compliant

FEATURES

- Ideal for surface mount applications
- Glass passivated Standard rectifiers
- High reverse voltage
- High forward surge capability
- Moisture sensitivity: level 1, per J-STD-020

SMA



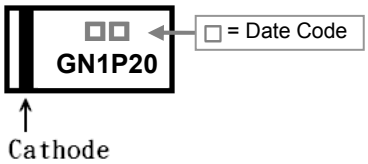


REF.	Millimeter		REF.	Millimeter	
	Min.	Max.		Min.	Max.
A	1.23	1.65	E	-	0.3
B	3.99	4.75	F	4.70	5.28
C	2.30	2.90	G	0.75	1.52
D	1.90	2.62	H	0.15	0.31

MECHANICAL DATA

- Molded epoxy body, Epoxy meets UL 94V-0 flammability rating
- Terminal:Matte tin plated leads, solderable per J-STD-002 and JESD22B-106
- Polarity: Indicated by cathode band

MARKING



PACKAGE INFORMATION

Package	MPQ	Leader Size
SMA	5K	13 inch

ORDER INFORMATION

Part Number	Type
QG120A-C	Lead (Pb)-free and Halogen-free

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS (T_A=25°C unless otherwise noted)

Parameters	Symbol	Ratings	Unit
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	2000	V
Maximum RMS Voltage	V_{RMS}	1400	V
Maximum DC Blocking Voltage	V_{DC}	2000	V
Maximum Average Forward Rectified Current	$I_{F(AV)}$	1	A
Peak Forward Surge Current, @8.3ms single half sine-wave superimposed on rated load	I_{FSM}	30	A
Maximum Forward Voltage @I_F=1A	V_F	1.2	V
Maximum DC Reverse Current @Rated DC Blocking Voltage @T_A=25°C	I_R	5	μA
Typical Junction Capacitance [1]	C_J	5.4	pF
Typical Thermal Resistance from Junction-Ambient [2]	$R_{\theta JA}$	10	°C/W
Operating Junction and Storage Temperature Range	T_J, T_{STG}	-55~150	°C

Notes:

1. Measured at 1MHz and applied reverse voltage of 4V D.C.
2. 8×8mm copper pads to each terminal

RATINGS AND CHARACTERISTIC CURVES

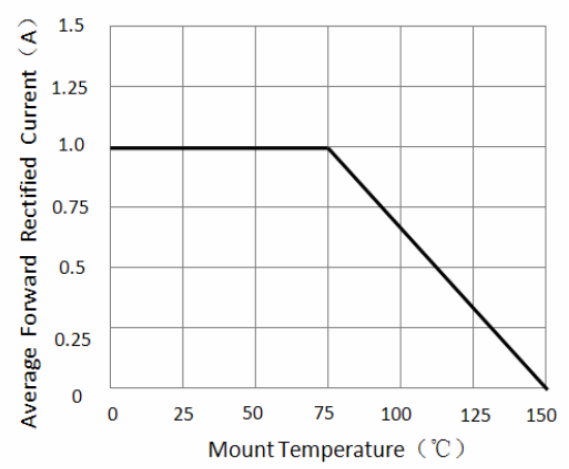


Figure 1.Forward Current Derating Curve

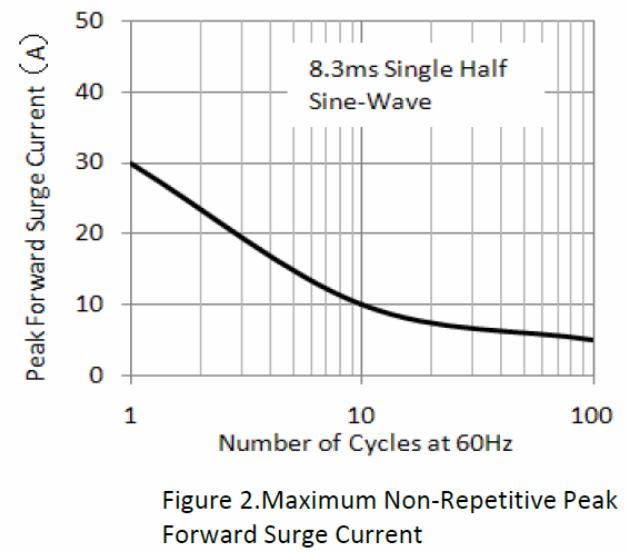


Figure 2.Maximum Non-Repetitive Peak Forward Surge Current

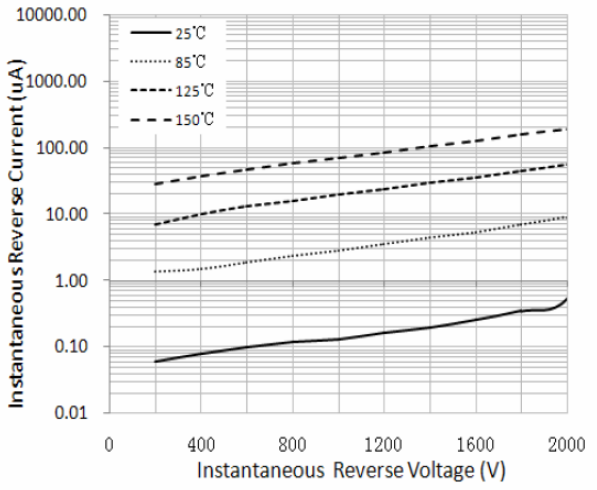


Figure 3. Typical Reverse Characteristics

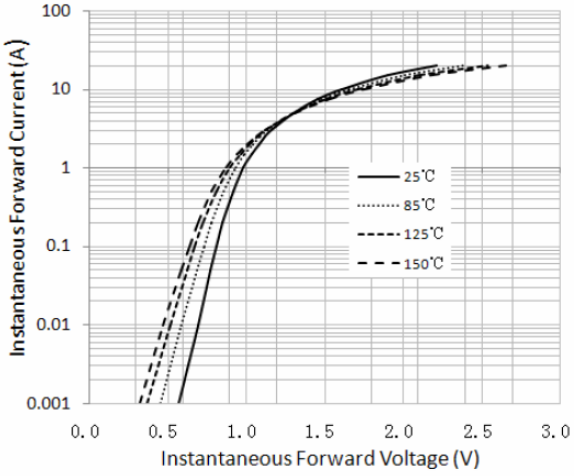


Figure 4. Typical Instantaneous Forward Characteristics

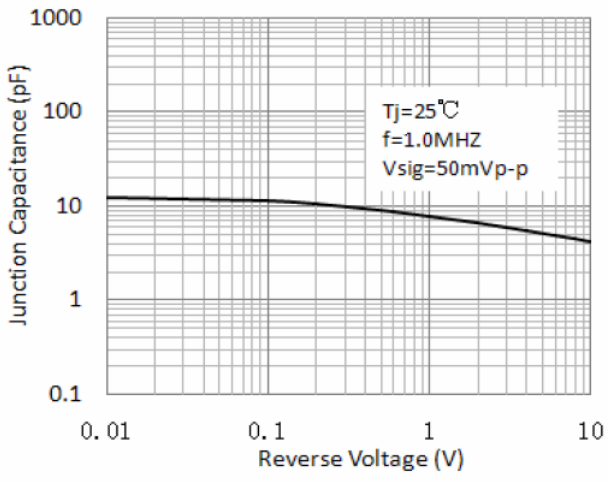


Figure 5. Typical Junction Capacitance