



# BG01,BG03,BG05,BG10

## GLASS PASSIVATED SILICON FAST RECOVERY DIODE

### Features:

1. Silicon diffusion mesa.
2. Glass Passivated package.
3. Small volume, light weight.
4. Small high-temperature leakage.
5. Good thermal stability.
6. High reliability.
7. Implementation of standards: GJB33A-97, QZJ840611A, QZJ840611



### TECHNICAL DATA:

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

Parameter name	Symbols	Unit	Specifications				Test Condition
			BG01	BG03	BG05	BG10	
Use for	High-frequency, switch circuit.						
Store temperature	T	$^\circ\text{C}$	-55~+150				
Quality Class			JP, JT, JCT, GS, G, G+				
Peak Repetitive Reverse Voltage	$V_{RRM}$	V	50~1400				
Average Forward Current	$I_{F(AV)}$	A	0.1	0.3	0.5	1.0	
Peak Forward Voltage	$V_{FM}$	V	2.2	2.2	A~G:2.2 H~J:2.5	A~G:2.2 H~J:2.5	$I=AI_{F(AV)}, A=3.1415926$
Average Forward Voltage	$V_F$	V	1.2	1.2	A~G:1.0 H~J:1.5	A~G:1.2 H~J:1.5	$I=I_{F(AV)}$
Non-repeat Forward Surge Current	$I_{FSM}$	A	6	6	15	30	Single-phase industrial frequency sine half wave 10ms
Peak Reverse Current	$I_{RM1}$	$\mu\text{A}$	10				$V_R=V_{RRM}, T_a=25^\circ\text{C}$
Peak Reverse Current	$I_{RM2}$	$\mu\text{A}$	200				$V_R=V_{RRM}, T_a=125^\circ\text{C}$
Junction Temperature	$T_{jm}$	$^\circ\text{C}$	150				
Reverse Recovery Time	$t_{rr}$	$\mu\text{S}$	1				$V_R=10\text{V}, I_F=50\text{mA}, R_L=75\text{ohm}$

### SPECIFICATIONS:

A	B	C	D	E	F	G	H	I	J
50V	100V	200V	300V	400V	600V	800V	1000V	1200V	1400V

### Outline and Dimensions:

Model cross: BG03(2CZ104,BZG03), BG05(2CZ105,BZG05), BG10(2CZ106,BZG1)