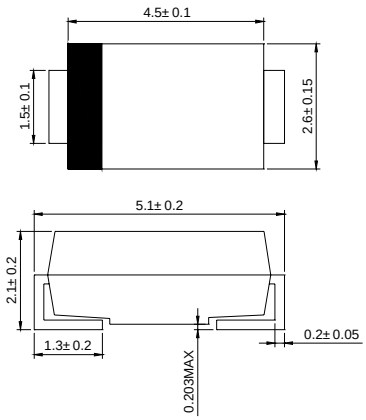
BYG20D-BYG20J

Ultra Fast SMD Rectifiers

VOLTAGE RANGE: 200 -- 600V

CURRENT: 1.5 A

SMA



Dimensions in millimeters

Features

- ◇ For surface mounted applications
- ◇ Glass passivated junction
- ◇ Low forward voltage drop
- ◇ High current capability
- ◇ Easily cleaned with Alcohol,Isopropnol and similar solvents
- ◇ The plastic material carries U/L recognition 94V-0

Mechanical Data

- ◇ Case: JEDEC SMA,molded plastic
- ◇ Polarity: Color band denotes cathode end
- ◇ Weight: 0.002 ounces, 0.064 grams
- ◇ Mounting position: Any

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25℃ ambient temperature unless otherwise specified.

Single phase,half wave,50 Hz,resistive or inductive load. For capacitive load,derate by 20%.

		BYG20D	BYG20G	BYG20J	UNITS
Maximum recurrent peak reverse voltage	V_{RRM}	200	400	600	V
Maximum RMS voltage	V_{RMS}	140	280	420	V
Maximum DC blocking voltage	V_{DC}	200	400	600	V
Average forward rectified current	$I_{F(AV)}$	1.5			A
Peak forward surge current 10 ms single half-sine-wave superimposed on rated load	I_{FSM}	30			A
Maximum instantaneous forward voltage @ 1.0 A @ 1.5 A	V_F	1.3 1.4			V
Maximum reverse current @T_A=25℃ at rated DC blocking voltage @T_A=100℃	I_R	1.0 10			μA
Reverse recovery time (Note1)	t_{rr}	75			ns
Typical thermal resistance (Note2)	R_{thJL}	25			K/W
Typical thermal resistance (Note3)	R_{thJA}	125			K/W
Operating temperature range	T_j	- 55 -- +150			℃
Storage temperature range	T_{STG}	- 55 -- +150			℃

NOTE: 1. Reverse recovery test conditions: I_F=0.5A,I_R=1.0A,I_{rr}=0.25A.

2. Thermal resistance from junction to lead.

3. Thermal resistance from junction to ambient.mounted on epoxy-glass hard tissue,50mm ^{2} 35μm Cu.

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Ratings AND Charactieristic Curves

FIG.1 – FORWARD DERATING CURVE

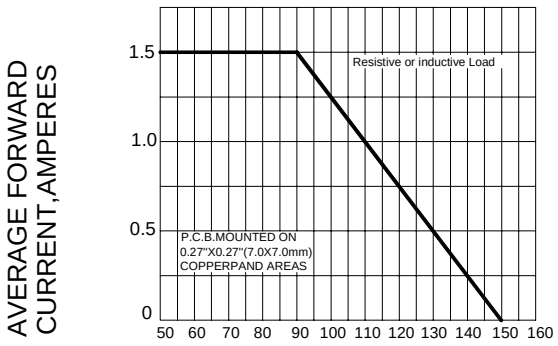

FIG.2–PEAK FORWARD SURGE CURRENT

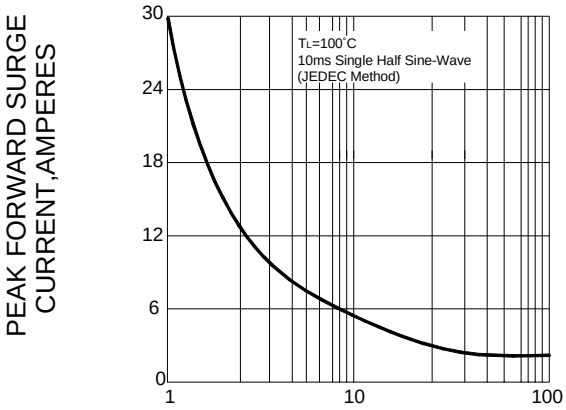

FIG.3 –TYPICAL FORWARD CHARACTERISTIC

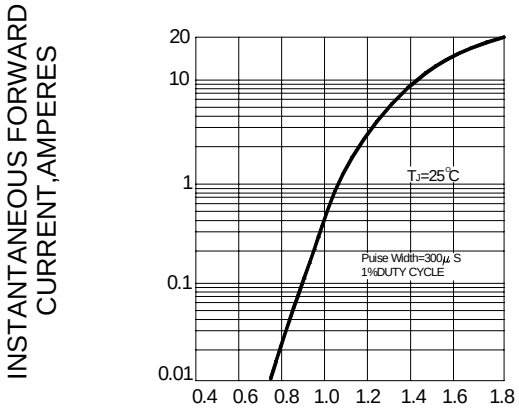

FIG.4 – TYPICAL REVERSE CHARACTERISTICS