

## **SFF2008GA**

Isolated 20.0Amps Glass Passivated Super Fast Rectifiers

### **ITO-220AB**

.185(4.7)





#### Features

- High efficiency, low VF ∻
- High current capability ∻
- ∻ High reliability
- ♦ High surge current capability
- ♦ Low power loss
- For use in low voltage, high frequency inventor, ∻ Free wheeling, and polarity protection application
- ♦ Green compound with suffix "G" on packing code & prefix "G" on datecode

#### **Mechanical Data**

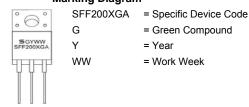
- Case: ITO-220AB Molded plastic ∻
- ♦ Epoxy: UL 94V-0 rate flame retardant
- ♦ Terminals: Pure tin plated, lead free, solderable per MIL-STD-202, Method 208 guaranteed
- ♦ Polarity: As marked
- ∻ High temperature soldering: 260°C/10 seconds/.16",(4.06mm) from case
- ♦ Weight: 1.75 grams

## **Maximum Ratings and Electrical Characteristics**

Rating at 25  $^\circ\!\mathrm{C}$  ambient temperature unless otherwise specified. Single phase, half wave, 60 Hz, resistive or inductive load. For capacitive load, derate current by 20%

.124(3.16) .098(2.5)	.374(	10.3)MAX 9.6) 4.4)DIA .0)DIA	<u>.125(3.2)</u> .936(2.4)
	<u>.272(6.9)</u> .248(6.3)		.606(15.5) .583(14.8)
.117(2.96). .090(2.3) .030(0.76) .018(0.46)	.057(1.45) .037(0.95) .020(0.5)		•
	.100(2.54) TYP - .105(2.67) .095(2.41) PIN 1 O-H PIN 3 O-H	.100(2.54) .105(2.67 .095(2.41	)

#### **Dimensions in inches and (millimeters)** Marking Diagram



= Green Compound

- = Year

# = Work Week

Type Number	Symbol	SFF2008GA	Unit
Maximum Repetitive Peak Reverse Voltage	V <sub>RRM</sub>	600	V
Maximum RMS Voltage	V <sub>RMS</sub>	420	V
Maximum DC Blocking Voltage	V <sub>DC</sub>	600	V
Maximum Average Forward Rectified Current @T_c=100 $^\circ\!$	I <sub>F(AV)</sub>	20	А
Peak Forward Surge Current, 8.3 ms Single Half Sine- wave Superimposed on Rated Load (JEDEC method)	I <sub>FSM</sub>	150	А
Maximum Instantaneous Forward Voltage @ 10A	V <sub>F</sub>	1.7	V
Maximum Reverse Current @ Rated VR $T_A=25$ °C (Note 1) $T_A=100$ °C	I <sub>R</sub>	10 400	uA
Maximum Reverse Recovery Time (Note 2)	Trr	35	nS
Typical Junction Capacitance (Note 3)	Cj	90	pF
Typical Thermal Resistance	R <sub>θjC</sub>	7	
Operating Temperature Range	TJ	- 65 to + 150	
Storage Temperature Range	T <sub>STG</sub>	- 65 to + 150	

Note 1: Pulse Test with PW=300 usec, 1% Duty Cycle

Note 2: Reverse Recovery Test Conditions: I<sub>F</sub>=0.5A, I<sub>R</sub>=1.0A, I<sub>RR</sub>=0.25A

Note 3: Measured at 1 MHz and Applied Reverse Voltage of 4.0V D.C.

Version:A10



### RATINGS AND CHARACTERISTIC CURVES (SFF2008GA)

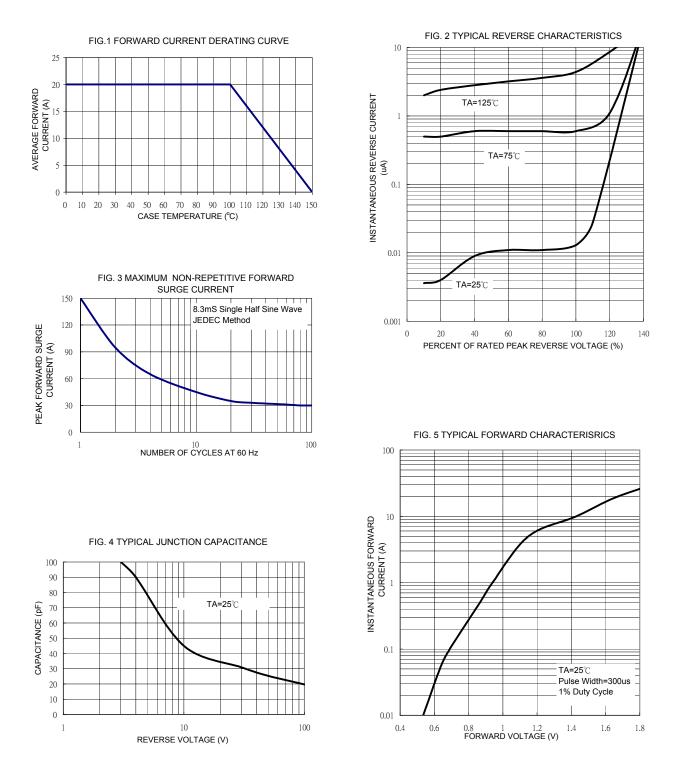


FIG.6- REVERSE RECOVERY TIME CHARACTERISTIC AND TEST CIRCUIT DIAGRAM

