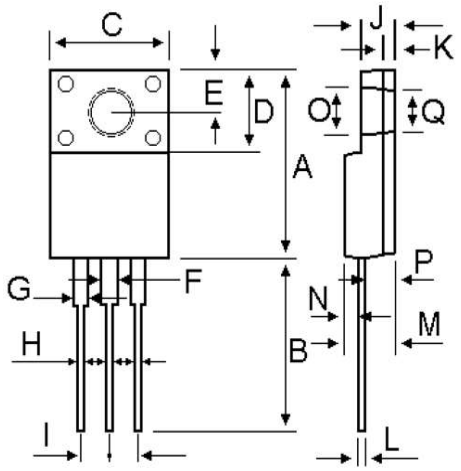
Glass Passivated Super Fast Rectifiers
Reverse Voltage 50 to 600 Volts Forward Current 8.0 Amperes

Features
- Low Forward Voltage.
- Low Switching noise.
- High Current Capability
- Low Power Loss & High efficiency.
- For use in low voltage, high frequency inventor, free wheeling, and polarity protection application

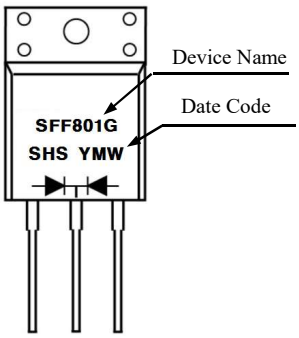
Mecnanical Data
- Case :JEDEC ITO-220AB molded plastic body
- Epoxy : UL 94V-0 rate flame retardant
- Termals: Pure tin plated , lead free. solderable per MIL-STD-202, Method 208 quaranted
- High temperature soldering guaranteed:260℃/10 seconds 0.25",(6.35mm) from case.
- Polarity:As marked
- Mounting Torqure: 4-6kg.cm
- Weight:2.24 g approx.

ITO-220AB

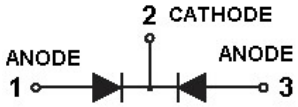


DIM	MILLIMETERS	
	MIN	MAX
A	15.05	15.15
B	13.35	13.45
C	10	10.1
D	6.55	6.65
E	2.65	2.75
F	1.55	1.65
G	1.15	1.25
H	0.55	0.65
I	2.5	2.6
J	3	3.2
K	1.1	1.2
L	0.55	0.65
M	4.4	4.6
N	1.15	1.25
P	2.65	2.75
O	3.35	3.45
Q	3.15	3.25

Marking



Equivalent Circuit



Maximum Ratings & Electrical Characteristics

Ratings at 25℃ ambient temperature unless otherwise specified
Single phase half wave 60 Hz, resistive or inductive load
For capacitive load, derate current by 20%

Parameter	Symbol	SFF 801G	SFF 802G	SFF 803G	SFF 804G	SFF 805G	SFF 806G	SFF 807G	SFF 808G	Unit	Remark
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	50	100	150	200	300	400	500	600	V	
Maximum RMS Voltage	V_{RMS}	35	70	105	140	210	280	350	420	V	
Maximum DC Blocking Voltage	V_{DC}	50	100	150	200	300	400	500	600	V	
Maximum Average Forward Rectified Current	$I_F(AV)$	8.0								A	
Peak Forward Surge Current, 8.3 ms Single Half Sine-wave Superimposed on Rated Load (JEDEC Method)	I_{FSM}	125								A	
Maximum Instantaneous Forward Voltage	V_F	0.975				1.3		1.7		V	I_F=4.0A
Maximum DC Reverse Current at Rated DC Blocking Voltage	I_R	10								uA	Ta=25℃
		400								uA	Ta=100℃
Maximum Reverse Recovery Time	trr	35								ns	Note 1
Typical Junction Capacitance	C_J	80				60				pF	Note 2
Typical Thermal Resistance	Rth(j-c)	1.5								℃ /W	Note 3
Operation Junction Temperature Range	T_J	-55 to +150								℃	
Storage Temperature Range	T_{STG}	-55 to +150								℃	

Note 1. Reverse Recovery Test Conditions : I_F=0.5A, I_R=1.0A, I_{RR}=0.25A
Note 2. Measured at 1MHz and Applied Reverse Voltage of 4.0Volts D.C.
Note 3. Mount on Heatsink Size of 2in ×3in × 0.25 in Al-Plate.

Ratings and Characteristics Curves (Ta=25°C unless otherwise noted)

Fig.1 Forward Current Derating Curve

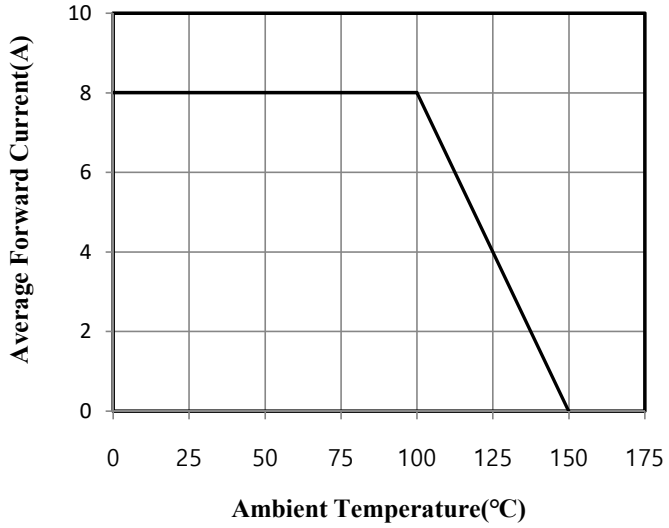


Fig.2 Maximum Non-Repetitive Peak Forward Surage Current

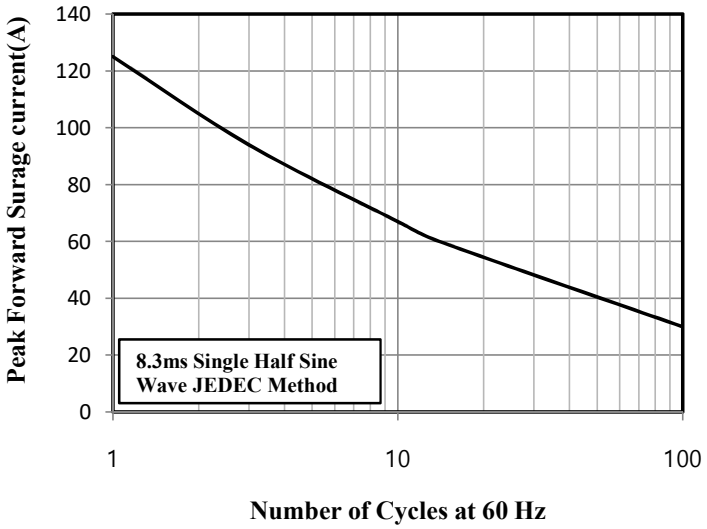


Fig.3 Typical Instantaneous Forward Characteristics

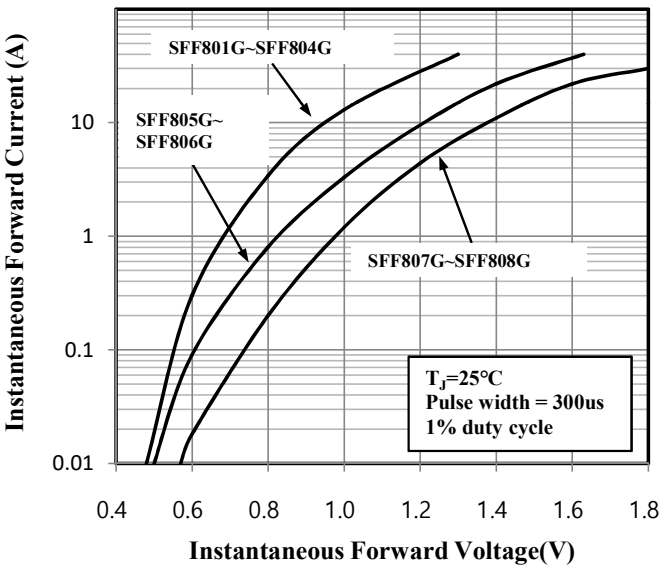


Fig.4 Typical Junction Capacitance

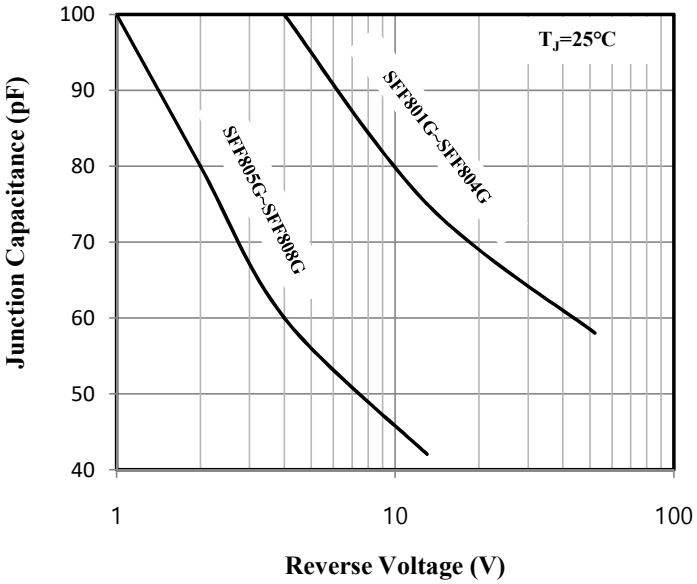


Fig.5 Typical Reverse Charateristics

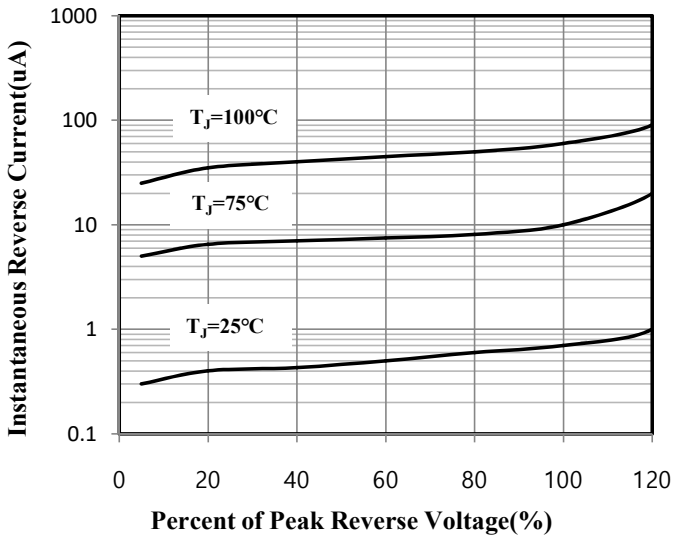


Fig. 6 Reverse Recovery Time Charateristic and Test Circuit Diagram