



# SS1020FL~SS10100FL

## SURFACE MOUNT SCHOTTKY BARRIER RECTIFIER

**VOLTAGE** 20 to 100 Volts **CURRENT** 1.0 Amperes

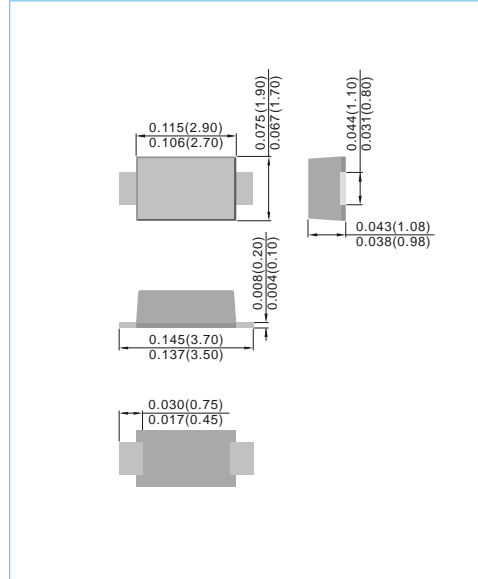
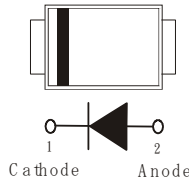
**SOD-123FL** Unit : inch(mm)

### FEATURES

- Fast switching speed
- Surface mount package ideally suited for automatic insertion
- Low power loss, high efficiency
- Lead free in comply with EU RoHS 2002/95/EC directives.
- Green molding compound as per IEC61249 Std. . (Halogen Free)

### MECHANICAL DATA

- Case: SOD-123FL, Plastic
- Terminals: Solderable per MIL-STD-750, Method 2026
- Apporx. Weight: 0.0006 ounces, 0.0173 grams
- Polarity : Color band denotes cathode end



### ABSOLUTE RATINGS (T<sub>A</sub>=25°C unless otherwise noted)

PARAMETER	SYMBOL	SS1020FL	SS1030FL	SS1040FL	SS1060FL	SS10100FL	UNITS
Marking Code	-	G2	G3	G4	G6	G10	-
Reverse Voltage	V <sub>R</sub>	20	30	40	60	100	V
Peak Reverse Voltage	V <sub>RRM</sub>	20	30	40	60	100	V
Average Rectified Current at T <sub>A</sub> =75°C	I <sub>F(AV)</sub>	1.0					A
Non-repetitive Peak Forward Surge Current at t=8.3ms	I <sub>FSM</sub>	40					A

### ELECTRICAL AND THERMAL CHARACTERISTICS (T<sub>A</sub>=25°C unless otherwise noted)

PARAMETER	SYMBOL	SS1020FL	SS1030FL	SS1040FL	SS1060FL	SS10100FL	UNITS
Minimum Reverse Breakdown Voltage at I <sub>R</sub> =500μA	V <sub>R</sub>	20	30	40	60	100	V
Maximum Forward Voltage at I <sub>F</sub> =1.0A	V <sub>F</sub>	0.55	0.55	0.55	0.70	0.85	V
Reverse Leakage Current at V <sub>RRM</sub>	I <sub>R</sub>	30					μA
Typical Thermal Resistance, Junction to Ambient	R <sub>θJA</sub>	88					°C/W
Typical Junction Capacitance Rating at V <sub>R</sub> =0V	C <sub>J</sub>	60	60	60	50	40	pF
Operating Junction Temperature and Storage Temperature Range	T <sub>J</sub> , T <sub>STG</sub>	-55 to +125					°C

Note.1 Mounted with minimum recommended pad size, PC Board FR4.  
2. T<sub>A</sub>=25°C unless otherwise specified.



# SS1020FL~SS10100FL

## Rating and Characteristic Curves

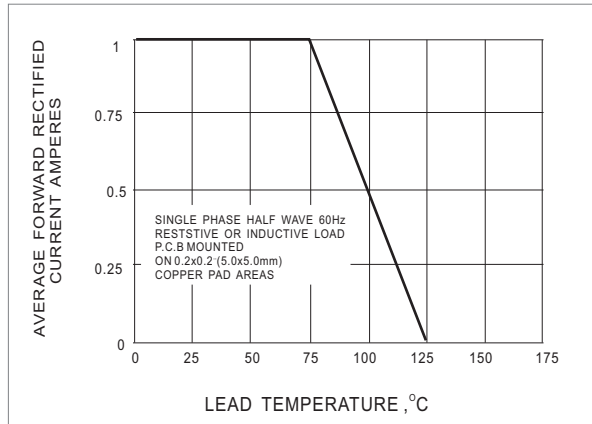


FIG. 1-FORWARD CURRENT DERATING CURVE

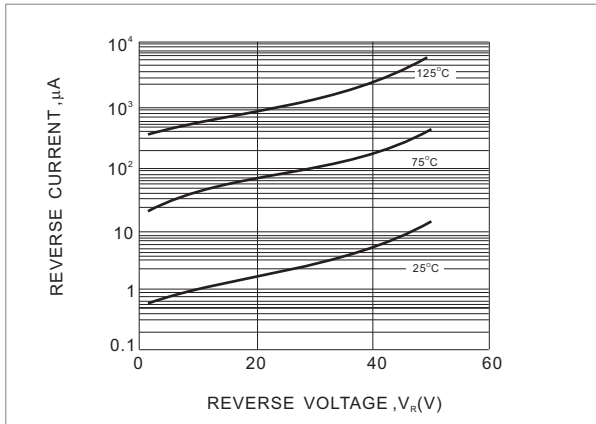


FIG. 2-TYPICAL REVERSE CHARACTERISTIC

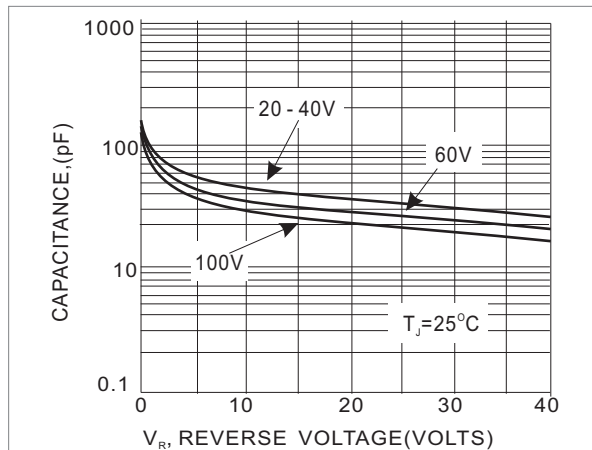


FIG. 3-TYPICAL JUNCTION CHARACTERISTIC

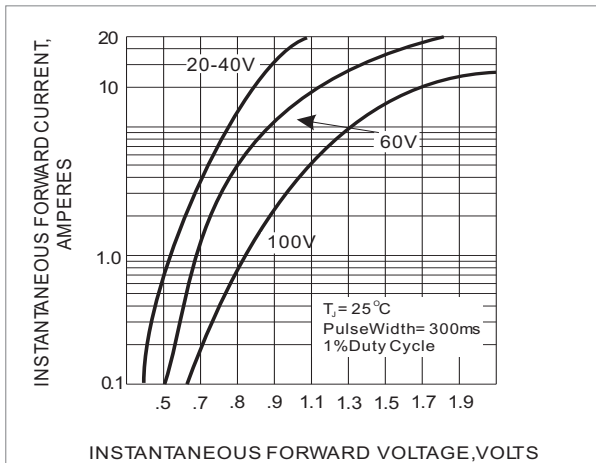
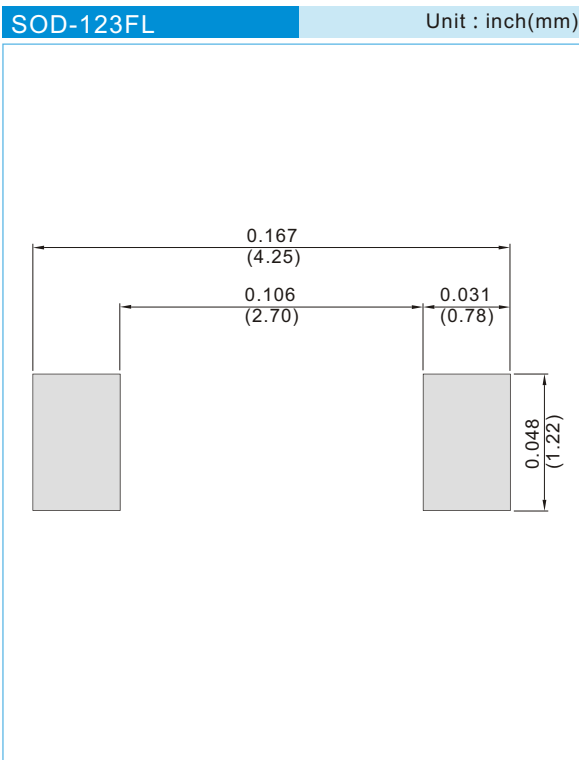


FIG. 4-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS



# SS1020FL~SS10100FL

## MOUNTING PAD LAYOUT



## ORDER INFORMATION

- Packing information
  - T/R - 10K per 13" plastic Reel
  - T/R - 3K per 7" plastic Reel

## LEGAL STATEMENT

### Copyright PanJit International, Inc 2012

The information presented in this document is believed to be accurate and reliable. The specifications and information herein are subject to change without notice. Pan Jit makes no warranty, representation or guarantee regarding the suitability of its products for any particular purpose. Pan Jit products are not authorized for use in life support devices or systems. Pan Jit does not convey any license under its patent rights or rights of others.



# SS1020FL~SS10100FL

For example :

**RB500V-40\_R2\_00001**



Packing Code <b>XX</b>				Version Code <b>XXXXX</b>		
Packing type	1 <sup>st</sup> Code	Packing size code	2 <sup>nd</sup> Code	HF or RoHS	1 <sup>st</sup> Code	2 <sup>nd</sup> ~5 <sup>th</sup> Code
T/B	<b>A</b>	N/A	<b>0</b>	<b>HF</b>	<b>0</b>	serial number
T/R	<b>R</b>	7"	<b>1</b>	<b>RoHS</b>	<b>1</b>	serial number
B/P	<b>B</b>	13"	<b>2</b>			
T/P	<b>T</b>	26mm	<b>X</b>			
TRR	<b>S</b>	52mm	<b>Y</b>			
TRL	<b>L</b>	PBCU	<b>U</b>			
FORMING	<b>F</b>	PBCD	<b>D</b>			

**Part No\_packing code\_Version**

SS1020FL\_R1\_00001

SS1020FL\_R2\_00001