

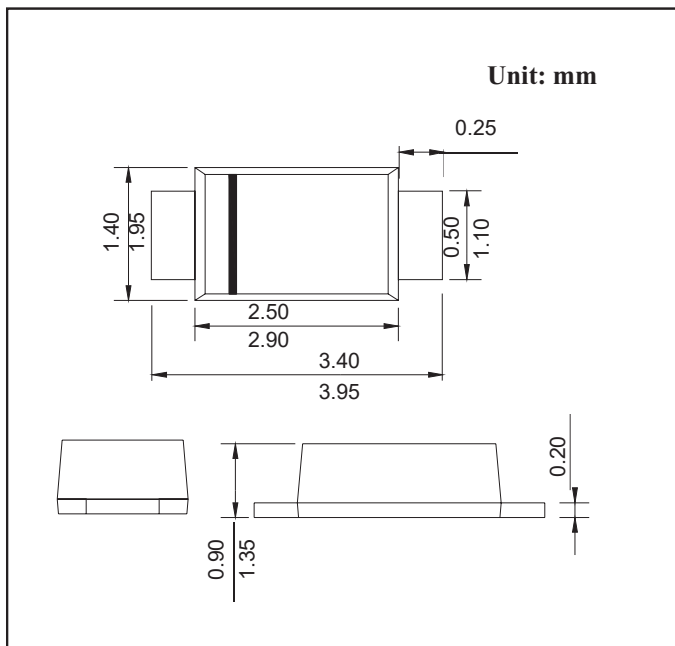
SOD123FL PLASTIC SILICON RECTIFIERS

FEATURES

- Low profile space
- Ideal passivated chip junctions
- Low forward voltage drop
- High forward surge capability
- High temperature soldering guaranteed:260 °C/10 seconds at terminals
- Component in accordance to RoHs 2015/863 and WEEE 2012/19/EU

MECHANICAL DATA

- Case:SOD-123FL molded plastic body over glass passivated chip
- Terminals:Solder plated,solderable per J-STD-002B and JESD22-B102D
- Polarity:Color band denotes cathode end



MAXIMUM RATINGS AND CHARACTERISTICS

@ 25°C Ambient Temperature (unless otherwise noted)

Characteristic		SYMBOLS	SOD4001	SOD4002	SOD4003	SOD4004	SOD4005	SOD4006	SOD4007	UNITS
			DSR1A	DSR1B	DSR1D	DSR1G	DSR1J	DSR1K	DSR1M	
Maximum recurrent peak reverse voltage		V _{RRM}	50	100	200	400	600	800	1000	V
Maximum DC blocking voltage		V _{DC}								
Maximum RMS Voltage		V _{R(RMS)}	35	70	140	280	420	560	700	V
Average rectified output current		I _{O(AV)}	1.0							A
Non-Repetitive Peak Forward Surge Current 8.3ms single half sine-wave superimposed on rated load(JEDECmethod)		I _{FSM}	25.0							A
Forward Voltage @IF=1.0A		V _F	1.1							V
Peak Reverse Current at rated DC blocking voltage	@T _A =25°C	I _{RM}	5.0							μ A
	@T _A =100°C		50.0							
Thermal resistance from junction toambient(Note 1)		R _{θJL}	15							pF
Typical Thermal Resistance Junction to Ambient (Note 2)		R _{θJA}	50							°C/W
Operating Temperature Range		T _j	-55 to+175							°C

NOTES:

1. Mounted on FR-4 P.C.B. with 0.9×1.5mm coper pad areas (≈35μm thick)

RATINGS AND CHARACTERISTIC CURVES

Fig.1 Forward Current Derating Curve

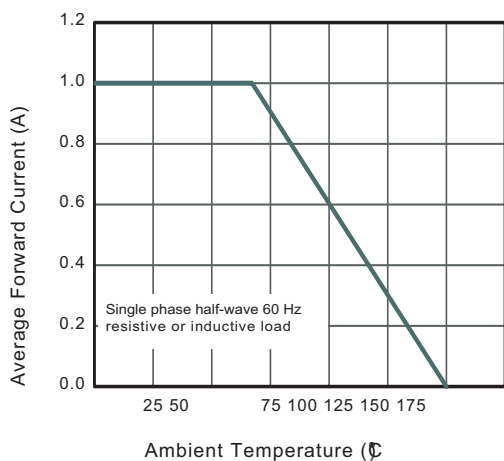


Fig.2 Typical Instaneous Reverse Characteristics

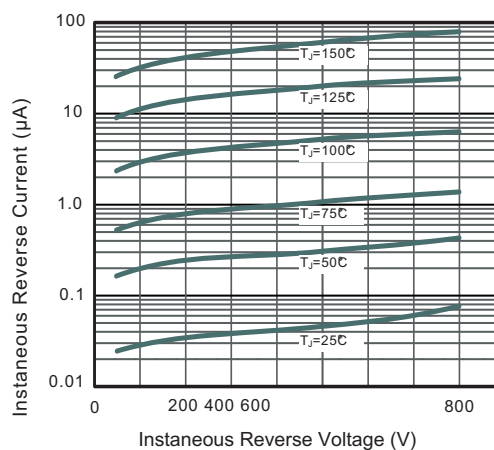


Fig.3 Typical Forward Characteristic

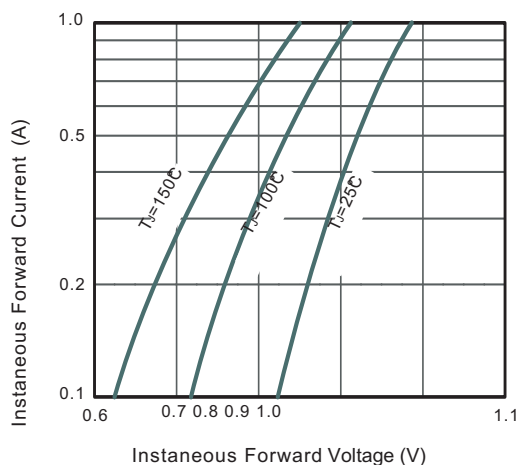


Fig.4 Typical Junction Capacitance

