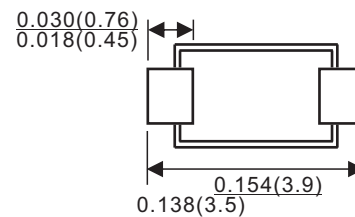
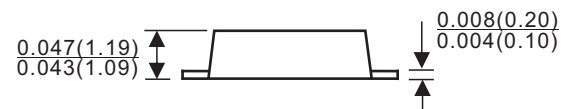
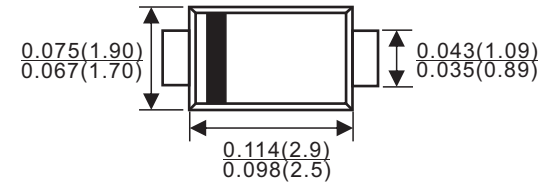




SOD-123FL

### Features

- ◇ Batch process design, excellent power dissipation offers better reverse leakage current and thermal resistance.
- ◇ Low profile surface mounted application in order to optimize board space.
- ◇ Tiny plastic SMD package.
- ◇ High current capability.
- ◇ High surge capability.
- ◇ Glass passivated chip junction.



Dimensions in inches and(millimeters)

### Mechanical data

- ◇ Case : Molded plastic, SOD-123FL
- ◇ Polarity : Indicated by cathode band
- ◇ Mounting Position : Any
- ◇ Weight : Approximated 0.01gram

## Maximum Ratings and Electrical Characteristics

Rating at 25°C ambient temperature unless otherwise specified.

### Maximum ratings

		A1	A2	A3	A4	A5	A6	A7	UNITS
Device marking code		LGEA1	LGEA2	LGEA3	LGEA4	LGEA5	LGEA6	LGEA7	
Maximum recurrent peak reverse voltage	$V_{RRM}$	50	100	200	400	600	800	1000	V
Maximum RMS voltage	$V_{RMS}$	35	70	140	280	420	560	700	V
Maximum DC blocking voltage	$V_{DC}$	50	100	200	400	600	800	1000	V
Maximum average forward rectified current @ $T_A=75$	$I_{(AV)}$	1.0							A
Peak forward surge current 8.3ms single half-sine-wave superimposed on rated load	$I_{FSM}$	25							A
Maximum instantaneous forward voltage @ $I_{FM}=1.0A$ (Note 1)	$V_F$	1.1							V
Maximum DC reverse current @ $T_A=25$ at rated DC blocking voltage @ $T_A=125$	$I_R$	5.0 50							$\mu A$
Typical junction capacitance measured at $f=1MHz, V_R=4.0V$	$C_J$	15							p F
Typical thermal resistance junction to lead	$R_{\theta JL}$	20							/W
Operating temperature range	$T_j$	- 55 --- + 150							
Storage temperature range	$T_{STG}$	- 55 --- + 150							

 NOTE1.Pulse test: pulse width 300 $\mu$ sec,duty cycle 2%.

**Rating and characteristic curves (A1 THRU A7)**

FIG.1-TYPICAL FORWARD CHARACTERISTICS

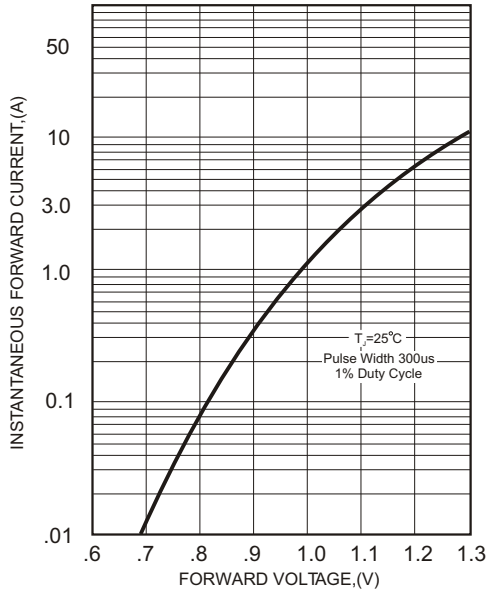


FIG.2-TYPICAL FORWARD CURRENT DERATING CURVE

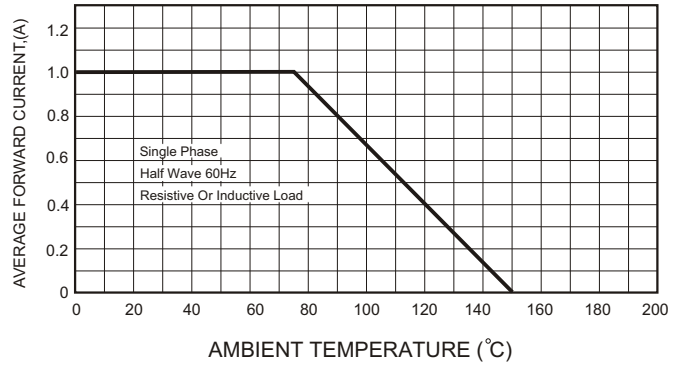


FIG.4-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

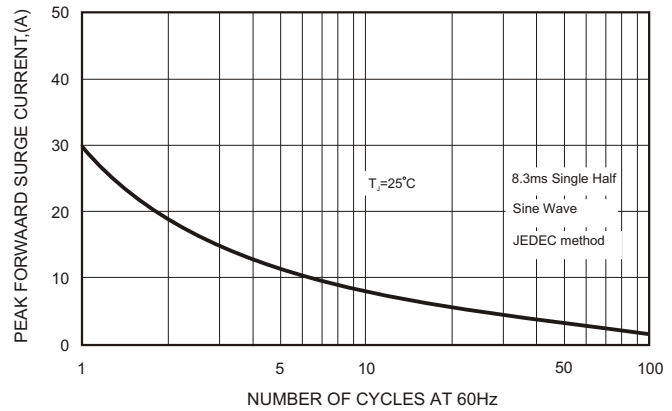


FIG.3 - TYPICAL REVERSE CHARACTERISTICS

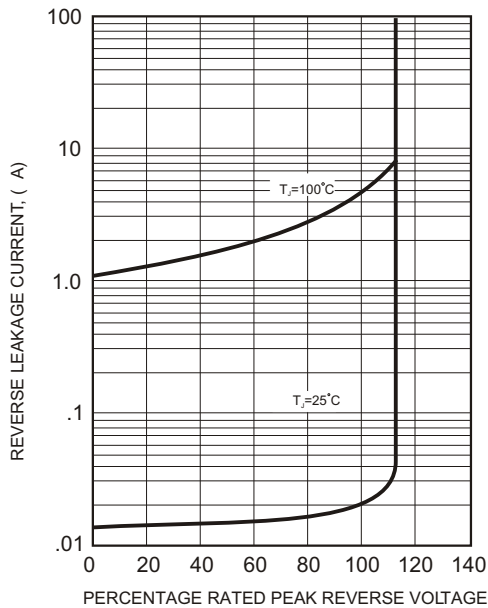
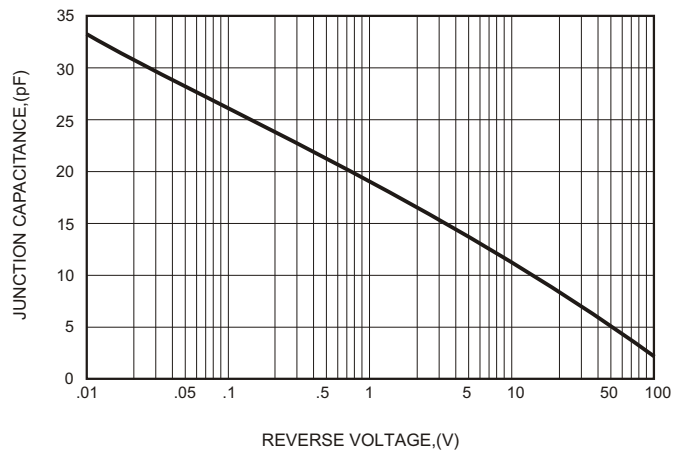


FIG.5-TYPICAL JUNCTION CAPACITANCE



PACKAGE	SPQ/PCS	CARTON SPQ/PCS	CARTON SIZE/CM	CARTON GW/KG	CARTON NW/KG
SOD-123FL	3000/REEL	90000	40X20X22	5.00	4.00