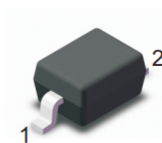


Features

- Low Forward Voltage Drop
- Guard Ring Construction for Transient Protection
- High Conductance
- Also Available in Lead Free Version



Mechanical Data

- Case: SOD-323
- Terminals: Solderable per MIL-STD-750, Method 2026
- Approx. Weight: 5.48mg / 0.00019oz

Pining

PIN	DESCRIPTION
1	Cathode
2	Anode

Maximum Ratings and Electrical characteristics

Ratings at 25°C ambient temperature unless otherwise specified.

Parameter	Symbols	PMEG3005AEA,115-JSM	Units
Peak Repetitive Reverse Voltage	V_{RRM}	30	V
RMS reverse voltage reverse voltage (DC)	V_{RMS}	21	V
Maximum DC Blocking Voltage	V_{DC}	30	V
Maximum Average Forward Current at $T_a=25^{\circ}\text{C}$	I_o	0.5	A
Peak Forward Surge Current, 8.3ms single half sine-wave super imposed on rated load (JEDEC method)	I_{FSM}	22	A
Maximum Instantaneous Forward Voltage	V_F	$I_F=0.1\text{A}$ 0.36	V
		$I_F=0.5\text{A}$ 0.45	
		$I_F=1\text{A}$ —	
Reverse current	I_R	$V_R=10\text{V}$ —	μA
		$V_R=15\text{V}$ 75	
		$V_R=20\text{V}$ 100	
		$V_R=30\text{V}$ 500	
		$V_R=40\text{V}$ —	
Thermal Resistance, Junction to Ambient Air	$R_{\theta JA}$	500	$^{\circ}\text{C/W}$
Junction temperature	T_j	-55 ~ +125	$^{\circ}\text{C}$
Storage temperature	T_{slg}	-55 ~ +150	$^{\circ}\text{C}$

Fig.1 Forward Current Derating Curve

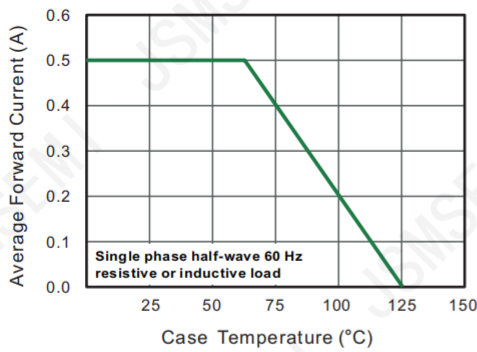


Fig.2 Typical Reverse Characteristics

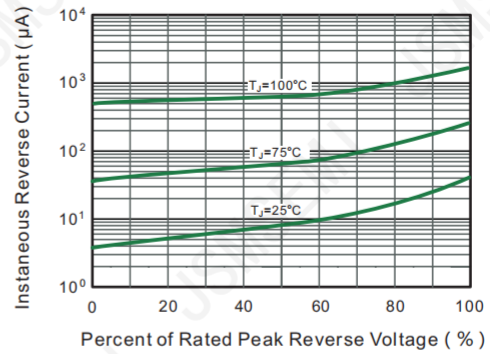


Fig.3 TYPICAL FORWARD VOLTAGE

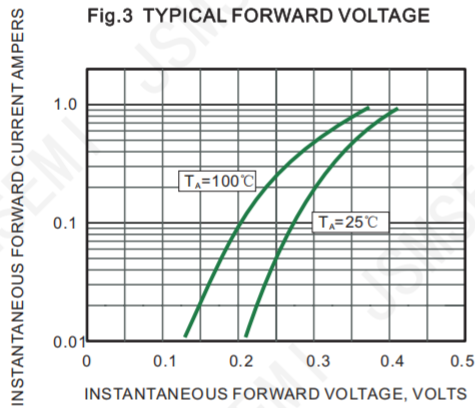


Fig.4 Typical Junction Capacitance

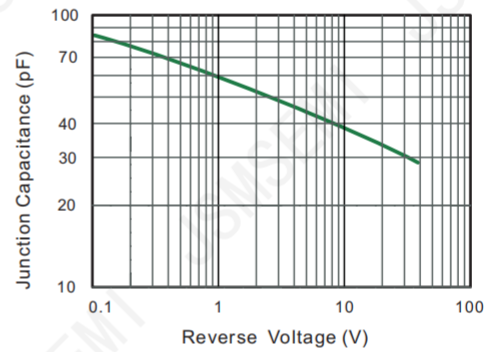


Fig.5 Maximum Non-Repetitive Peak Forward Surge Current

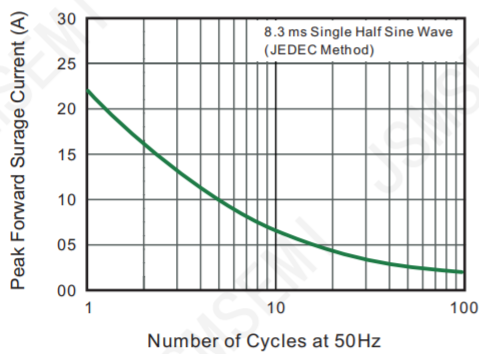
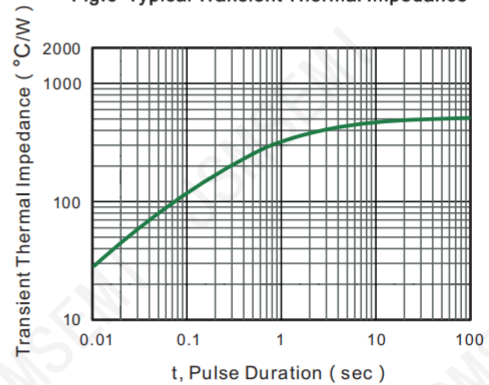
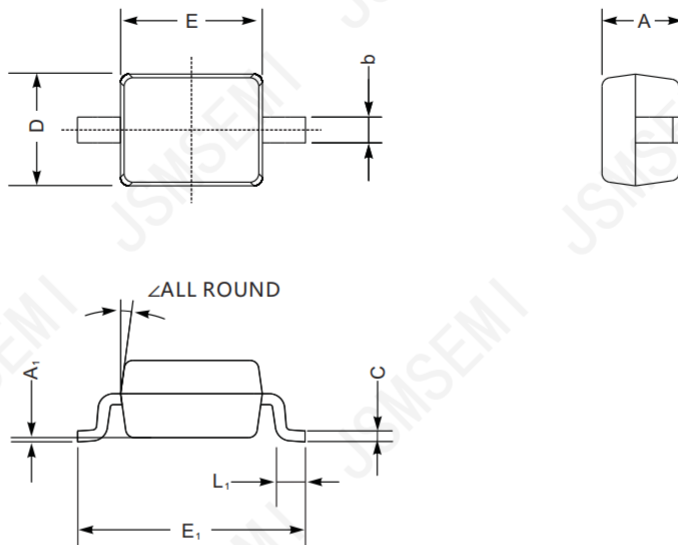


Fig.6 Typical Transient Thermal Impedance



PACKAGE OUTLINE

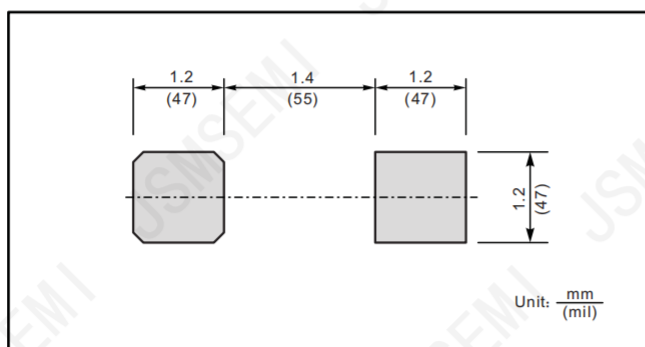
Plastic surface mounted package; 2 leads



SOD-323 mechanical data

UNIT		A	C	D	E	E ₁	b	L ₁	A ₁	∠
mm	max	1.1	0.15	1.4	1.8	2.75	0.4	0.45	0.2	9°
	min	0.8	0.08	1.2	1.4	2.55	0.25	0.2	—	
mil	max	43	5.9	55	70	108	16	16	8	
	min	32	3.1	47	63	100	9.8	7.9	—	

The recommended mounting pad size



Revision History

Rev.	Change	Date
V1.0	Initial version	6/27/2021

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