

**Feature**

- High Surge Current Capability
- Glass passivated chip junction
- Reverse Voltage-100 to 1000V
- Average Rectified Output Current-0.8A
- Design for Surface Mount Application

**Mechanical Characteristics**

- Case: UMB
- Terminals: Solderable per MIL-STD-750, Method 2026

**Maximum Ratings & Thermal Characteristics (TA = 25 °C unless otherwise noted)**

Parameter	Symbol	UM1B	UM2B	UM4B	UM6B	UM8B	UM10B	Units
Maximum Repetitive Peak Reverse Voltage	$V_{RRM}$	100	200	400	600	800	1000	V
Maximum RMS Voltage	$V_{RMS}$	70	140	280	420	560	700	V
Maximum DC Blocking Voltage	$V_{DC}$	100	200	400	600	800	1000	V
Average Rectified Output Current at $T_C=115^{\circ}C$	$I_O$	0.8						A
Peak Forward Surge Current 8.3ms Single Half Sine Wave Superimposed on Rated Load (JEDEC Method)	$I_{FSM}$	25						A
Forward Voltage per element @ $I_F=0.4A$ @ $I_F=0.8A$	$V_F$	1.0 1.1						V
Maximum DC Reverse Current at Rated DC Blocking Voltage @ $T_a=25^{\circ}C$ @ $T_a=125^{\circ}C$	$I_R$	3 30						$\mu A$
Typical Junction Capacitance (Note1)	$C_j$	13						pF
Typical Thermal Resistance (Note2)	$R_{\theta JA}$	110						$^{\circ}C/W$
Operating and storage temperature range	$T_J, T_{STG}$	-55~+150						$^{\circ}C$

**Notes:**

1. Measure at 1MHz and applied reverse voltage of 4 V D.C.
2. P.C.B. mounted with 4X1.5"X1.5" (3.81x3.81 cm) copper pad areas.

Typical Characteristics

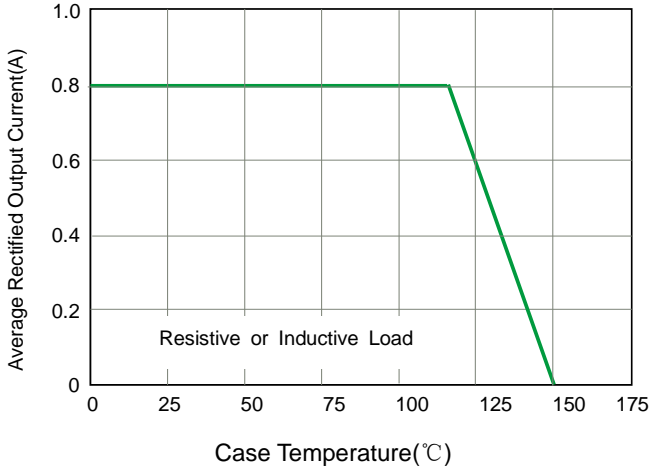


Fig.1 Average Rectified Output Current Derating Curve

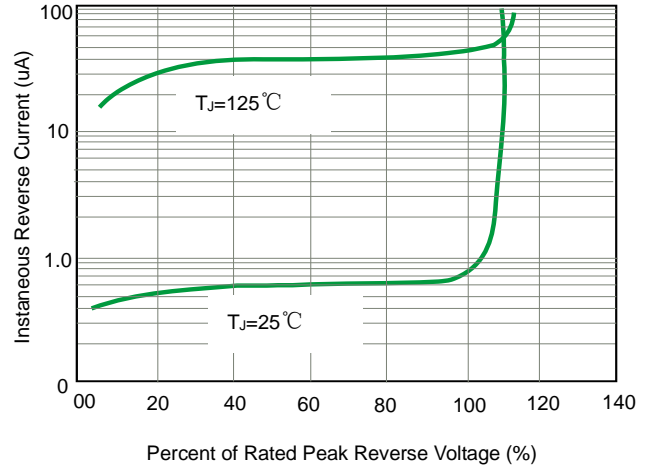


Fig.2 Typical Reverse Characteristics

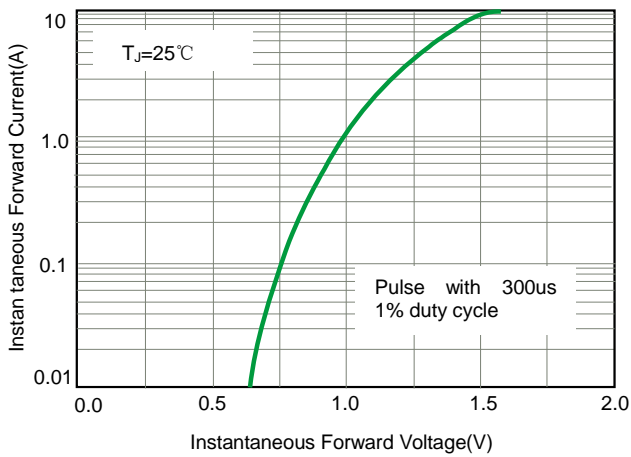


Fig. 3 Typical Instantaneous Forward Characteristics

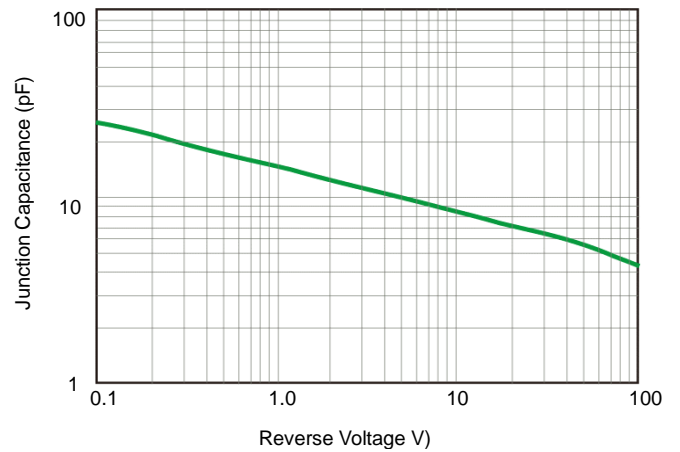


Fig. 4 Typical Junction Capacitance

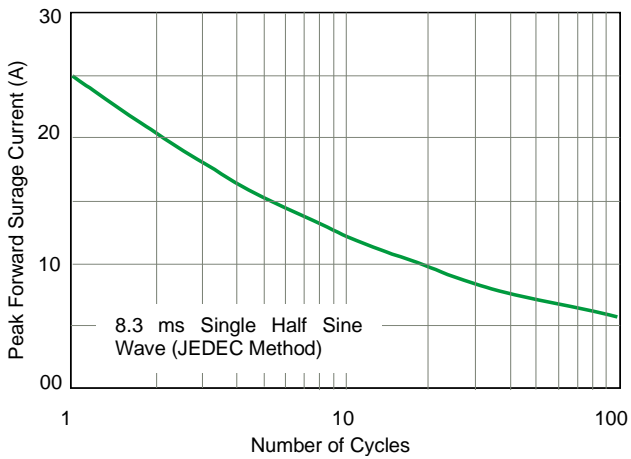
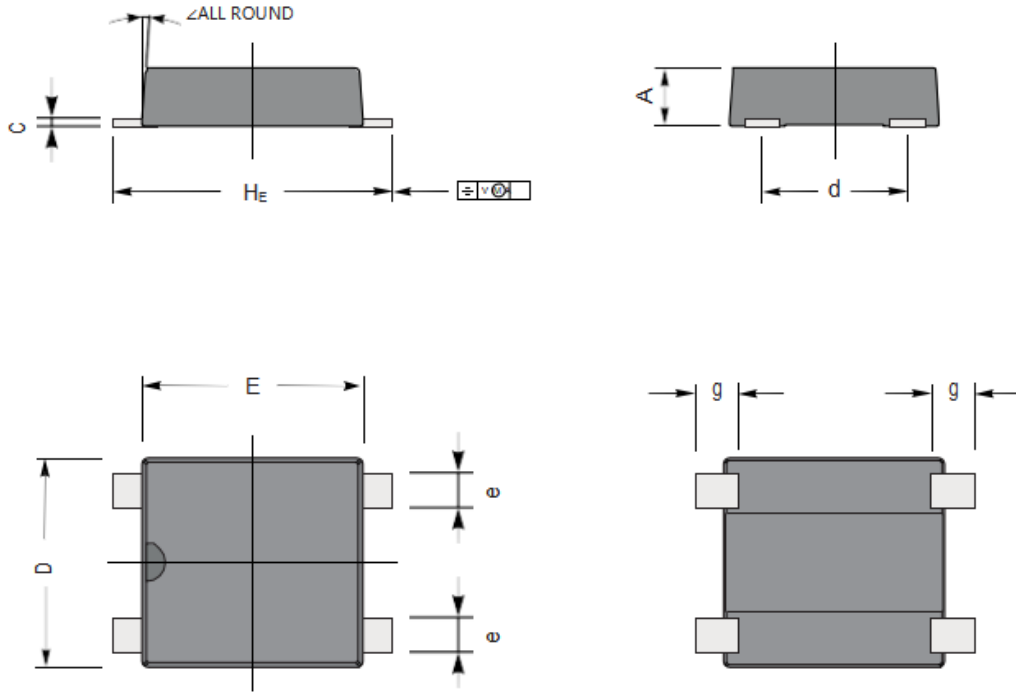


Fig. 5 Maximum Non-Repetitive Peak Forward Surge Current


Product dimension (UMB)



UMB mechanical data

UNIT		A	C	D	E	$H_E$	g	d	e	$\angle$
mm	max	1.2	0.20	3.8	4.0	5.1	0.82	2.7	0.70	7°
	min	1.0	0.12	3.4	3.6	4.6	0.51	2.3	0.51	
mil	max	47	7.9	150	157	201	32	106	28	
	min	39	4.7	134	142	181	20	91	20	

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