

AUMGC10MH
● FEATURES

- * Halogen-free type
- * Compliance to RoHS product
- * Glass passivated cavity-free junction
- * Lead less chip form, no lead damage
- * Low power loss, high efficiency
- * High current capability
- * Plastic package has Underwriters Laboratory Flammability Classification 94V-0
- * Comply with AEC-Q101

● APPLICATION

- * General purpose rectification
- * Surge absorption
- * Automotive

● MECHANICAL DATA

Case : Packed with FRP substrate and epoxy underfilled

Terminals : Pure Tin plated (Lead-Free), solderable per MIL-STD-750, Method 2026.

Polarity : Cathode Band, Laser marking

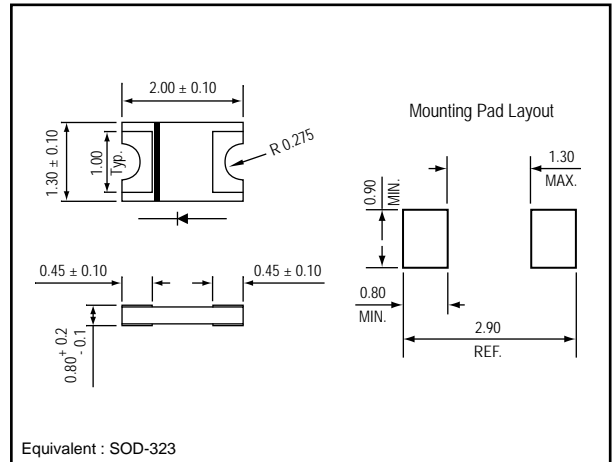
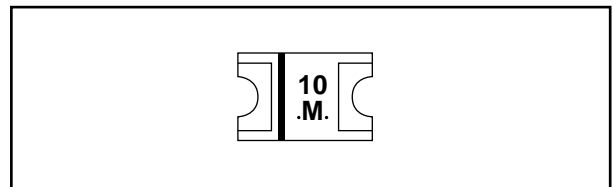
Weight : 0.005 gram

● PACKING

- * 3,000 pieces per 7" (178mm ± 2mm) reel
- * 4 reels per box
- * 6 boxes per carton

● OUTLINE DIMENSIONS
Case : 0805

Unit : mm


● MARKING

Absolute Maximum Ratings (Ta = 25 °C)

ITEM	Symbol	Rating	Unit
Repetitive peak reverse voltage	V _{RRM}	1000	V
RMS voltage	V _{RMS}	700	V
Average forward current	I _{F(AV)}	1.0	A
Peak forward surge current (8.3ms single half sine-wave)	I _{FSM}	15	
Operating junction temperature Range	T _J	-55 to +150	°C
Storage temperature Range	T _{STG}	-55 to +150	

Electrical characteristics (Ta = 25 °C)

ITEM	Symbol	Conditions	Min.	Typ.	Max.	Unit
Forward voltage	V _F	I _F = 0.5A	-	0.94	1.00	V
		I _F = 1.0A	-	1.05	1.30	
Repetitive peak reverse current	I _{RRM}	V _R = Max. V _{RRM} , T _a = 25 °C	-	0.05	2	µA
Junction capacitance	C _j	V _R = 4V, f = 1.0 MHz	-	12	-	pF
Thermal resistance	R _{th(JA)}	Junction to ambient (NOTE 1)	-	195	-	°C/W
	R _{th(JC)}	Junction to case (NOTE 1)	-	85	-	

NOTES : (1) Thermal resistance from junction to ambient and from junction to case P.C.B. mounted on recommended copper pad areas.

(2) Preliminary specification.

FIG.1 - FORWARD CURRENT DERATING CURVE

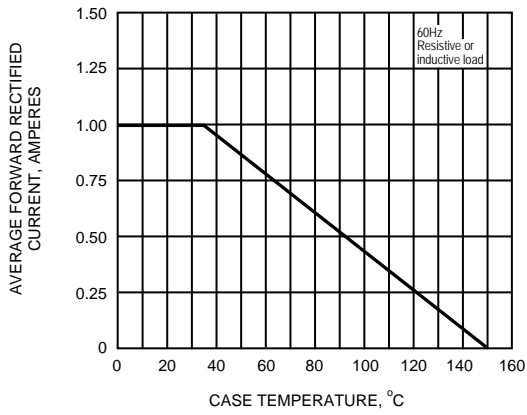


FIG.2 - MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

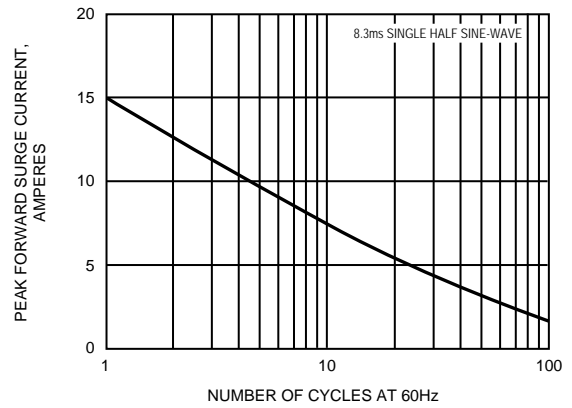


FIG.3 - TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

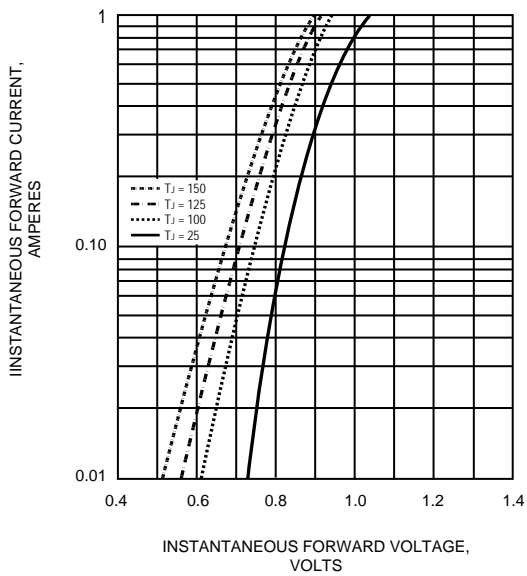


FIG.4 - TYPICAL REVERSE CHARACTERISTICS PER BRIDGE ELEMENT

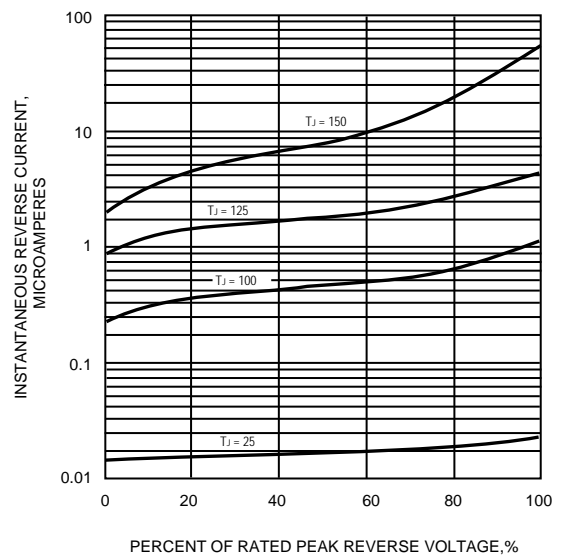


FIG.5 - TYPICAL JUNCTION CAPACITANCE

