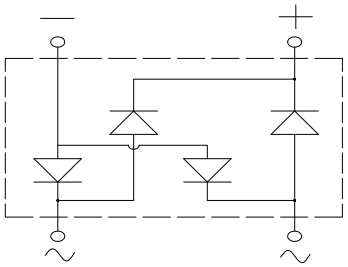
四川旭茂微科技有限公司
Sichuan Xu Mao Micro Technology Co.,Ltd

MSB307

Bridge Rectifiers
Reverse Voltage-1000v
Forward current-3A

Features

Glass passivated chip
High surge current capability
Ldeal for surface mounted applications
Low power loss, high efficiency
Plastic Case Material has UL Flammability



Mechanical Data

Package: MSB
Terminals:Tin Plated leads, solderable per
Mil-STD-750 Method 2026
Polarity: As marked
Molding compound meets UL 94 V-0 flammability rating,
ROHS-compliant

Maximum Ratings (Ta=25℃ Unless otherwise specified)

Type Number	SYMBOL	MSB307	Umit
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	1000	V
Maximum RMS Voltage	V_{RMS}	700	V
Maximum DC Blocking Voltage	V_{DC}	1000	V
Maximum Average Forward Rectified Current	$IO_{(AV)}$	3.0	A
Peak Forward Surge Current 8.3ms Single half-sine-wave superimposed on rated load(JEDEC Method) on rated	IFSM	80.0	A
Forward Surge Current (Non-repetitive) @1ms, square wave, 1 cycle, Tj=25℃		160.0	A
Current squared time @1ms≤t8.3≤ms Tj=25℃, Rating of per diode	I^2t	26.6	A^2S
Maximum Forward Voltage at 3.0A DC	V_{FM}	1.1	V
Maximum Reverse Current TA = 25℃	IR	5	uA
at Rated DC Blocking Voltage TA = 125℃		100	
Typical Thermal Resistance	R_{QJa}	75.0	℃/W
Operating Junction Temperature Range	T_J	—55to+150	℃
Storage Temperature Range	T_{STG}	—55to+150	℃

FIG.1MAXIMUM AVERAGE FORWARD CURRENT DERATING

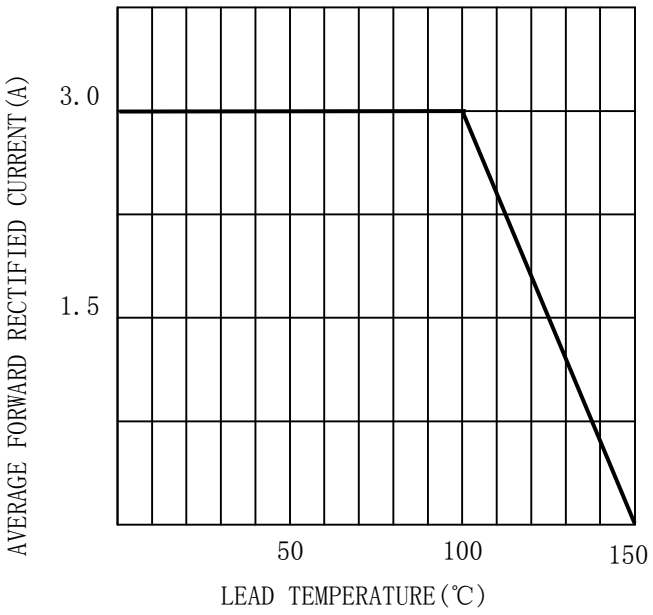


FIG.2TYPICAL FORWARD CHARACTERISTICS

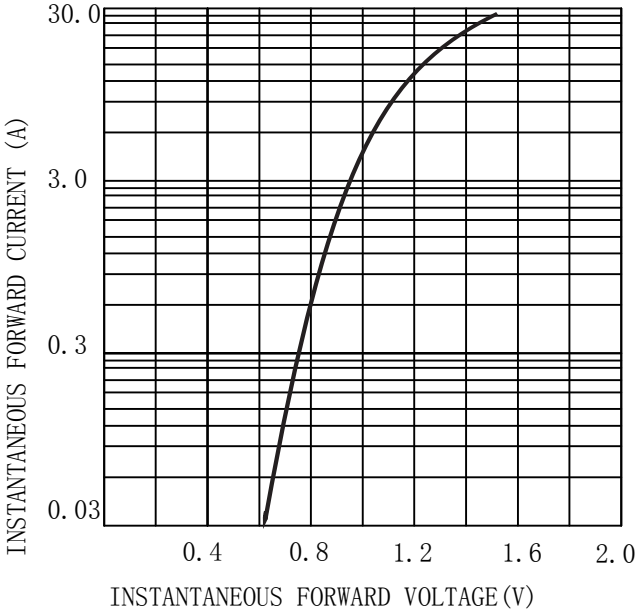


FIG.3MAXIMUM NON-REPEITIVE SURGE CURRENT

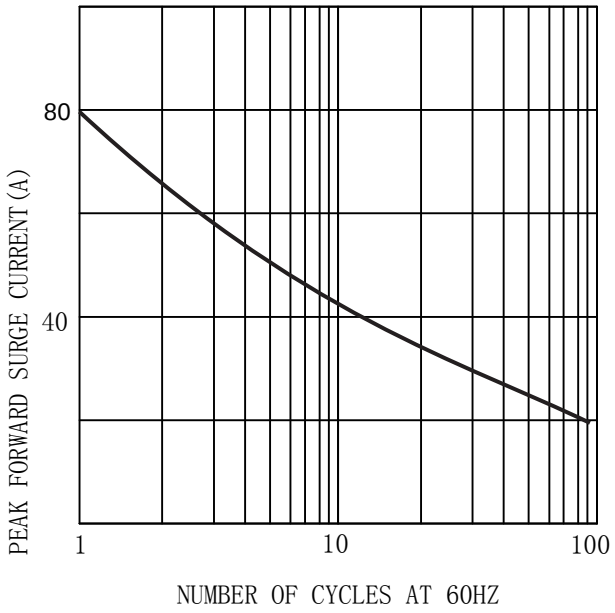
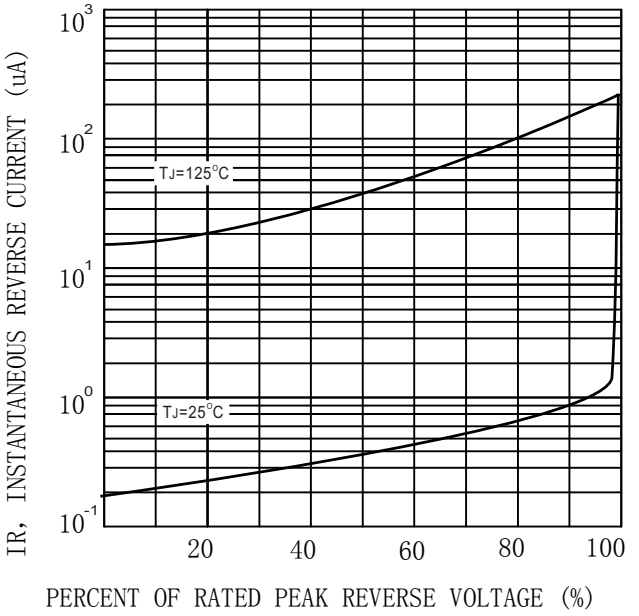


FIG. 4 TYPICAL REVERSE CHARACTERISTICS(per element)



MARKING INFORMATION

= Logo

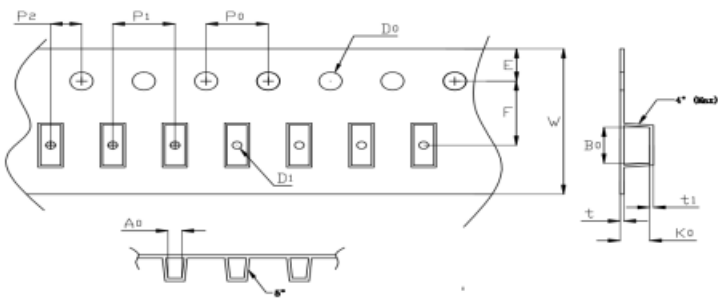
**** = Date Code Marking

MSB307 = Marking Code

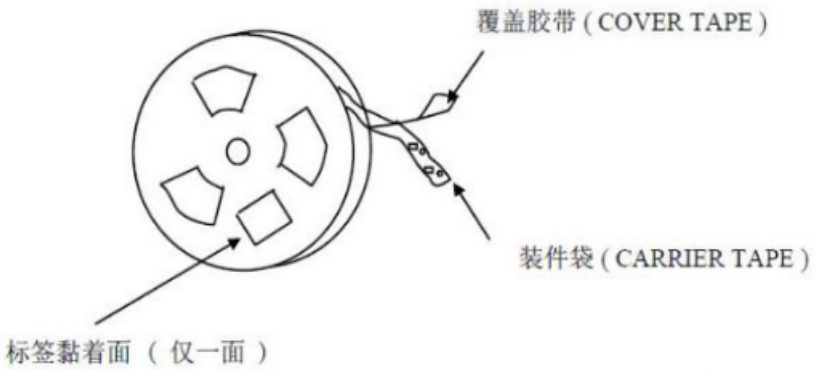
Print according to customer request

PACKING REQUIRMENTS

- Carrier tape packing



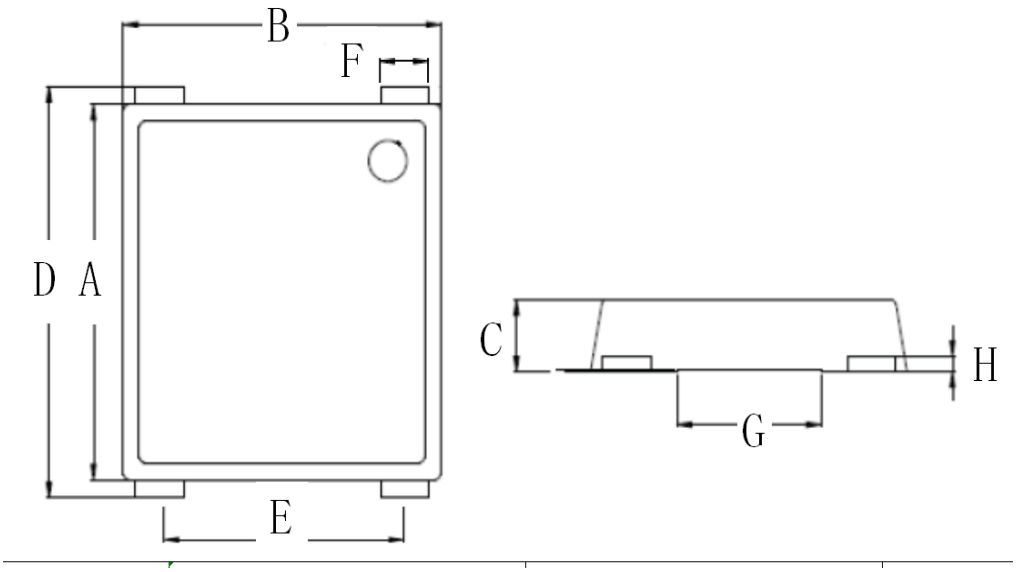
Specifications	Carrier tape type	Ao	Bo	Ko	Po	W	t1	Exiplain
MSB	Anti-static	7.0± 0.10	8.7±0.10	1.65± 0.10	4.00± 0.10	16.0± 0.30	0.28± 0.05	



DEVICE TYPE	Tape width	13"Reel		
		Q'TY/REEL (pcs)	BOX/CARTOON	Q'TY/REEL (pcs)
MSB	16mm	3000	6000	60000

Outline Dimensions

MSB



MSB				
DIM	INC HES		MM	
	MIN	MAX	MIN	MAX
A	0.28	0.29	7.0	7.4
B	0.26	0.27	6.5	6.9
C	0.05	0.06	1.2	1.6
D	0.32	0.35	8.2	8.8
E	0.19	0.21	4.9	5.3
F	0.04	0.05	0.9	1.3
G	0.11	0.13	2.8	3.2
H	0.01	0.02	0.2	0.4

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