

MMBD4148-AU

SURFACE MOUNT SWITCHING DIODES

VOLTAGE

100 Volt

POWER

250mWatt

SOT-23

Unit : inch(mm)

FEATURES

- Fast switching Speed.
- Electrically Identical to Standard JEDEC
- High Conductance
- Surface Mount Package Ideally Suited for Automatic Insertion
- Acquire quality system certificate : TS16949
- AEC-Q101 qualified
- Lead free in compliance with EU RoHS 2011/65/EU directive
- Green molding compound as per IEC61249 Std. . (Halogen Free)

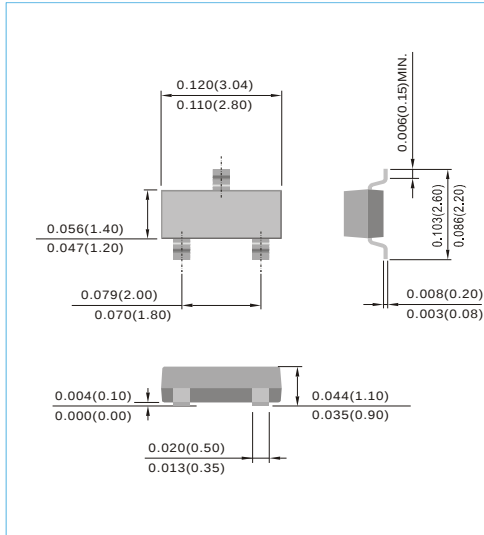
MECHANICAL DATA

Case : SOT-23 plastic case.

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

Standard packaging : 8mm tape

Approx weight : 0.0003 ounces, 0.0084 grams



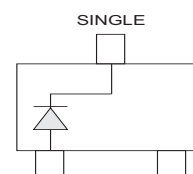
MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS (T_J=25°C unless otherwise noted)

PARAMETER	SYMBOL	VALUE	UNITS
Marking Code		A2	
Reverse Voltage	V _R	75	V
Peak Reverse Voltage	V _{RM}	100	V
RMS Voltage	V _{RMS}	50	V
Maximum DC Blocking Voltage	V _{DC}	75	V
Maximum Average Forward Current at T _A =25°C	I _{AV}	150	mA
Peak Forward Surge Current, 1μs	I _{FSM}	4	A
Power Dissipation Derate Above 25°C	P _{TOT}	250	mW
Maximum Forward Voltage	V _F	0.715@0.001A 0.855@0.01A 1.0@ 0.05A 1.25@0.15A	V
Maximum DC Reverse Current at Rated DC Blocking Voltage T _J =25°C	I _R	0.025@20V 2.5@75V	μA
Junction Capacitance (Notes1)	C _J	1.5	pF
Maximum Reverse Recovery Time (Notes2)	T _{RR}	4.0	ns
Typical Thermal Resistance	R _{θJA}	357	°C / W
Storage Temperature Range	T _J	-55 to +150	°C

NOTE:

1. C_J at V_R=0, f=1MHZ

2. From I_F=10mA to I_R=1mA, V_R=6Volts, R_L=100Ω



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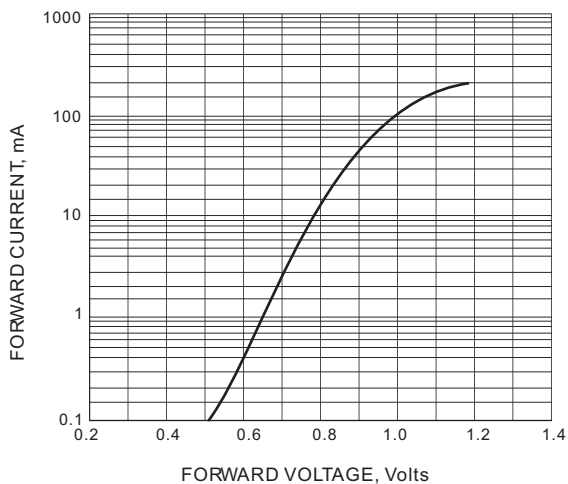


FIG. 1-TYPICAL FORWARD CHARACTERISTIC

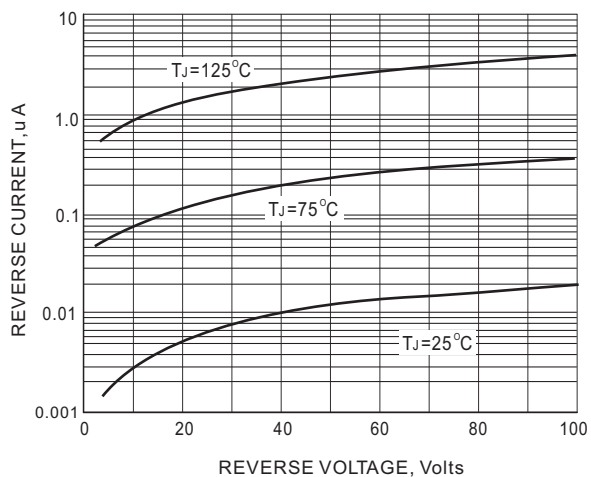


FIG. 2-TYPICAL REVERSE CHARACTERISTICS

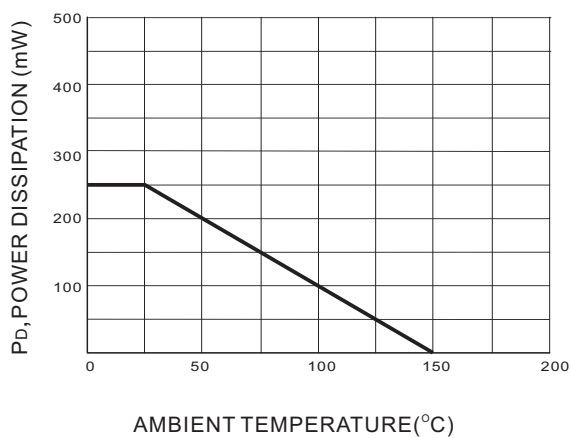
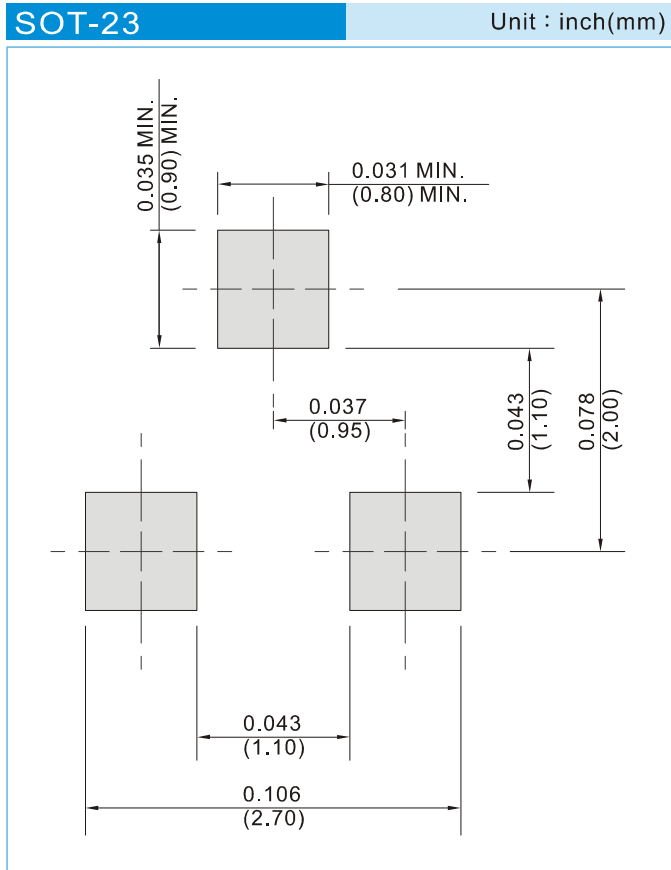


FIG. 3 POWER DERATING CURVE

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MOUNTING PAD LAYOUT



ORDER INFORMATION

- Packing information
 - T/R - 12K per 13" plastic Reel
 - T/R - 3K per 7" plastic Reel

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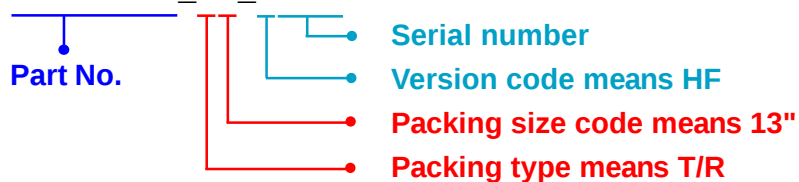
Part No_packing code_Version

MMBD4148-AU_R1_000A1

MMBD4148-AU_R2_000A1

For example :

RB500V-40_R2_00001



Packing Code XX				Version Code XXXXX		
Packing type	1 st Code	Packing size code	2 nd Code	HF or RoHS	1 st Code	2 nd ~5 th Code
Tape and Ammunition Box (T/B)	A	N/A	0	HF	0	serial number
Tape and Reel (T/R)	R	7"	1	RoHS	1	serial number
Bulk Packing (B/P)	B	13"	2			
Tube Packing (T/P)	T	26mm	X			
Tape and Reel (Right Oriented) (TRR)	S	52mm	Y			
Tape and Reel (Left Oriented) (TRL)	L	PANASERT T/B CATHODE UP (PBCU)	U			
FORMING	F	PANASERT T/B CATHODE DOWN (PBCD)	D			



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