

MMBD4148W, MMBD4448W



SURFACE MOUNT SWITCHING DIODES

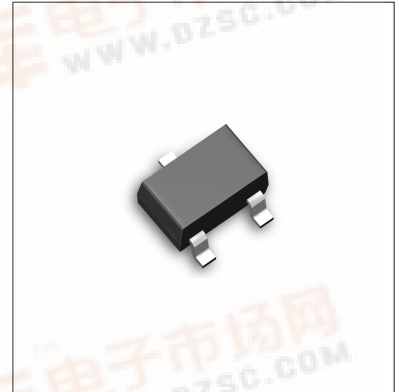
VOLTAGE 75 Volts

POWER 200 mWatts

PACKAGE SOT-323

FEATURES

- Fast switching speed.
- Surface mount package Ideally Suited for Automatic insertion
- Electrically Identical to Standard JEDEC
- High Conductance



MECHANICAL DATA

Case: SOT-323, Plastic

Terminals: Solderable per MIL-STD-202, Method 208

Approx. Weight: 0.008 gram

Marking: A2, A3

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25°C ambient temperature unless otherwise specified.

Single phase, half wave, 60 Hz, resistive or inductive load.

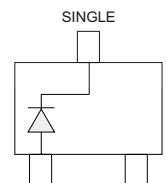
For capacitive load, derate current by 20%.

PARAMETER	SYMBOL	MMBD4148W	MMBD4448W	UNITS
Reverse Voltage	V _R	75	75	V
Peak Reverse Voltage	V _{RM}	100	100	V
Rectified Current (Average), Half Wave Rectification with Resistive Load and f >=50 Hz	I _O	150	150	mA
Peak Forward Surge Current, 8.3ms single half sine-wave superimposed on rated load (JEDEC method)	I _{FSM}	2.0	4.0	A
Power Dissipation Derate Above 25°C	P _{TOT}	200	200	mW
Maximum Forward Voltage @ I _F =5mA @ I _F =10mA	V _F	- 1.0	0.72 1.0	V
Maximum DC Reverse Current at Rated DC Blocking Voltage T _J = 25°C	I _R	2.5	2.5	µA
Typical Junction Capacitance(Notes1)	C _J	4.0	4.0	pF
Maximum Reverse Recovery (Notes2)	T _{RR}	4.0	4.0	ns
Maximum Thermal Resistance	R _{θJA}	357		°C / W
Storage Temperature Range	T _J	-55 TO +125		°C

NOTE:

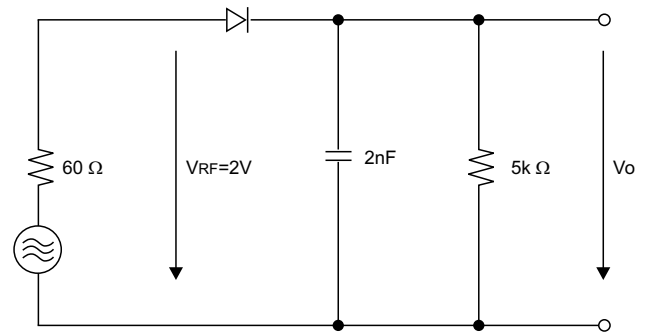
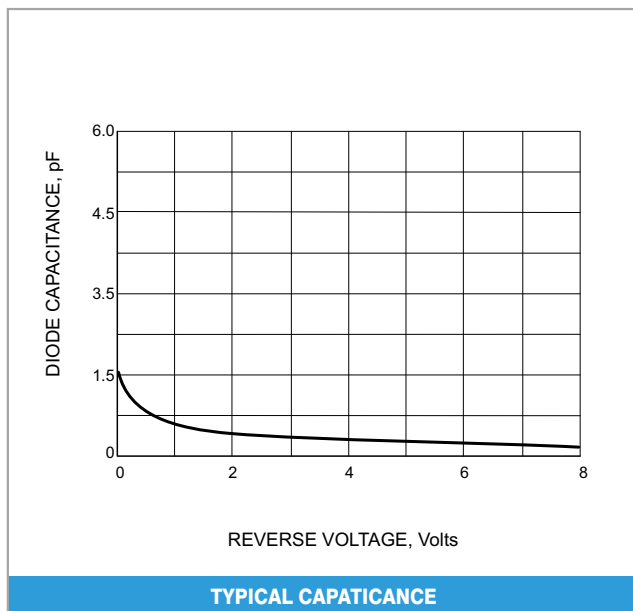
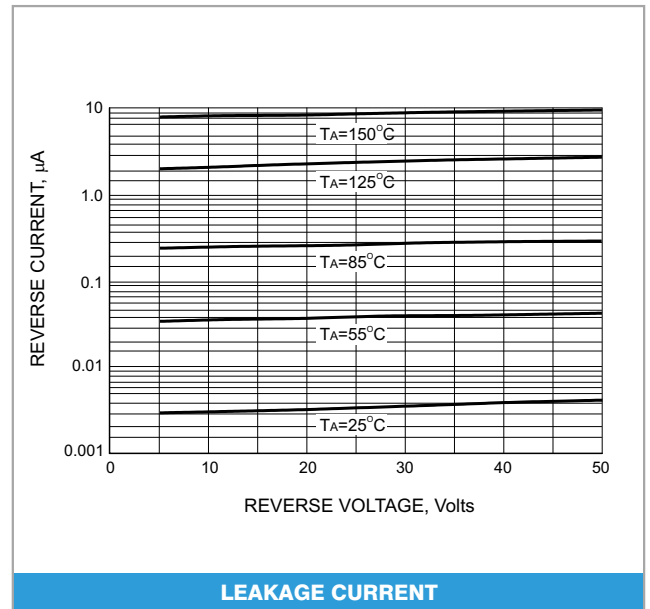
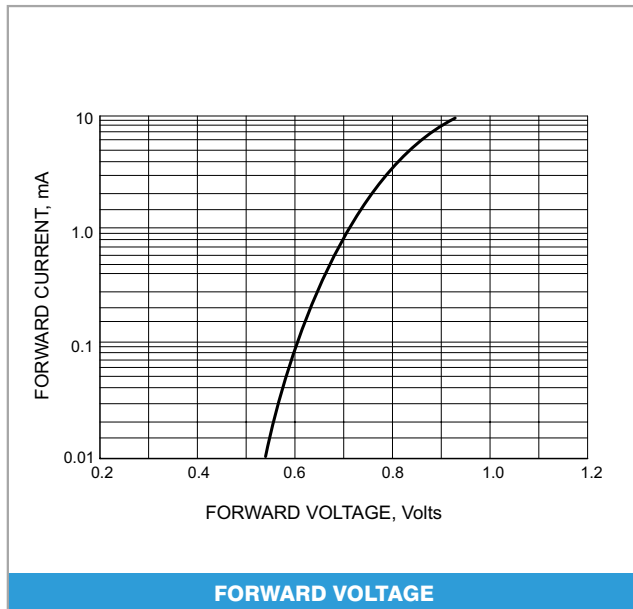
1. C_J at V_R=0, f=1MHZ

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



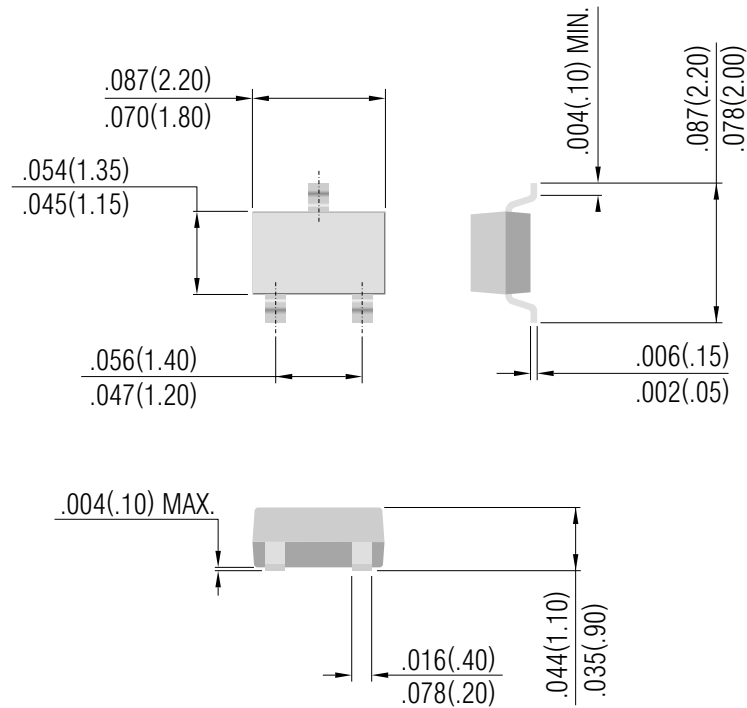
MMBD4148W, MMBD4448W





RECTIFICATION EFFICIENCY MEASUREMENT CIRCUIT

SOT-323



Dimensions in inches and (millimeters)