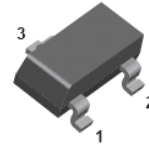
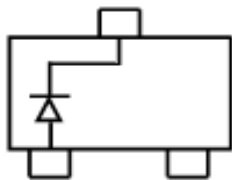
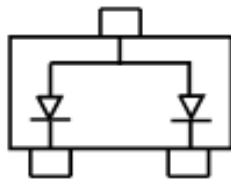
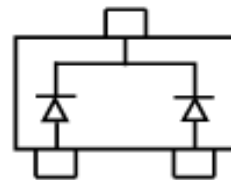
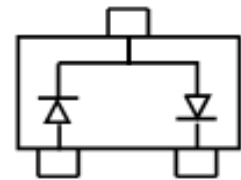


**Surface mount switching diode**
**FEATURES**

- Fast switching speed.
- High conductance.
- For general purpose switching applications.
- Surface mount package ideally suited for automatic insertion.


**APPLICATIONS**

- Small signal switching


**SOT-23**

**MMBD4148A**  
**MARKING:5H**

**MMBD4148CA**  
**MARKING:D6**

**MMBD4148CC**  
**MARKING:D5**

**MMBD4148SE**  
**MARKING:D4**
**MAXIMUM RATING @ Ta=25°C unless otherwise specified**

Parameter	Symbol	Limits	Unit
Peak Repetitive Peak reverse voltage	$V_{RRM}$	100	V
Working Peak Reverse Voltage	$V_{RWM}$		
DC Reverse Voltage	$V_R$		
Forward Continuous Current	$I_{FM}$	300	mA
Average Rectified Output Current	$I_o$	200	mA
Power Dissipation	$P_d$	350	mW
Thermal Resistance Junction to Ambient Air	$R_{\theta JA}$	357	°C/W
Junction temperature	$T_j$	150	°C
Storage temperature	$T_{STG}$	-55-150	°C

**Surface mount switching diode**
**ELECTRICAL CHARACTERISTICS @ Ta=25°C unless otherwise specified**

Parameter	Symbol	Min.	Typ.	Max.	Unit	Conditions
Reverse Breakdown Voltage	$V_{(BR)R1}$	100			V	$I_R=100\mu A$
	$V_{(BR)R2}$	75			V	$I_R=5\mu A$
Forward voltage	$V_F$			1	V	$I_F=10mA$
Reverse current	$I_{R1}$			25	nA	$V_R=25V$
	$I_{R2}$			5	$\mu A$	$V_R=75V$
Diode Capacitance	$C_D$			4	pF	$V_R=0V, f=1MHz$
Reverse Recovery Time	$t_{rr}$			4	ns	$I_F=10mA, V_R=6V$ $I_{rr}=0.1*I_R, R_L=100\Omega$

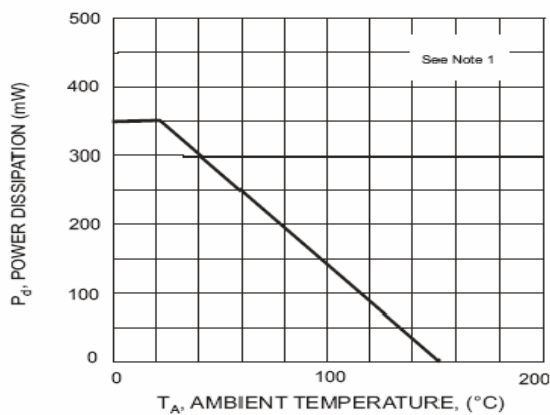
**TYPICAL CHARACTERISTICS @ Ta=25°C unless otherwise specified**


Fig. 1 Power Derating Curve

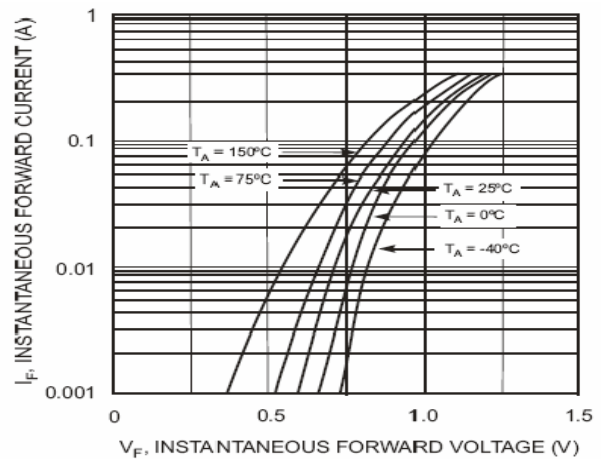


Fig. 2 Forward Characteristics

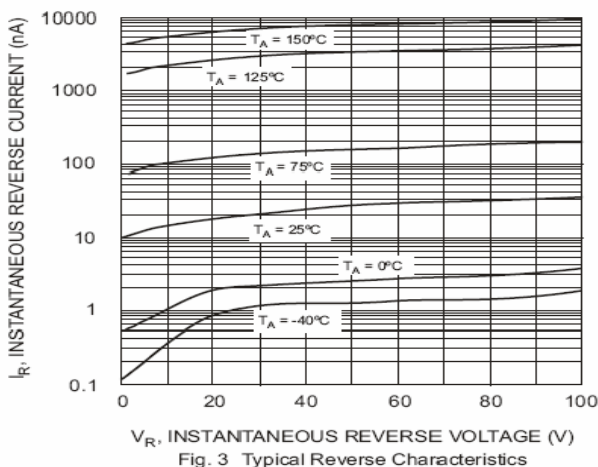


Fig. 3 Typical Reverse Characteristics

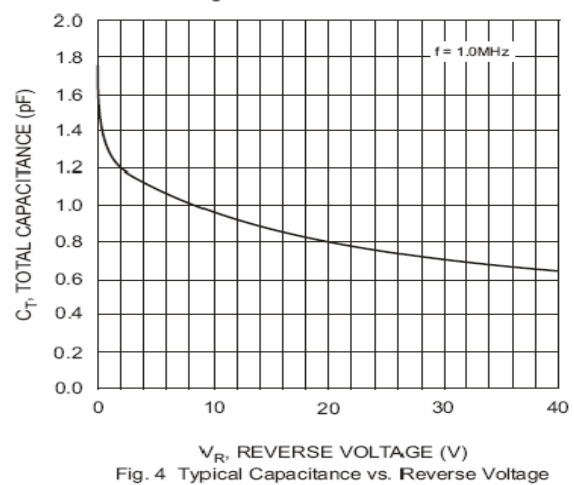
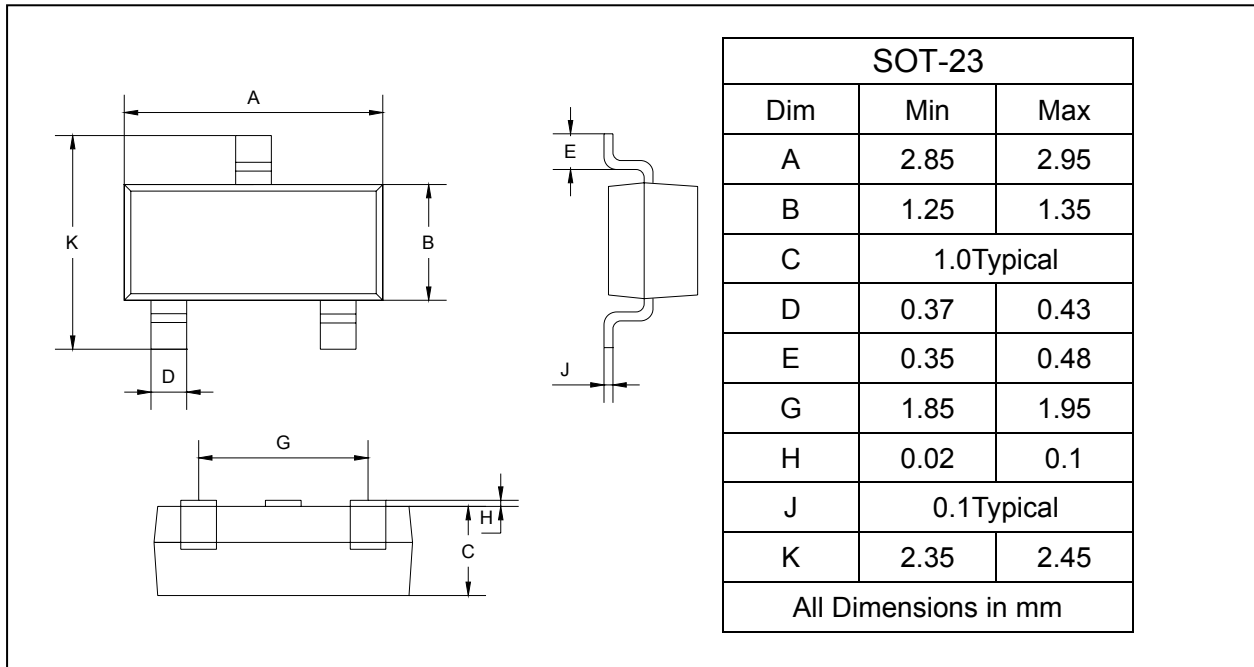
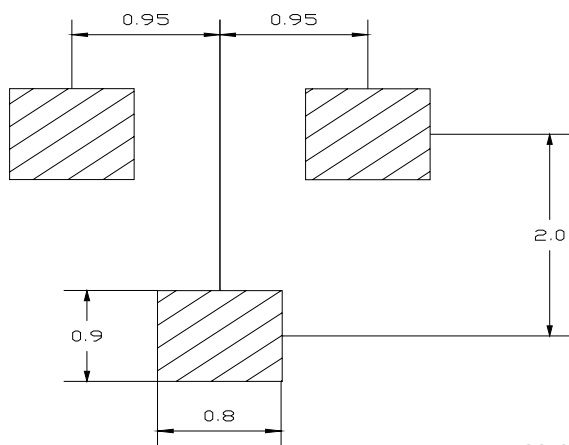


Fig. 4 Typical Capacitance vs. Reverse Voltage

**Surface mount switching diode**
**PACKAGE OUTLINE**

Plastic surface mounted package

SOT-23


**SOLDERING FOOTPRINT**


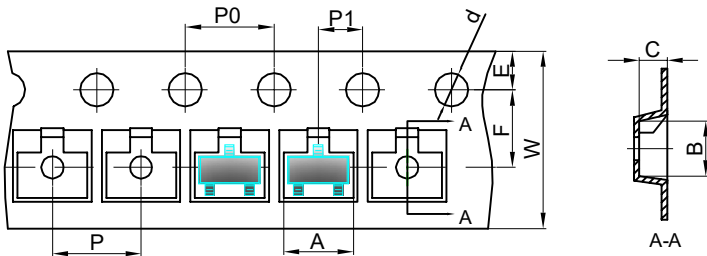
Unit : mm

**PACKAGE INFORMATION**

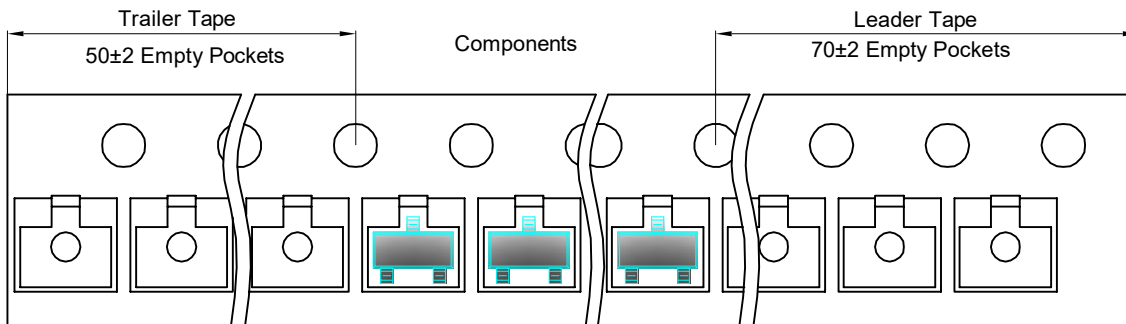
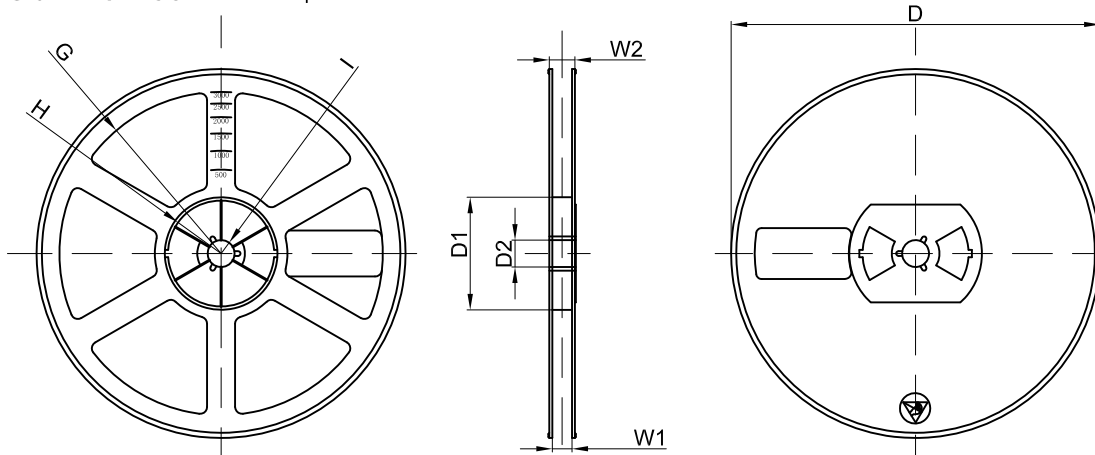
Device	Package	Shipping
MMBD4148A/CA/CC/SE	SOT-23	3000/Tape&Reel

**Surface mount switching diode**
**SOT-23 Tape and reel**

SOT-23 Embossed Carrier Tape



Dimensions are in millimeter										
Pkg type	A	B	C	d	E	F	P0	P	P1	W
SOT23	3.15	2.77	1.22	Ø1.50	1.75	3.50	4.00	4.00	2.00	8.00

**SOT-23 Tape Leader and Trailer**

**SOT-23 Reel 3000 pcs**


Dimensions are in millimeter								
Reel Option	D	D1	D2	G	H	I	W1	W2
7"Dia	Ø178.00	54.40	13.00	R78.00	R25.60	R6.50	9.50	12.30