



SMD Schottky Barrier Diode

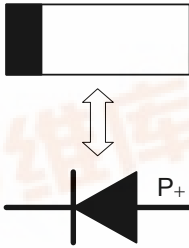
ASB0240

■ Features

$$I_O = 200\text{mA}$$

$$V_R = 40\text{V}$$

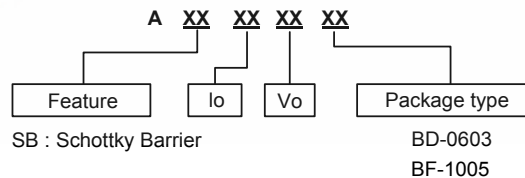
- Designed for mounting on small surface.
- Extremely thin package.
- Low leakage current ($I_R=0.1\mu\text{A}$ typ. @ $V_R=10\text{V}$).
- Majority carrier conduction.
- Lead-free device



■ Mechanical Data

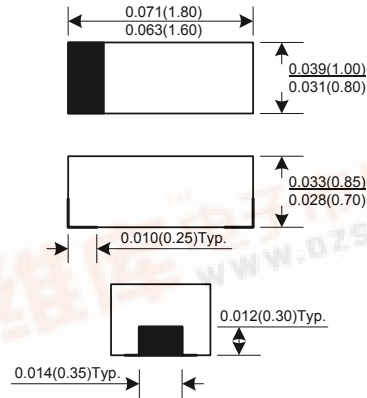
- Case :0603(1608) 1005(2512) standard package, molded plastic.
- Terminals : Gold plated, solderable per MIL-STD-750, method 2026.
- Polarity : Indicated by cathode band.
- Mounting position : Any.
- Weight : BD:0.003gram (approximately)
BF:0.006gram (approximately)

■ Ordering information



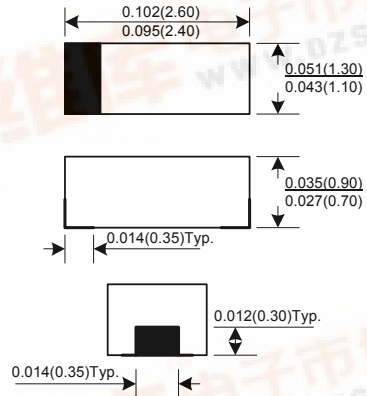
■ General Description

0603(1608)



Dimensions in inches and (millimeter)

1005(2512)



Dimensions in inches and (millimeter)



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■ Maximum Rating (at $T_A=25^{\circ}\text{C}$ unless otherwise noted)

Symbol	Parameter		Conditions	Min	Typ	Max	Unit
V_{RRM}	Repetitive peak reverse voltage			-	-	45	V
V_R	Reverse voltage			-	-	40	V
I_O	Average forward current			-	-	200	mA
I_{FSM}	Forward current, surge peak	0603	8.3ms single half sine-wave superimposed on rate load (JEDEC method)	-	2000	-	mA
		1005		-	3000	-	
P_D	Power Dissipation	0603		-	-	150	mW
		1005		-	-	250	
T_{STG}	Storage temperature			-40	-	+125	$^{\circ}\text{C}$
T_j	Junction temperature			-40	-	+125	$^{\circ}\text{C}$

■ Electrical Characteristics (at $T_A=25^{\circ}\text{C}$ unless otherwise noted)

Symbol	Parameter	Conditions	Min.	Typ.	Max.	Unit
V_F	Forward voltage	$I_F=200\text{mA DC}$	-	0.45	0.55	V
I_R	Reverse current	$V_R=10\text{V}$	-	-	1	μA
C_T	Capacitance between terminals	$F=1\text{MHz}$, and 10 VDC reverse voltage	-	9	-	pF

Rating And Characteristic Curves

Fig. 1 - Forward characteristics

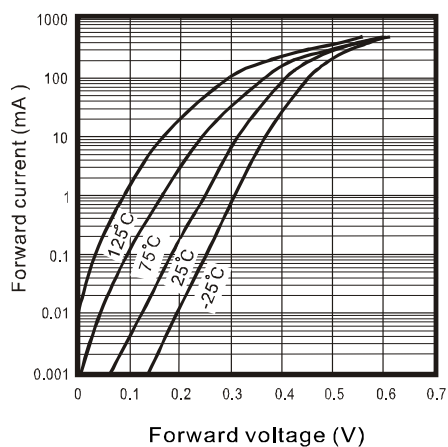


Fig. 2 - Reverse characteristics

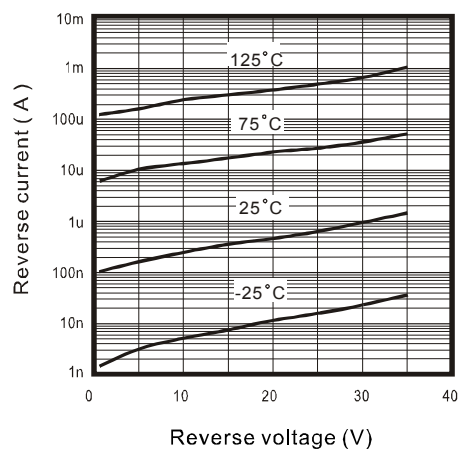


Fig. 3 - Capacitance between terminals characteristics

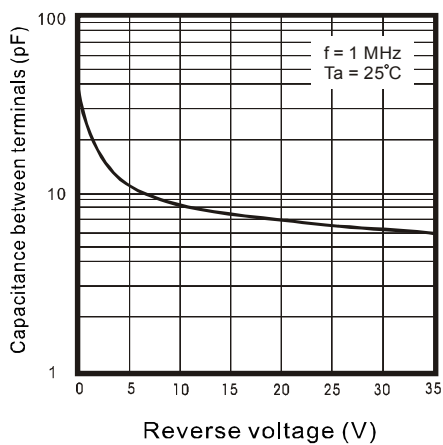
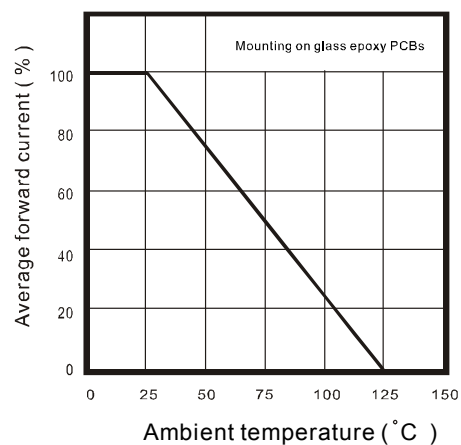


Fig. 4 - Current derating curve



Marking Information

