

**SOT-23 SCHOTTKY DIODE**

**FEATURES**

- \* Low Turn-on voltage
- \* Fast switching

**MECHANICAL DATA**

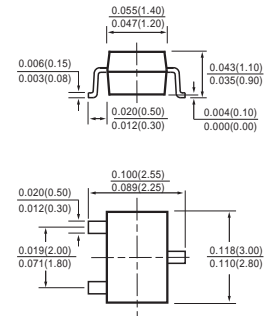
- \* Case: Molded plastic
- \* Epoxy: UL 94V-O rate flame retardant
- \* Lead: MIL-STD-202E method 208C guaranteed
- \* Mounting position: Any
- \* Weight: 0.008 gram

**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

Ratings at 25°C ambient temperature unless otherwise specified.



**SOT-23**



Dimensions in inches and (millimeters)

**MAXIMUM RATINGS** ( @ TA = 25°C unless otherwise noted )

RATINGS	SYMBOL	VALUE	UNITS
DC Voltage	$V_R$	40	V
Forward Continuous Current	$I_F$	200	mA
Max. Steady State Power Dissipation @ TA=25°C	$P_D$	350	mW
Max. Operating Temperature Range	$T_J$	150	°C
Storage Temperature Range	$T_{STG}$	-55 to +150	°C

**ELECTRICAL CHARACTERISTICS** ( @ TA = 25°C unless otherwise noted )

CHARACTERISTICS	SYMBOL	MIN.	TYP.	MAX.	UNITS
Reverse breakdown voltage ( $I_R=10\mu A$ )	$V_{(BR)R}$	40	-	-	V
Reverse voltage leakage current ( $V_R=50V$ )	$I_R$	-	-	0.2	$\mu A$
Forward voltage ( $I_F=1mA$ ) ( $I_F=40mA$ )	$V_F$	-	-	0.38 1	V
Diode capacitance ( $V_R=0, f=1MHz$ )	$C_D$	-	-	5	pF
Reveres recovery time ( $I_F=I_R=10mA, I_{rr}=0.1 \times I_R, R_L=100\Omega$ )	$t_{rr}$	-	-	5	nS

# RATING AND CHARACTERISTICS CURVES ( BAS40S )

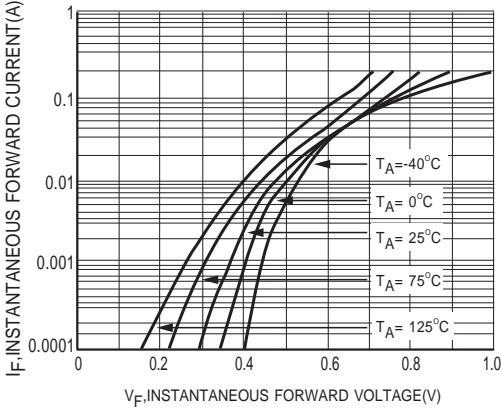


Figure1 Typical Forward Voltage

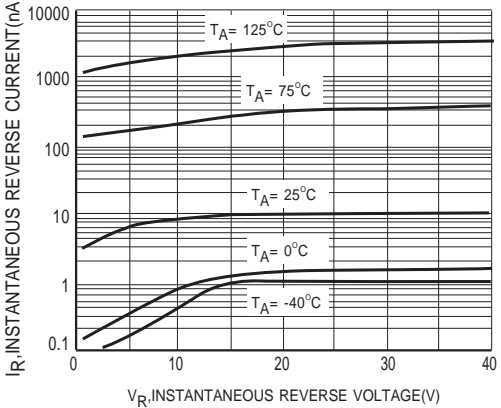


Figure2 Typical Reverse Capacitance

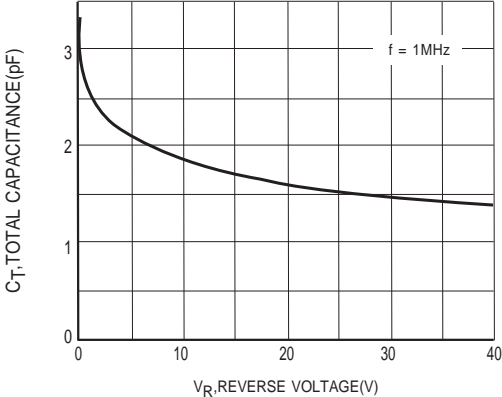


Figure3 Typical Capacitance

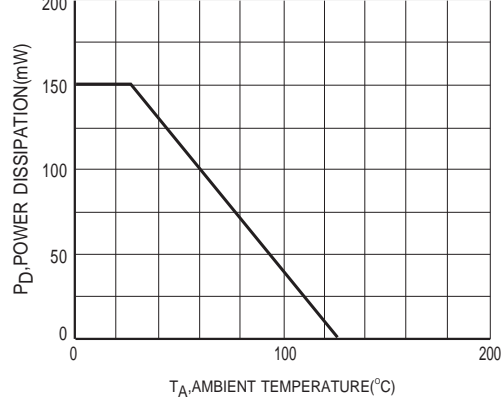


Figure4 Power Deraing Curve, Total Package

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