

BAS16WX

Features

- Fast Switching Speed
- Surface Mount Package Ideally Suited for Automatic Insertion
- For General Purpose Switching Applications
- High Conductance

Mechanical Data

- Case: SOD-323, Molded Plastic
- Terminals: Solderable per MIL-STD-202, Method 208
- Polarity: Indicated by Cathode Band
- Weight: 0.008 grams (approx.)
- Marking Code: BAS16WX=T4

Maximum Ratings @ 25°C Unless Otherwise Specified

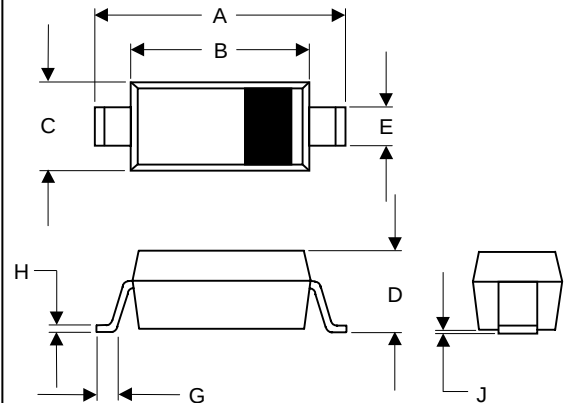
Non-Repetitive Peak Reverse Volt.	V_{RM}	85	V
Peak Repetitive Reverse Voltage	V_{RRM}		
Working Peak Reverse Voltage	V_{RWM}	75	V
DC Blocking Voltage	V_R		
RMS Reverse Voltage	$V_{R(RMS)}$	53	V
Forward Continuous Current(Note1)	I_{FM}	200	mA
Average Rectified Output Current	I_o	100	mA
Non-Repetitive Peak @ $t \leq 1.0s$	I_{FSM}	2	A
Forward Surge Current @ $t=10\mu s$		1	
Power Dissipation(Note 1)	P_d	350	mW
Thermal Resistance(Note 1)	R	315	K/W
Operation/Storage Temp. Range	T_j, T_{STG}	-55 to +150	°C

Electrical Characteristics @ 25°C Unless Otherwise Specified

Maximum Forward Voltage Drop	V_{FM}	0.715 0.855 1 1.25	V	$I_F=1.0mA$ $I_F=10mA$ $I_F=50mA$ $I_F=150mA$
Maximum Peak Reverse Current	I_{RM}	1.0 50	μA μA	$V_R=75V T_j=25^\circ C$ $V_R=75V T_j=150^\circ C$
Junction Capacitance	C_j	2	pF	$V_R=0V, f=1.0MHz$
Reverse Recovery Time	t_{rr}	6	ns	$I_F=I_R=10mA, I_{rr}=0.1I_R,$ $R_L=100 OHM$

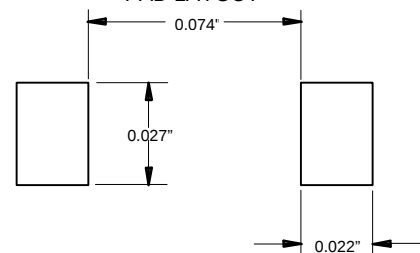
High Speed Switching Diode 350mW

SOD323



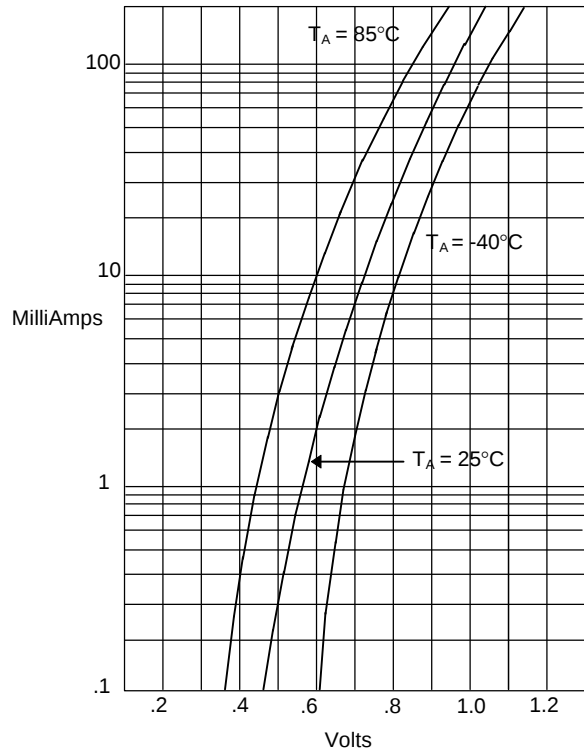
DIMENSIONS					
DIM	INCHES		MM		NOTE
	MIN	MAX	MIN	MAX	
A	.090	.107	2.30	2.70	
B	.063	.071	1.60	1.80	
C	.045	.053	1.15	1.35	
D	.031	.045	0.80	1.15	
E	.010	.016	0.25	0.40	
G	.004	.018	0.10	0.45	
H	.004	.010	0.10	0.25	
J	-----	.006	-----	0.15	

SUGGESTED SOLDER PAD LAYOUT



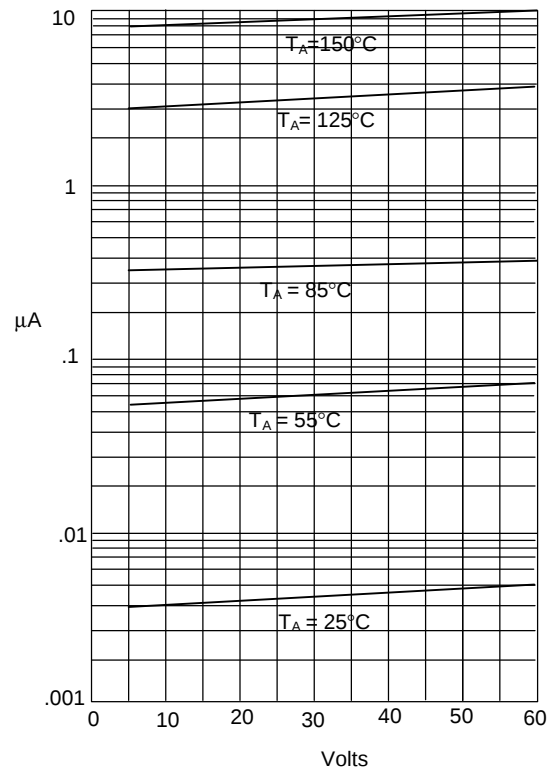
Note: 1. Valid provided that terminals are kept at ambient temperature

Figure 1
Typical Forward Characteristics



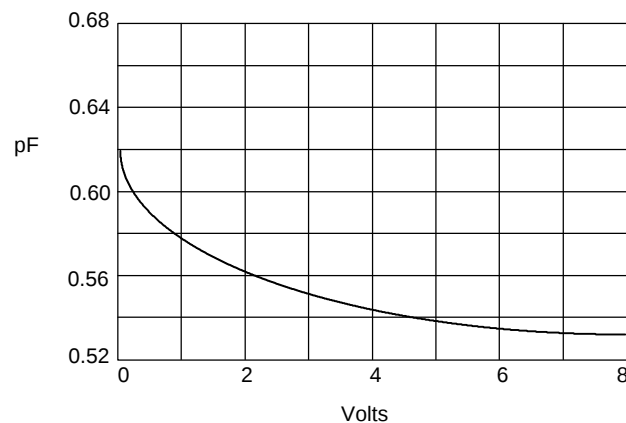
Instantaneous Forward Current - Amperes *versus*
Instantaneous Forward Voltage - Volts

Figure 2
Typical Reverse Characteristics



Instantaneous Reverse Current - MicroAmperes *versus*
Reverse Voltage - Volts

Figure 3
Diode Capacitance



Diode Capacitance - pF *versus*
Reverse Voltage - Volts