

Features

- Low Turn-on Voltage
- Fast Switching
- Ultra-Small Surface Mount Package
- Epoxy Meets UL 94 V-0 Flammability Rating
- Moisture Sensitivity Level 1
- Halogen Free Available Upon Request By Adding Suffix "-HF"
- Lead Free Finish/RoHS Compliant ("P" Suffix Designates RoHS Compliant. See Ordering Information)

Maximum Ratings

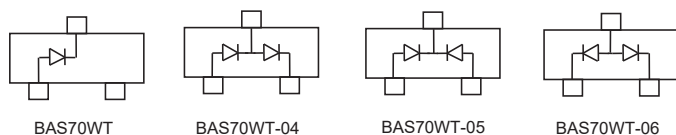
- Operating Junction Temperature Range: -55°C to +125°C
- Storage Temperature Range: -55°C to +150°C
- Thermal Resistance: 500°C/W Junction to Ambient

MCC Part Number	Device Marking	Maximum Recurrent Peak Reverse Voltage	Maximum DC Blocking Voltage
BAS70WT	K73	70V	70V
BAS70WT-04	K74	70V	70V
BAS70WT-05	K75	70V	70V
BAS70WT-06	K76	70V	70V

Electrical Characteristics @ 25°C Unless Otherwise Specified

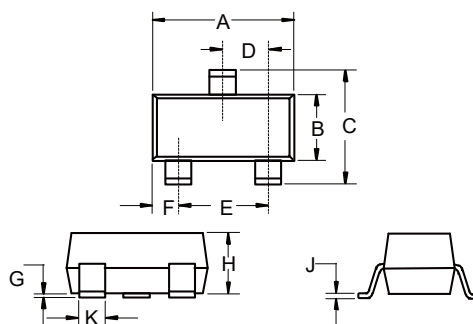
Average Forward Current	$I_{F(AV)}$	70mA	$T_A = 25^\circ\text{C}$
Power Dissipation	P_d	200mW	$T_A = 25^\circ\text{C}$
Maximum Forward Voltage	V_F	410mV 1000mV	$I_F = 1.0\text{mA}$ $I_F = 15\text{mA}$
Maximum DC Reverse Current At Rated DC Blocking Voltage	I_R	0.1μA	$V_R = 50\text{V}$
Minimum Reverse Breakdown Voltage	$V_{(BR)}$	70V	$I_R = 10\mu\text{A}$
Maximum Junction Capacitance	C_d	2.0pF	Measured at 1.0MHz, $V_R = 0\text{V}$
Maximum Reverse Recovery Time	t_{rr}	5.0ns	$I_F = I_R = 10\text{mA}$, $I_{rr} = 0.1 \times I_R$, $R_L = 100\Omega$

Internal Structure:



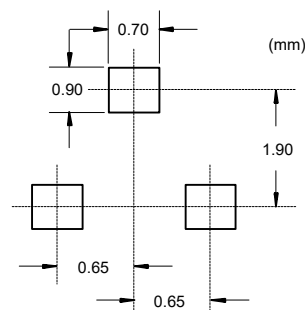
200mW, 70V Schottky Barrier Diode

SOT-323



DIM	INCHES		MM		NOTE
	MIN	MAX	MIN	MAX	
A	0.071	0.087	1.80	2.20	
B	0.045	0.053	1.15	1.35	
C	0.083	0.096	2.10	2.45	
D	0.026 Nominal		0.65 Nominal		
E	0.047	0.055	1.20	1.40	
F	0.012	0.016	0.30	0.40	
G	0.000	0.004	0.00	0.10	
H	0.035	0.044	0.90	1.10	
J	0.002	0.010	0.05	0.25	
K	0.006	0.016	0.15	0.40	

Suggested Solder Pad Layout



Curve Characteristics

Fig. 1 - Typical Instantaneous Forward Characteristics

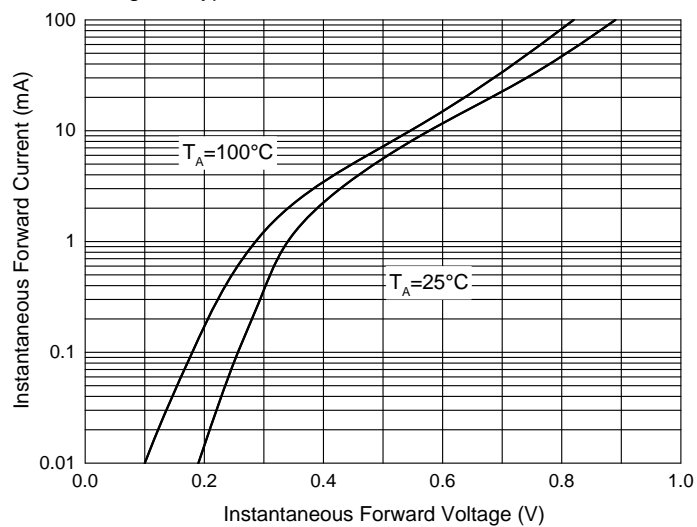


Fig. 2 - Typical Reverse Leakage Characteristics

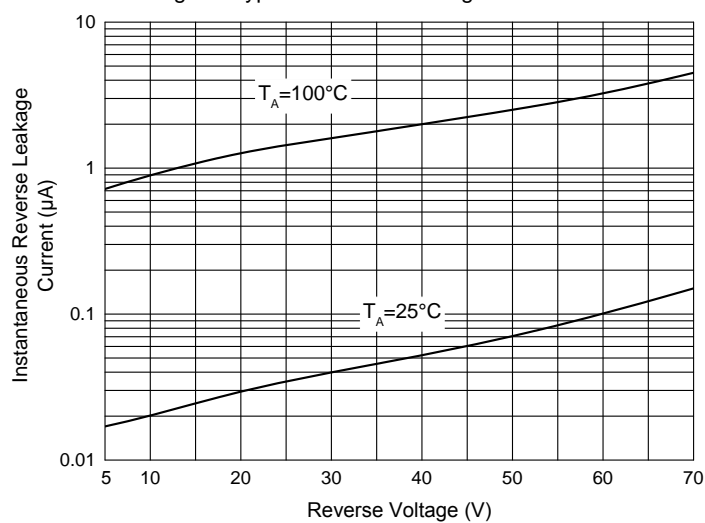
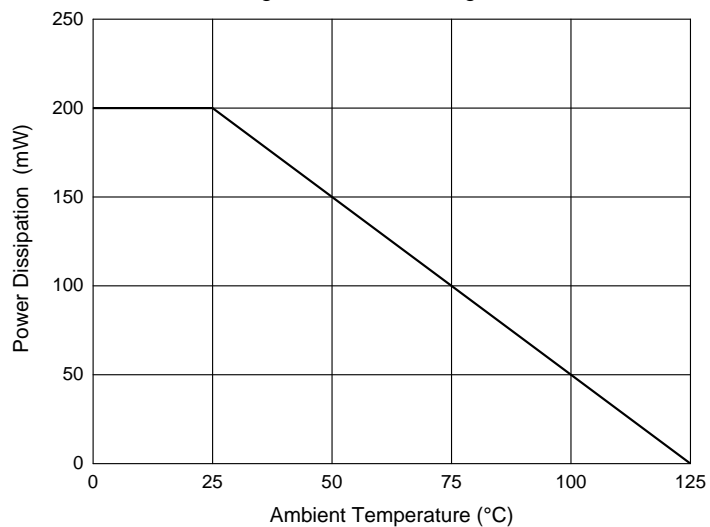


Fig. 3 - Power Derating Curve



Ordering Information

Device	Packing
Part Number-TP	Tape&Reel: 3Kpcs/Reel

Note : Adding "-HF" Suffix For Halogen Free, eg. Part Number-TP-HF

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