

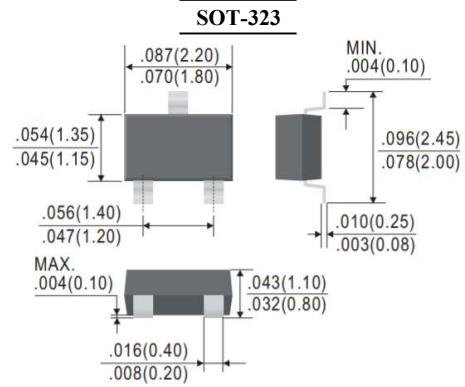
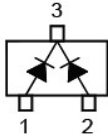


BAV70WH

SWITCHING DIODE

FEATURES

- For high-speed switching applications
- Suffix "H" indicates Halogen-free parts, ex. BAV70WH.



Dimensions in inch and (millimeter)

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

Parameter	Symbol	Value	Unit
Non-Repetitive Peak Reverse Voltage	V_{RM}	100	V
Reverse voltage	V_R	75	V
Continuous Forward Current	Single Diode Load	150	mA
	Double Diode Load	100	
Repetitive Peak Forward Current	I_{FRM}	500	mA
Non-Repetitive Peak Forward Surge Current	$t = 1\ \mu\text{s}$	4	A
	$t = 1\ \text{ms}$	1	
	$t = 1\ \text{s}$	0.5	
Total Power Dissipation	P_{tot}	200	mW
Junction Temperature	T_j	150	$^\circ\text{C}$
Storage Temperature Range	T_{stg}	-55 to +150	$^\circ\text{C}$

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

Parameter	Conditions	Symbol	Min	Max	Unit
Reverse Breakdown Voltage	$I_R = 100\ \mu\text{A}$	$V_{BR(R)}$	75	-	V
Forward voltage	$I_F = 1\ \text{mA}$	V_F	-	715	mV
	$I_F = 10\ \text{mA}$		-	855	
	$I_F = 50\ \text{mA}$		-	1000	
	$I_F = 150\ \text{mA}$		-	1250	
Reverse Current	$V_R = 25\ \text{V}$	I_R	-	30	nA
	$V_R = 75\ \text{V}$		-	2.5	μA
	$V_R = 25\ \text{V}, T_j = 150\text{ }^\circ\text{C}$		-	60	μA
	$V_R = 75\ \text{V}, T_j = 150\text{ }^\circ\text{C}$		-	100	μA
Total Capacitance	$V_R = 0\ \text{V}, f = 1\ \text{MHz}$	C_T	-	2	pF
Reverse recovery time	$I_F = I_R = 10\ \text{mA}, I_{tr} = 0.1 \times I_R, R_L = 100\ \Omega$	t_{rr}	-	4	ns



BAV70WH SWITCHING DIODE

RATINGS AND CHARACTERISTIC CURVES

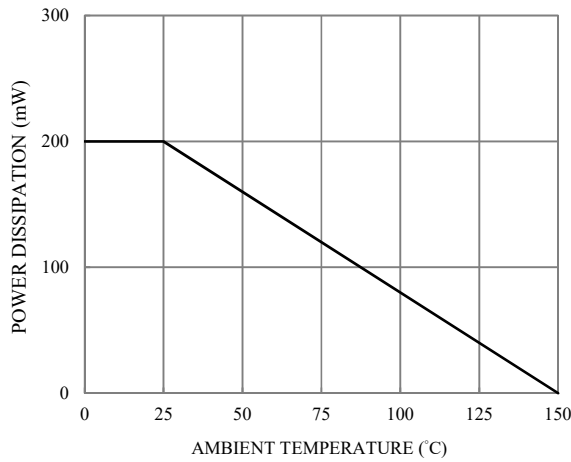


Fig.1-POWER DERATING CURVE

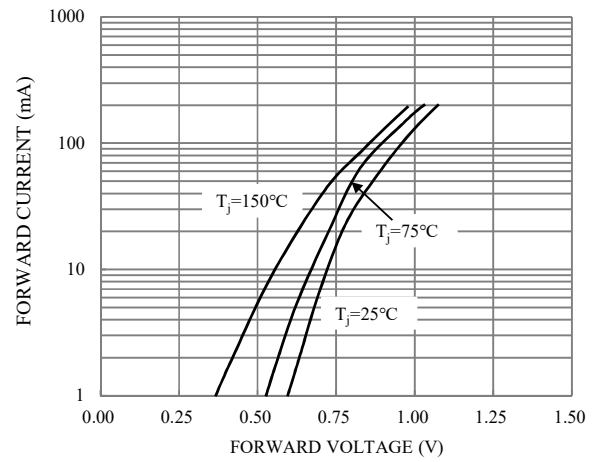


Fig.2-TYPICAL FORWARD CHARACTERISTICS

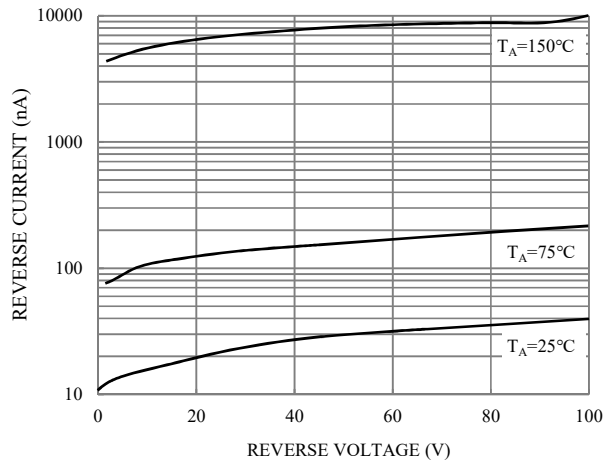


Fig.3-TYPICAL REVERSE CHARACTERISTICS

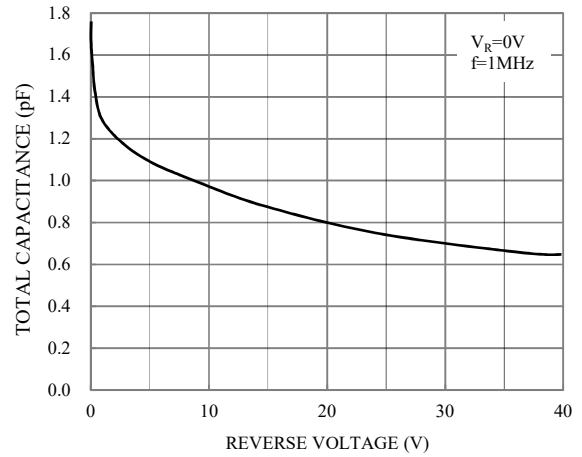


Fig.4-TOTAL CAPACITANCE