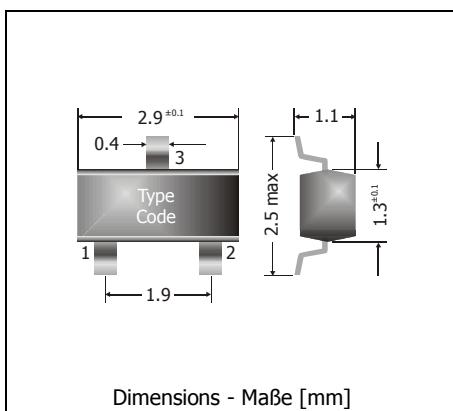


BAS70

Surface Mount Schottky Barrier Single/Dual Diodes Schottky-Barrier Einzel-/Doppel-Dioden für die Oberflächenmontage

Version 2010-01-18



Power dissipation – Verlustleistung	310 mW
Repetitive peak reverse voltage	70 V
Periodische Spitzensperrspannung	
Plastic case	SOT-23
Kunststoffgehäuse	(TO-236)
Weight approx. – Gewicht ca.	0.01 g
Plastic material has UL classification 94V-0	
Gehäusematerial UL94V-0 klassifiziert	
Standard packaging taped and reeled	
Standard Lieferform gegurtet auf Rolle	



Maximum ratings ($T_A = 25^\circ\text{C}$)

per diode / pro Diode	BAS70-series	
Power dissipation – Verlustleistung ¹⁾	P_{tot}	310 mW ²⁾
Max. average forward current – Dauergrenzstrom (dc)	I_{FAV}	200 mA ²⁾
Repetitive peak forward current – Periodischer Spitzenstrom	I_{FRM}	300 mA ²⁾
Non repetitive peak forward surge current Stoßstrom-Grenzwert	$t_p \leq 1 \text{ s}$	I_{FSM}
Repetitive peak reverse voltage – Periodische Spitzensperrspannung	V_{RRM}	70 V
Junction temperature – Sperrsichttemperatur Storage temperature – Lagerungstemperatur	T_j T_s	-55...+150°C -55...+150°C

Characteristics ($T_j = 25^\circ\text{C}$)

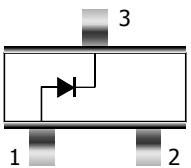
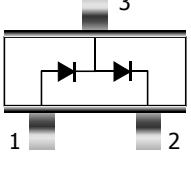
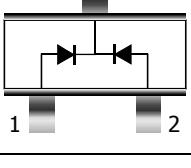
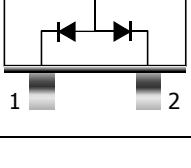
	Kennwerte ($T_j = 25^\circ\text{C}$)	
Forward voltage Durchlass-Spannung	$I_F = 1 \text{ mA}$ $I_F = 15 \text{ mA}$	V_F V_F
Leakage current – Sperrstrom ³⁾	$V_R = 50 \text{ V}$	I_R
Max. junction capacitance – Max. Sperrsichtkapazität $V_R = 0 \text{ V}, f = 1 \text{ MHz}$	C_T	2 pF
Reverse recovery time – Sperrverzug $I_F = 10 \text{ mA}$ über/through $I_R = 10 \text{ mA}$ bis/to $I_R = 1 \text{ mA}$	t_{rr}	< 5 ns
Thermal resistance junction to ambient air Wärmewiderstand Sperrsicht – umgebende Luft	R_{thA}	< 400 K/W ²⁾

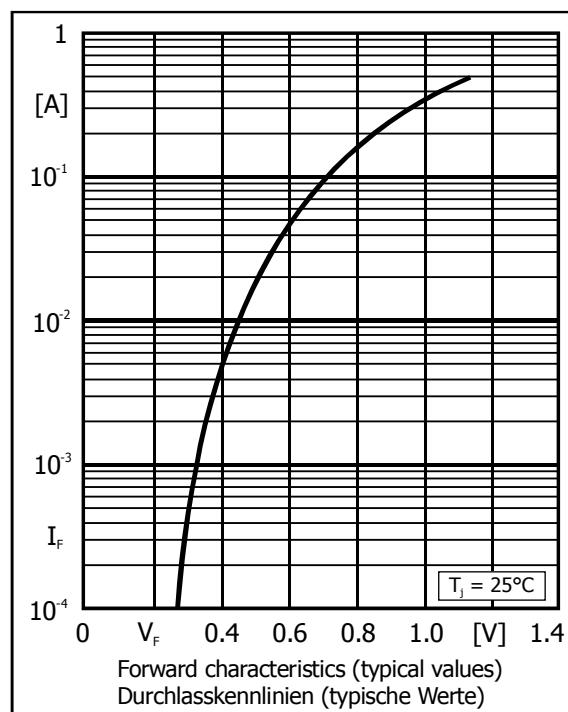
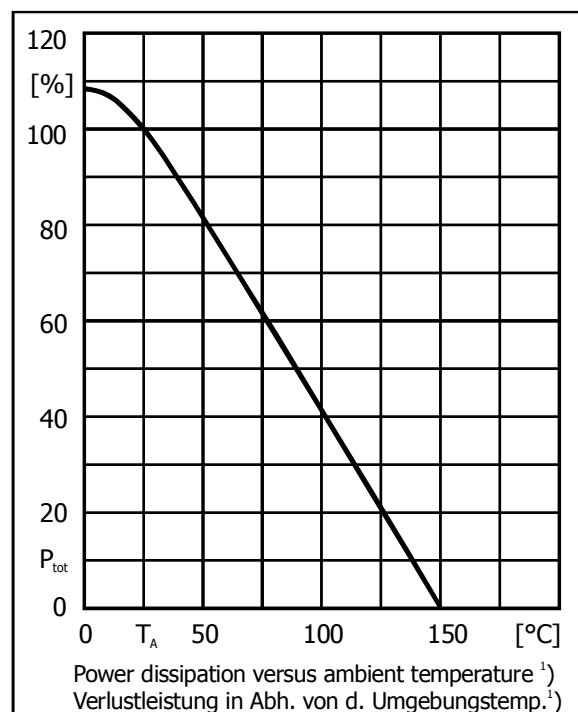
1 Total power dissipation of both diodes – Summe der Verlustleistungen beider Dioden

2 Mounted on P.C. board with 3 mm² copper pad at each terminal

Montage auf Leiterplatte mit 3 mm² Kupferbelag (Lötpad) an jedem Anschluss

3 Tested with pulses $t_p = 300 \mu\text{s}$, duty cycle $\leq 2\%$ – Gemessen mit Impulsen $t_p = 300 \mu\text{s}$, Schaltverhältnis $\leq 2\%$

Pinning – Anschlussbelegung	Marking – Stempelung
 1 = A 2 = n.c. 3 = C	Single diode einzelne Diode BAS70 = 73
 1 = A1 2 = C2 3 = C1/A2	Dual diode, series connection Doppeldiode, Reihenschaltung BAS70-04 = 74
 1 = A1 2 = A2 3 = C1/C2	Dual diode, common cathode Doppeldiode, gemeinsame Kathode BAS70-05 = 75
 1 = C1 2 = C2 3 = A1/A2	Dual diode, common anode Doppeldiode, gemeinsame Anode BAS70-06 = 76



1) Mounted on P.C. board with 3 mm² copper pad at each terminal
Montage auf Leiterplatte mit 3 mm² Kupferbelag (Lötpad) an jedem Anschluss