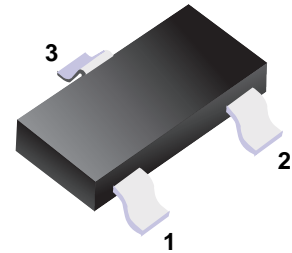


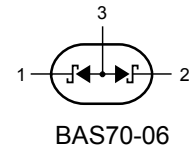
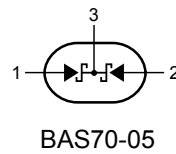
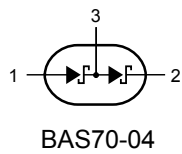
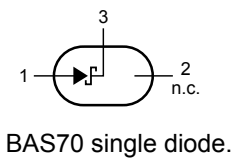
Schottky Diodes

■ Features

- Fast Switching Speed
- High breakdown voltage



■ Simplified outline(SOT-23)



■ Absolute Maximum Ratings Ta = 25°C

Parameter	Symbol	Rating	Unit
Reverse Voltage	V_{RM}	70	V
Peak Reverse Voltage	V_{RRM}	70	
Average Rectified Current at Temp=25°C	I_{FAV}	70	mA
Non-Repetitive Peak Forward Surge Current t=1s	I_{FSM}	100	
Power Dissipation	P_d	215	mW
Thermal Resistance Junction to Ambient	$R_{\theta JA}$	500	°C/W
Junction Temperature	T_J	150	°C
Storage Temperature range	T_{stg}	-55 to 150	

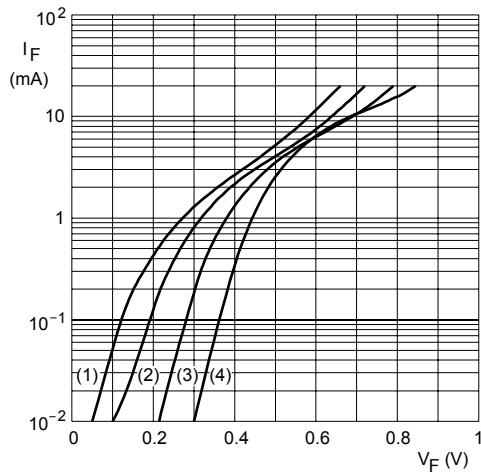
■ Electrical Characteristics Ta = 25°C

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Reverse breakdown voltage	V_R	$I_R = 10 \mu A$	70			V
Forward voltage	V_{F1}	$I_F = 1 \text{ mA}$			0.41	
	V_{F2}	$I_F = 10 \text{ mA}$			0.75	
	V_{F3}	$I_F = 15 \text{ mA}$			1	
Reverse voltage leakage current	I_{R1}	$V_R = 70 \text{ V}$			1	μA
	I_{R2}	$V_R = 50 \text{ V}$			0.1	
Junction capacitance	C_j	$V_R = 0 \text{ V}, f = 1 \text{ MHz}$			2	pF

■ Marking

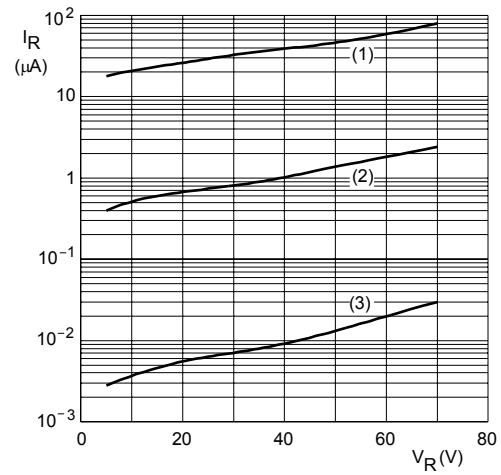
NO.	BAS70	BAS70-04	BAS70-05	BAS70-06
Marking	73	74	75	76

■ Typical Characteristics



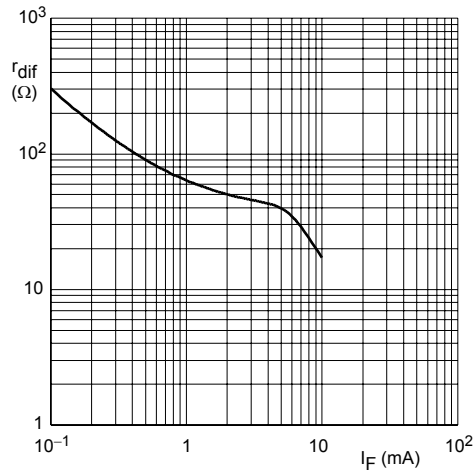
- (1) $T_{amb} = 125\text{ }^\circ\text{C}$.
- (2) $T_{amb} = 85\text{ }^\circ\text{C}$.
- (3) $T_{amb} = 25\text{ }^\circ\text{C}$.
- (4) $T_{amb} = -40\text{ }^\circ\text{C}$.

Fig.1 Forward current as a function of forward voltage; typical values.



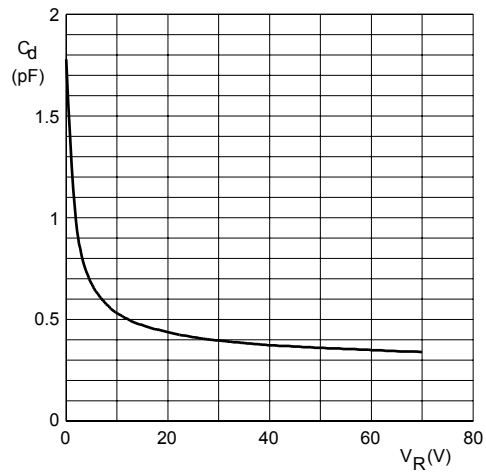
- (1) $T_{amb} = 150\text{ }^\circ\text{C}$.
- (2) $T_{amb} = 85\text{ }^\circ\text{C}$.
- (3) $T_{amb} = 25\text{ }^\circ\text{C}$.

Fig.2 Reverse current as a function of reverse voltage; typical values.



f = 10 kHz.

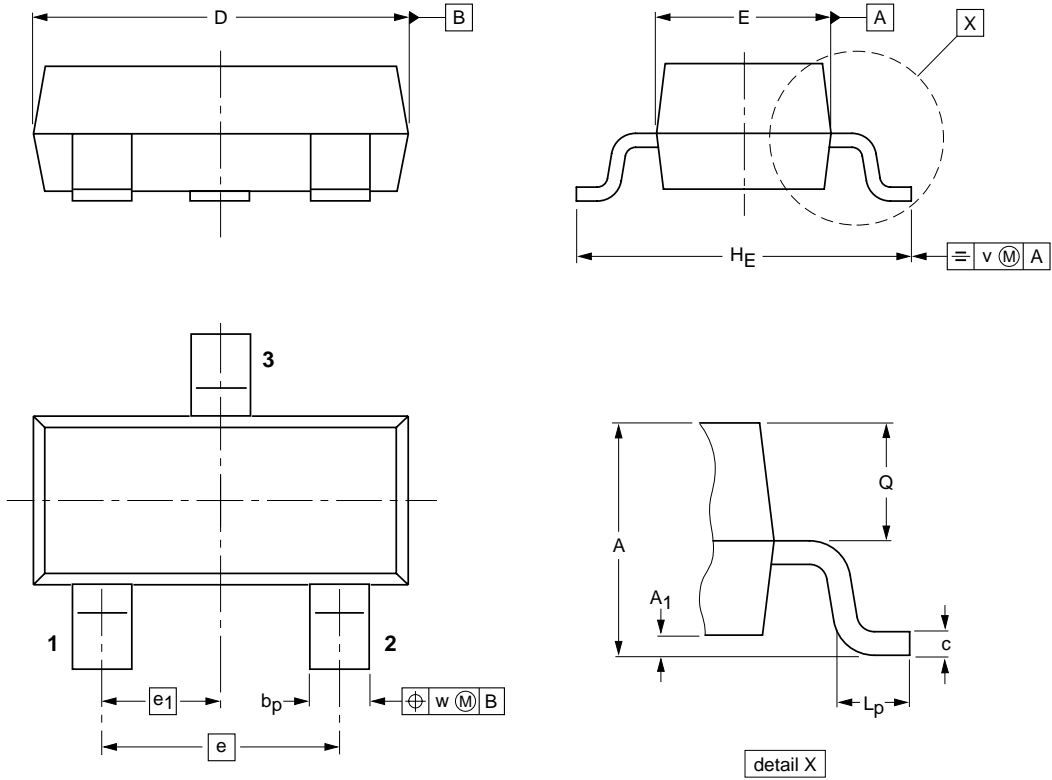
Fig.3 Differential forward resistance as a function of forward current; typical values.



f = 1 MHz.

Fig.4 Diode capacitance as a function of reverse voltage; typical values.

■ SOT-23



DIMENSIONS (mm are the original dimensions)

UNIT	A	A ₁ max.	b _p	c	D	E	e	e ₁	H _E	L _p	Q	v	w
mm	1.1 0.9	0.1	0.48 0.38	0.15 0.09	3.0 2.8	1.4 1.2	1.9	0.95	2.5 2.1	0.45 0.15	0.55 0.45	0.2	0.1