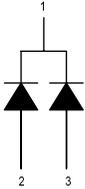


SOT23 HIGH SPEED SWITCHING DIODE PAIR COMMON CATHODE

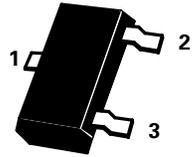
ISSUE 2 – JANUARY 1995

BAV74

PIN CONFIGURATION



PARTMARKING DETAIL
BAV74 – JA



SOT23

ABSOLUTE MAXIMUM RATINGS.

PARAMETER	SYMBOL	VALUE	UNIT
Continuous Reverse Voltage	V_R	50	V
Average Output Rectified Current ($t_{av} = 10\text{ms}$)	I_o	100	mA
Continuous Forward Current	I_F	150	mA
Peak Forward Current ($t = 15\text{ms}$)	I_{FM}	200	mA
Forward Surge Current ($t=1\mu\text{s}$)	I_{FS}	1000	mA
Power Dissipation at $T_{amb}=25^\circ\text{C}$	P_{tot}	330	mW
Operating and Storage Temperature Range	$T_j; T_{stg}$	-55 to +150	$^\circ\text{C}$

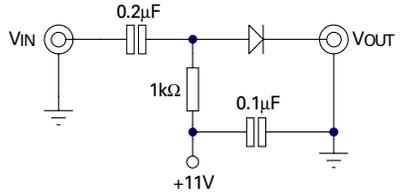
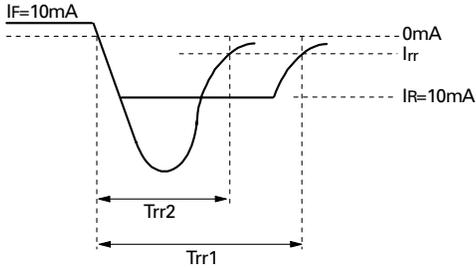
ELECTRICAL CHARACTERISTICS (at $T_{amb} = 25^\circ\text{C}$ unless otherwise stated).

PARAMETER	SYMBOL	MIN.	MAX.	UNIT	CONDITIONS.
Breakdown Voltage	V_{BR}	51		V	$I_R = 5\mu\text{A}$
Forward Voltage	V_F		1.0	V	$I_F = 100\text{mA}$
Reverse current	I_R		0.1 100	μA μA	$V_R = 50\text{V}$ $V_R = 50\text{V}, T_{amb} = 125^\circ\text{C}$
Capacitance	C_o		2.0	pF	$V_R = 0$
Reverse Recovery Time	t_{rr}		4 2	ns ns	$I_F = I_R = 10\text{mA}, I_{RR} = 1\text{mA}$ $I_F = 10\text{mA}, V_R = 6\text{V},$ $R_L = 100\Omega$

Spice parameter data is available upon request for this device

BAV74

Circuit For Measuring Switching Time

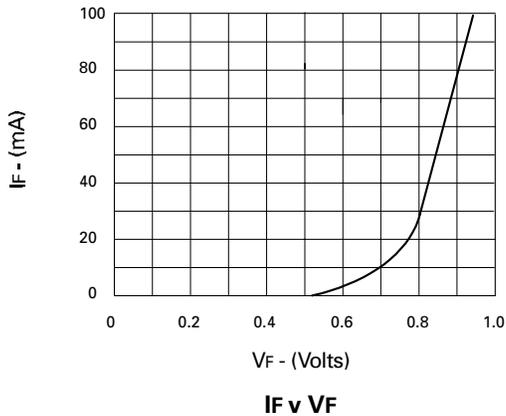


Pulse is supplied by a generator with the following characteristics:

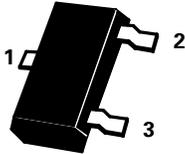
Output impedance = 50Ω
 Rise time $\leq 0.5\text{ns}$
 Pulse width = 100ns

Output is monitored on a sampling oscilloscope with the following characteristics:

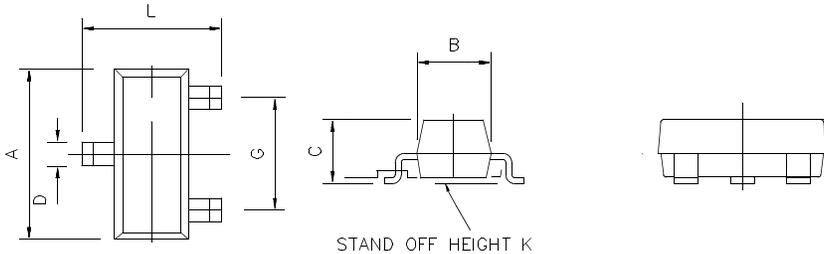
Input impedance = 50Ω
 Rise time $\leq 0.6\text{ns}$



BAV74



DIM	Millimeters		Inches	
	Min	Max	Min	Max
A	2.67	3.05	0.105	0.120
B	1.20	1.40	0.047	0.055
C	-	1.10	-	0.043
D	0.37	0.53	0.0145	0.021
F	0.085	0.15	0.0033	0.0059
G	NOM 1.9		NOM 0.075	
K	0.01	0.10	0.0004	0.004
L	2.10	2.50	0.0825	0.0985
N	NOM 0.95		NOM 0.37	



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