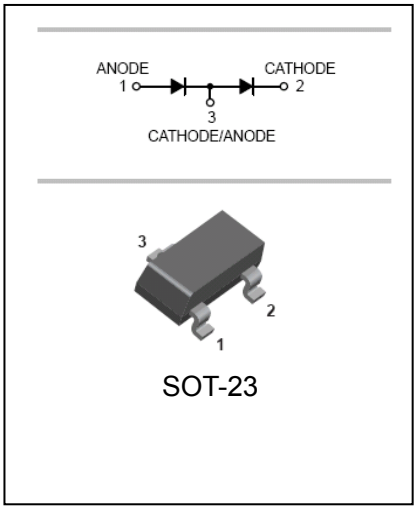
Dual surface mount low leakage diode **BAV199**

FEATURES

- Medium speed current applications.
- Very low leakage current.
- Surface mount package ideally suited for automatic insertion

Lead-free



SOT-23

APPLICATIONS

- Small signal switching

ORDERING INFORMATION

Type No.	Marking	Package Code
BAV199	JY	SOT-23

MAXIMUM RATING @ Ta=25℃ unless otherwise specified

Parameter	**Symbol**	**Value**	**Unit**
Repetitive peak reverse voltage Working peak reverse voltage DC Reverse voltage	V_{RRM} V_{RWM} V_R	85	V
RMS Reverse Voltage	$V_{R(RMS)}$	60	V
Peak forward surge current @t=1.0μs @t=1.0ms @t=1.0s	I_{FSM}	4.0 1.0 0.5	A
Forward continuous current single diode double diode	I_{FM}	160 140	mA
Repetitive Peak Forward Current	I_{FRM}	500	mA
Power dissipation	P_d	250	mW
Thermal Resistance Junction to Ambient Air	$R_{\theta JA}$	500	℃/W
Operating and Storage Temperature Range	T_j, T_{STG}	-65-150	℃

Dual surface mount low leakage diode **BAV199**

ELECTRICAL CHARACTERISTICS @ Ta=25℃ unless otherwise specified

Parameter	Symbol	Test conditions	MIN	MAX	UNIT
Reverse breakdown voltage	$V_{(BR)}$	I_R= 100μA	85		V
Reverse voltage leakage current	I_R	V_R=75V V_R=75V T_j=150℃		5.0 80	nA nA
Forward voltage	V_F	I_F=1mA I_F=10mA I_F=50mA I_F=150mA		900 1000 1100 1250	mV
Junction capacitance	C_j	V_R=0V f=1MHz		2.0	pF
Reverse recovery time	t_{rr}	I_F=I_R=10mA I_{rr}=0.1*I_R R_L=100Ω		3.0	μS

TYPICAL CHARACTERISTICS @ Ta=25℃ unless otherwise specified

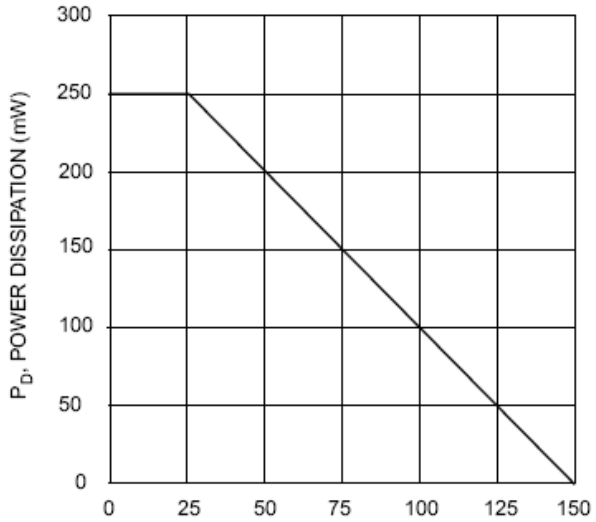


Fig. 1 Power Derating Curve

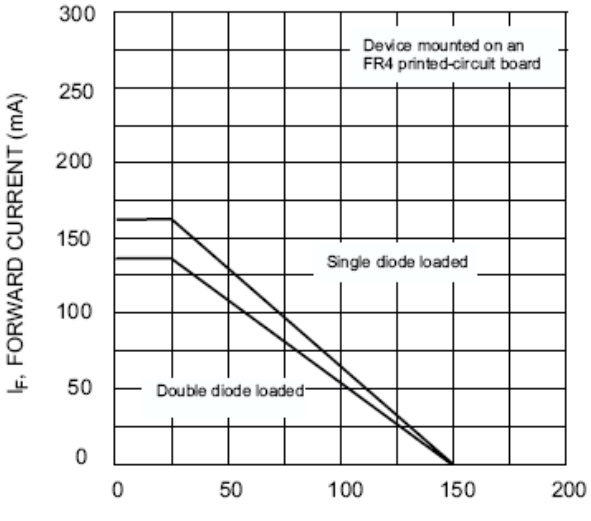
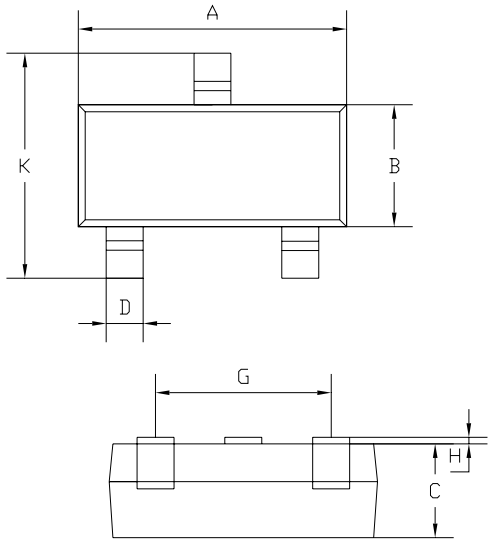


Fig. 2 Current Derating Curve

Dual surface mount low leakage diode **BAV199**

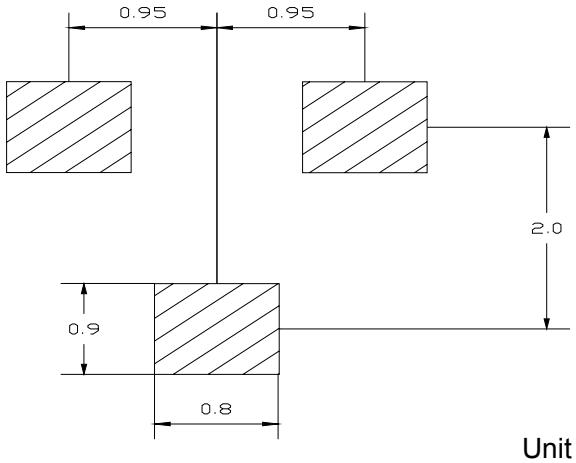
PACKAGE OUTLINE

Plastic surface mounted package SOT-23



SOT-23		
Dim	Min	Max
A	2.85	2.95
B	1.25	1.35
C	1.0Typical	
D	0.37	0.43
E	0.35	0.48
G	1.85	1.95
H	0.02	0.1
J	0.1Typical	
K	2.35	2.45
All Dimensions in mm		

SOLDERING FOOTPRINT



Unit : mm

PACKAGE INFORMATION

Device	Package	Shipping
BAV199	SOT-23	3000/Tape&Reel