

SOD123 SWITCHING DIODE

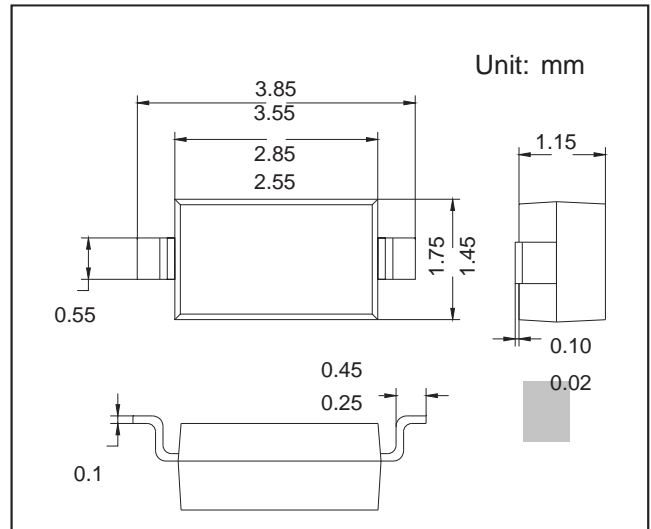
FEATURES

Low Reverse Current
Surface Mount Package Ideally Suited for Automatic Insertion

Fast Switching Speed
For General Purpose Switching Applications

MECHANICAL DATA

Case: SOD-123 Small Outline Plastic Package
Polarity: Color band denotes cathode end
Mounting Position: Any



MAXIMUM RATINGS AND CHARACTERISTICS

@ 25°C Ambient Temperature (unless otherwise noted)

Symbol	Parameter	Value			Unit
		BAV19W	BAV20W	BAV21W	
V_{RM}	Non-Repetitive Peak Reverse Voltage	120	200	250	V
V_{RRM}	Peak Repetitive Reverse Voltage	100	150	200	V
V_{RWM}	Working Peak Reverse Voltage				
$V_{R(RMS)}$	RMS Reverse Voltage	71	106	141	V
I_O	Average Rectified Output Current	200			mA
I_{FSM}	Non-repetitive Peak Forward Surge Current @ t=8.3ms	2.0			A
P_D	Power Dissipation	500			mW
R_{JA}	Thermal Resistance from Junction to Ambient	250			/ /W
T_j	Junction Temperature	150			/
T_{stg}	Storage Temperature	-55~+150			/

Electrical Specification (T_A=25°C unless otherwise specified)

Parameter	Symbol	Test conditions	Min	Typ	Max	Un
Reverse current	I_R	$V_R=100V$	BAV19W		0.1	uA
		$V_R=150V$	BAV20W		0.1	
		$V_R=200V$	BAV21W		0.1	
Forward voltage	V_F	$I_F=100mA$			1	V
		$I_F=200mA$			1.25	
Total capacitance	C_{tot}	$V_R=0V, f=1MHz$			5	pF
Reverse recovery time	t_{rr}	$I_F=I_R=30mA, I_{rr}=0.1 \cdot I_R, R_L=100$			50	ns

RATINGS AND CHARACTERISTIC CURVES

