

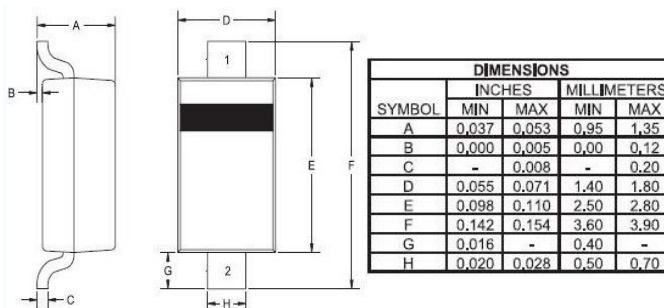
Features

High Current Capability
Low Forward Voltage Drop

Mechanical Data

SOD-123 Small Outline Plastic Package
Polarity: Color band denotes cathode end
Epoxy UL: 94V-0
Mounting Position: Any

SOD123



Maximum Ratings & Thermal Characteristics

(Ratings at 25°C ambient temperature unless otherwise specified.)

Parameters	Symbol	MBR0540T1G	Unit
Maximum repetitive peak reverse voltage	VRRM	40	V
Maximum RMS voltage	VRMS	28	V
Maximum DC blocking voltage	VDC	40	V
Maximum average forward rectified current	IFM	0.5	A
Peak forward surge current 8.3 ms single half sine-wave	IFSM	5.5	A
Typical thermal resistance	RθJA	200	°C/W
Power Dissipation	PD	500	mW
Storage temperature range	TSTG	-50-+150	°C
Voltage rate of change	Dv/dt	1000	V/uS

MBR0540T1G

Electrical Characteristics

(Ratings at 25°C ambient temperature unless otherwise specified).

Parameters	Symbol	Test conditions	MBR0540T1G	Unit
Maximum forward voltage	VF	IF = 0.1A	---	V
		IF = 0.5A	0.510	
		IF = 1.0A	0.620	
Maximum reverse breakdown voltage	VR	IR=250uA	---	V
		IR=200uA	---	
		IR=20.0uA	40	
Maximum reverse current	IR	VR=10V	---	uA
		VR=15V	---	
		VR=20V	10	
		VR=30V	---	
		VR=40V	20	
Capacitance between terminals	CT	VR = 0V, f = 1MHz	170	pF

RATING AND CHARACTERISTIC CURVES (MBR0540T1G)

