



Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from Europe, America and south Asia, supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts, Customers Priority, Honest Operation, and Considerate Service", our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip, ALPS, ROHM, Xilinx, Pulse, ON, Everlight and Freescale. Main products comprise IC, Modules, Potentiometer, IC Socket, Relay, Connector. Our parts cover such applications as commercial, industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



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MBR0520L THRU MBR0540L

Features

- Lead Free Finish/RoHS Compliant ("P" Suffix designates RoHS Compliant. See ordering information)
- For Surface Mount Application
- Low Forward Voltage and Extremely Low Thermal Resistance
- Halogen free available upon request by adding suffix "-HF"
- Epoxy meets UL 94 V-0 flammability rating
- Moisture Sensitivity Level 1

Maximum Ratings

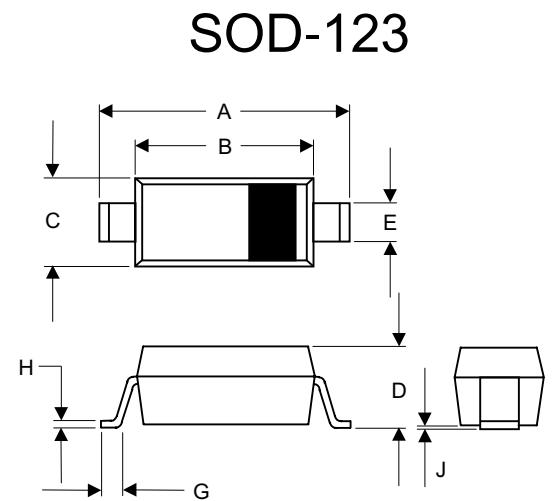
- Operating Temperature: -65°C to +125°C
- Storage Temperature: -65°C to +150°C
- Maximum Thermal Resistance: 305 °C/W Junction to Ambient

MCC Catalog Number	Device Marking	Maximum Recurrent Peak Reverse Voltage	Maximum RMS Voltage	Maximum DC Blocking Voltage
MBR0520L	SD	20V	14V	20V
MBR0530L	SE	30V	21V	30V
MBR0540L	SF	40V	28V	40V

Electrical Characteristics @ 25°C Unless Otherwise Specified

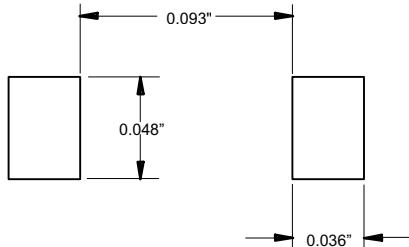
Average Forward Current	I_F	0.5A	
Peak Forward Surge Current	I_{FSM}	5.5A	8.3ms half sine
Maximum Forward voltage MBR0520L	V_F	0.3V	$I_F=0.1A$
		0.385V	$I_F=0.5A$
MBR0530L		0.375V	$I_F=0.1A$
		0.43V	$I_F=0.5A$
MBR0540L	I_R	0.51V	$I_F=0.5A$
		0.62V	$I_F=1.0A$
Maximum DC Reverse Current At Rated DC Blocking Voltage			
MBR0520L		75uA	$V_R=10V$
		250uA	$V_R=20V$
MBR0530L		20uA	$V_R=15V$
		130uA	$V_R=30V$
MBR0540L		10uA	$V_R=20V$
		20uA	$V_R=40V$
Typical Junction Capacitance	C_J	170pF	$V_R=0, f=1MHz$
Power Dissipation	P_D	410mW	

**0.5 Amp
Schottky Rectifier
20 to 40 Volts**



DIMENSIONS					NOTE
DIM	INCHES		MM		
	MIN	MAX	MIN	MAX	
A	.140	.152	3.55	3.85	
B	.100	.112	2.55	2.85	
C	.055	.071	1.40	1.80	
D	-----	.053	-----	.135	
E	.012	.031	0.30	.78	
G	.006	-----	0.15	-----	
H	-----	.01	-----	.25	
J	-----	.006	-----	.15	

SUGGESTED SOLDER PAD LAYOUT



MBR0520L thru MBR0540L

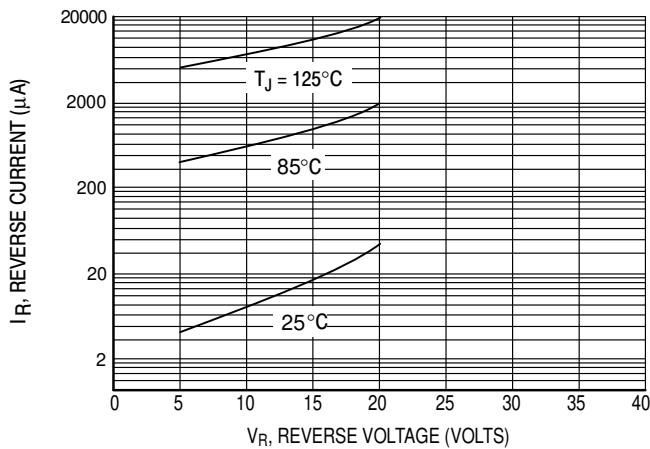


Figure 1. Typical Reverse Current of MBR0520L

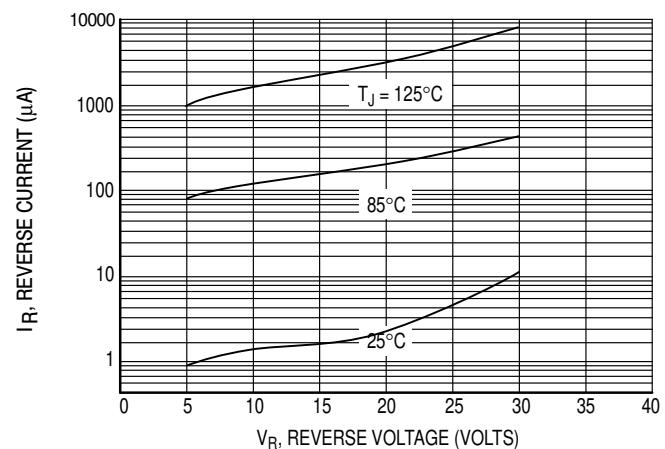


Figure 2. Typical Reverse Current of MBR0530L

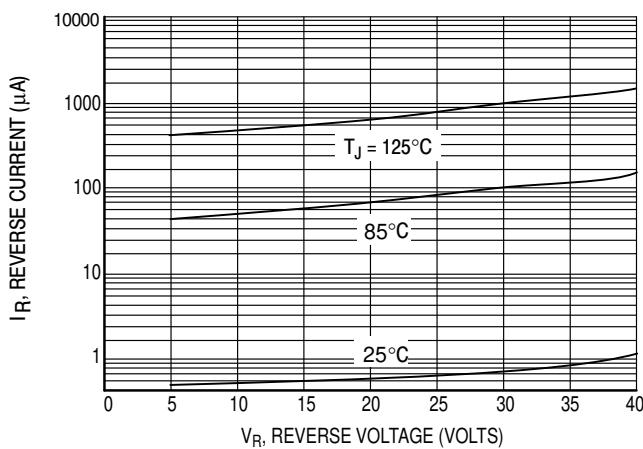


Figure 3. Typical Reverse Current of MBR0540L



TM

Micro Commercial Components

Ordering Information :

Device	Packing
Part Number-TP	Tape&Reel: 3Kpcs/Reel

Note : Adding "-HF" suffix for halogen free, eg. Part Number-TP-HF

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