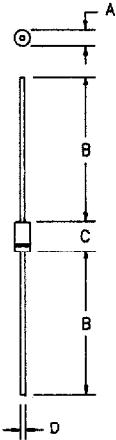


5 Amp Schottky Rectifier

MS545

C



Dim.	Millimeter				Notes
	Inches	Minimum	Maximum	Minimum	Maximum
A	.188	.260	4.78	6.50	Dia.
B	1.00	---	25.4	---	
C	.285	.375	7.24	9.52	
D	.046	.056	1.17	1.42	Dia.

PLASTIC D0201AD

Microsemi
Catalog Number
MS545

Working
Peak Reverse
Voltage
45V

Repetitive
Peak Reverse
Voltage
45V

- Schottky Barrier Rectifier
- Guard Ring Protection
- 175°C Junction Temperature
- High Current Capability

Electrical Characteristics

Average forward current	I F(AV) 5.0 Amps	T A = 142°C Square wave, R _{θJL} = 11°C/W, L = 1/8"
Average forward current	I F(AV) 5.0 Amps	T A = 131°C Square wave, R _{θJL} = 14.7°C/W, L = 3/8"
Maximum surge current	I FSM 300 Amps	8.3ms, half sine, T J = 175°C
Max peak forward voltage	V FM .51 Volts	I FM = 1.0A: T J = 25°C *
Max peak forward voltage	V FM .62 Volts	I FM = 5.0A: T J = 25°C *
Max peak reverse current	I RM 250 μA	V _{RRM} , T J = 25°C
Typical junction capacitance	C J 415pF	V R = 5.0V, T J = 25°C

*Pulse test: Pulse width 300 μsec, Duty cycle 2%

Thermal and Mechanical Characteristics

Storage temperature range	T _{SIG}	-40°C to 15°C
Operating junction temp range	T _J	-40°C to 175°C
Maximum thermal resistance	L = 3/8" R _{θJL}	14.7°C/W
	L = 1/8" R _{θJL}	11°C/W
Weight		Junction to Lead Junction to Lead .032 ounces (1.0 grams) typical

MS545

Figure 1
Typical Forward Characteristics

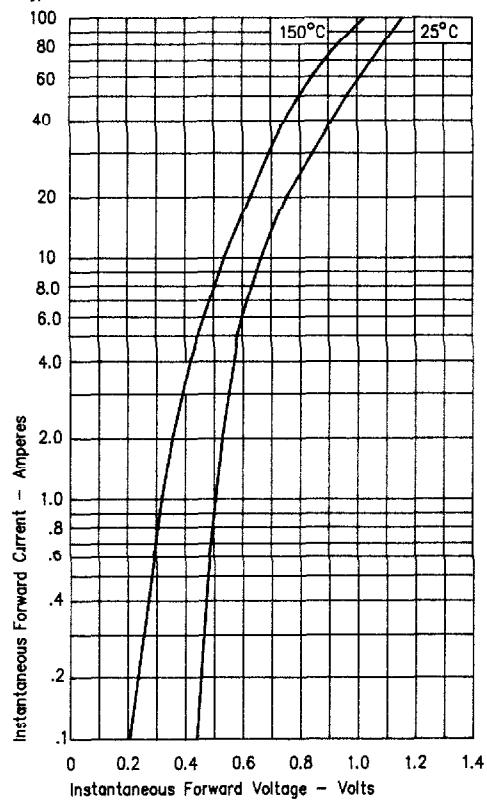


Figure 3
Typical Junction Capacitance

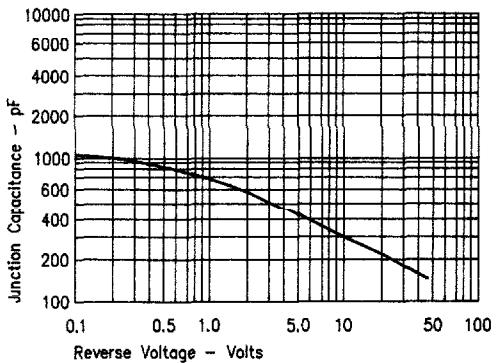


Figure 2
Typical Reverse Characteristics

