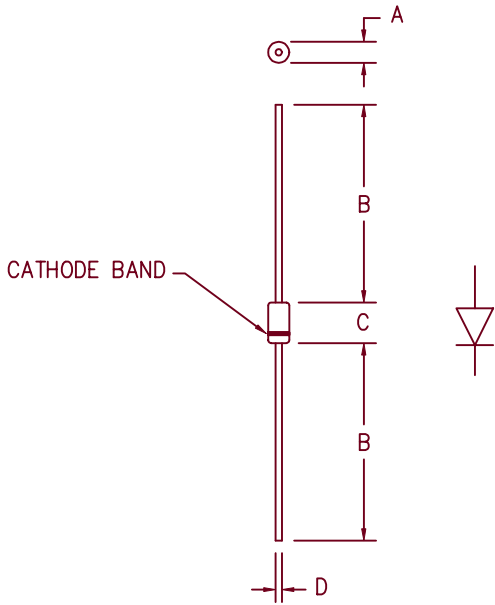


# 8 Amp Schottky Rectifier MSP835, MSP845



Dim.	Inches		Millimeter		Notes
	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	Working Peak Reverse Voltage	Repetitive Peak Reverse Voltage
MSP835	35V	35V
MSP845	45V	45V

- Schottky Barrier Rectifier
- Guard Ring Protection
- Low Forward Voltage
- 150°C Junction Temperature
- High Current Capability
- $V_{RR}$  35 to 45 Volts

Electrical Characteristics		
Average forward current	$I_{F(AV)}$ 8.0 Amps	$T_A = 112^\circ\text{C}$ Square wave, $R_{\theta JL} = 9.0^\circ\text{C/W}$ , $L = 3/8"$
Maximum surge current	$I_{F(AV)}$ 400 Amps	8.3 ms, half sine, $T_J = 150^\circ\text{C}$
Max peak forward voltage	$V_{FM}$ .40 Volts	$I_{FM} = 8.0\text{A}; T_J = 150^\circ\text{C}^*$
Max peak forward voltage	$V_{FM}$ .52 Volts	$I_{FM} = 8.0\text{A}; T_J = 25^\circ\text{C}^*$
Max peak reverse current	$I_{RM}$ 2 mA	$V_{RRM}, T_J = 25^\circ\text{C}$
Typical junction capacitance	$C_J$ 575 pF	$V_R = 5.0\text{V}, T_J = 25^\circ\text{C}$

\* Pulse test: Pulse width 300  $\mu\text{sec}$ , Duty cycle 2%

Thermal and Mechanical Characteristics		
Storage temperature range	$T_{STG}$	$-55^\circ\text{C}$ to $150^\circ\text{C}$
Operating junction temp range	$T_J$	$-55^\circ\text{C}$ to $150^\circ\text{C}$
Maximum thermal resistance	$L = 3/8"$ $R_{\theta JL}$	$9.0^\circ\text{C/W}$ Junction to lead
Weight		.032 ounces (1.0 grams) typical

# MSP835, MSP845

Figure 1  
Typical Forward Characteristic

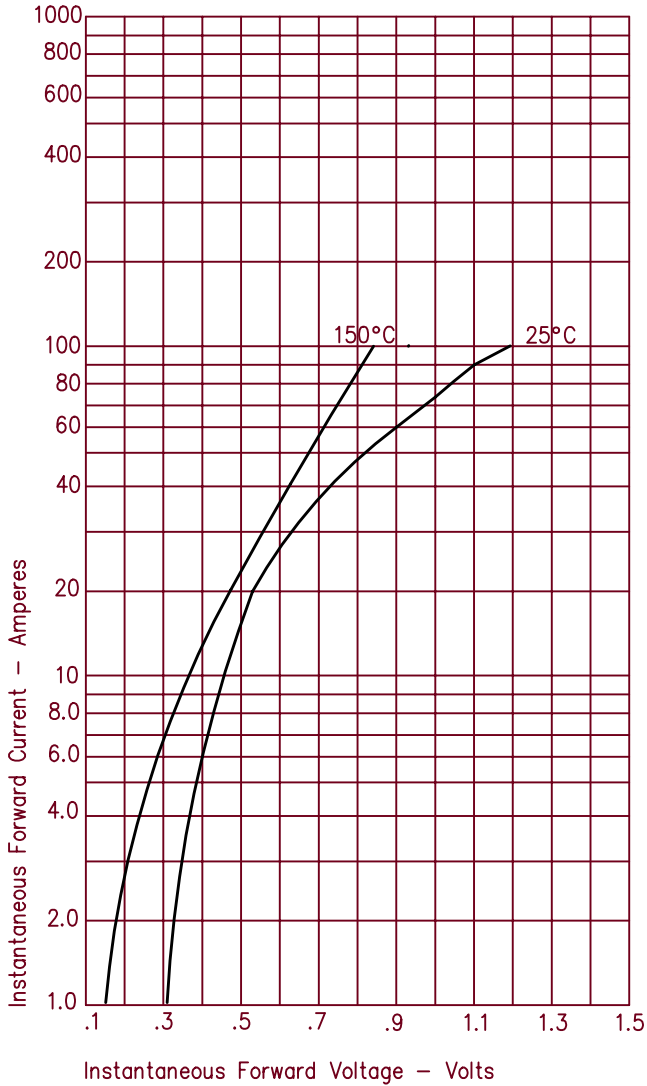


Figure 3  
Typical Junction Capacitance

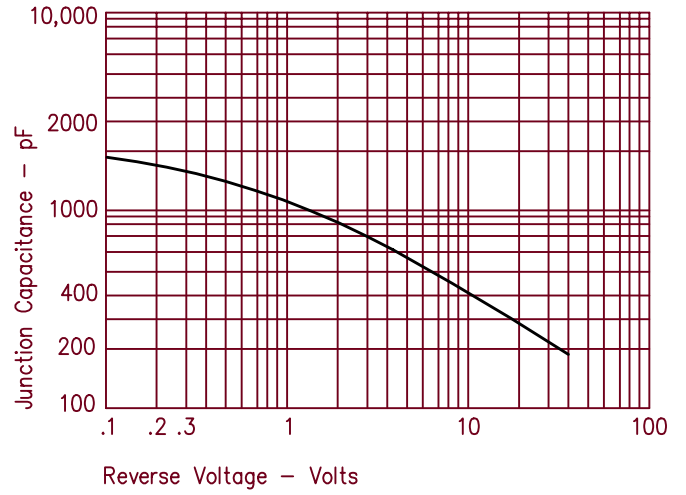


Figure 2  
Typical Reverse Characteristics

