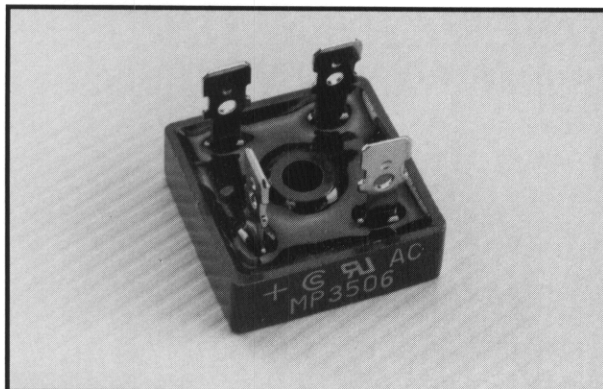




# MP35005 Thru MP3510

## 35 AMP SILICON BRIDGE RECTIFIER



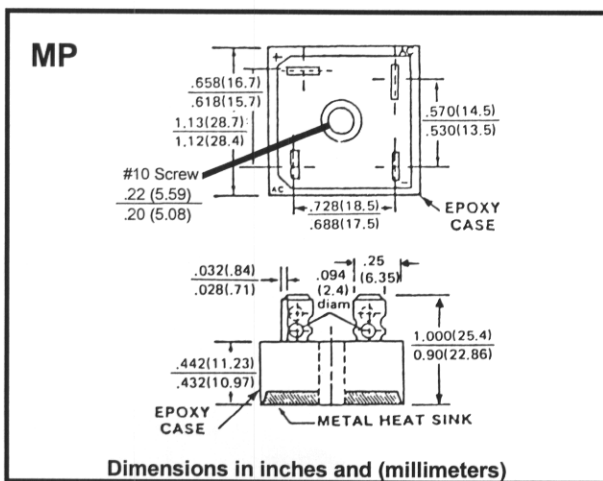
### FEATURES

- Rating to 1000V PRV
- 400A surge capability
- High efficiency
- UL recognized: File #E106441

### Mechanical Data

- Case: Molded Plastic with heatsink internally mounted in the bridge encapsulation
- Mounting: Through hole for #8 screw
- Weight: 0.7 ounce, 20 grams

### Outline Drawing



WIRE LEAD (.038 - .042 IN.) Add "W" to end of part number

### Maximum Ratings & Characteristics

- Ratings at 25° C ambient temperature unless otherwise specified
- Single phase, half wave, 60Hz, resistive or inductive load
- For capacitive load, derate current by 20%

		MP35005	MP3501	MP3502	MP3504	MP3506	MP3508	MP3510	Units
Maximum Recurrent Peak Reverse Voltage	V <sub>RRM</sub>	50	100	200	400	600	800	1000	V
Maximum RMS Input Voltage	V <sub>RMS</sub>	35	70	140	280	420	560	700	V
Maximum DC Blocking Voltage	V <sub>DC</sub>	50	100	200	400	600	800	1000	V
Maximum Average Forward Output Current @ T <sub>c</sub> = 55°C	I <sub>(AV)</sub>	35.0							A
Peak Forward Surge Current 8.3 ms Single Half-Sine-Wave Superimposed On Rated Load (JEDEC Method)	I <sub>FSM</sub>	400							A
Maximum Forward Voltage Drop Per Element At 17.5A	V <sub>F</sub>	1.1							V
Maximum Reverse Current At Rated DC Blocking Voltage per Element @ T <sub>A</sub> = 25°C @ T <sub>A</sub> = 100°	I <sub>R</sub>	10 500							μA
I <sup>2</sup> t Rating for Fusing (t < 8.3ms)	I <sup>2</sup> t	664							A <sup>2</sup> S
Typical Thermal Resistance (Note 1)	R <sub>THJC</sub>	2.0							°C/W
Operating Temperature Range	T <sub>J</sub>	-55 to +125							°C
Storage Temperature Range	T <sub>STG</sub>	-55 to +150							°C

Note: 1. Mounted on a 11.8 in. <sup>2</sup> X 0.06 in. thick (300mm<sup>2</sup> X 1.5MM thick) copper plate