| 2KBP08M-E |  |
| :---: | :---: |
| SINGLE <br> PASSIVATED <br> Voltage: 800V |  |

## Features

Glass passivated chip junction
High case dielectric strength
High surge current capability Ideal for printed circuit board
Halogen Free

## Mechanical Data

Terminal: Plated leads solderable per MIL-STD 202E, Method 208C
Case: UL-94 Class V-0 recognized Halogen Free Epoxy
Polarity: As marked on body


| MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS <br> (single-phase, half -wave, 60 HZ , resistive or inductive load rating at $25^{\circ} \mathrm{C}$, unless otherwise stated, for capacitive load, derate current by $20 \%$ ) |  |  |  |
| :---: | :---: | :---: | :---: |
|  | Symbol | 2KBP08M-E | units |
| Maximum repetitive peak reverse voltage | Vrrm | 800 | v |
| Maximum RMS voltage | Vrms | 560 | v |
| Maximum DC blocking voltage | Vdc | 800 | v |
| Maximum average forward rectified output current $\mathrm{Ta}=55^{\circ} \mathrm{C}$ | If(av) | 2.0 | A |
| Peak forward surge current single sine-wave superimposed on rated load (JEDEC Method) | Ifsm | 60 | A |
| Maximum instantaneous forward voltage drop per leg at 3.14A | Vf | 1.1 | v |
| Rating for fusing ( l < 8.3ms) | It | 15 | $A^{2} \mathrm{Sec}$ |
| Maximum DC reverse current at <br> rated DC blocking voltage per leg $\mathrm{Ta}=25^{\circ} \mathrm{C}$ <br> $\mathrm{Ta}=125^{\circ} \mathrm{C}$ | Ir | $\begin{aligned} & 5.0 \\ & 500 \end{aligned}$ | $\mu \mathrm{A}$ |
| Maximum thermal resistance per leg (Note1) | Rth(ja) Rth(jc) | $\begin{aligned} & 30 \\ & 11 \end{aligned}$ | CN |
| Typical junction capacitance per leg at $4.0 \mathrm{~V}, 1 \mathrm{MHz}$ | Cj | 25 | pF |
| Operating junction and storage temperature range | Tj, Tstg | -55 to +150 | ${ }^{\circ} \mathrm{C}$ |
| Note: <br> 1. Thermal resistance from junction to ambient and from junction to lead mounted on P.C.B. with $0.47 \times 047^{\prime \prime}(12 \times 12 \mathrm{~mm})$ copper pads |  |  |  |

RATINGS AND CHARACTERISTIC CURVES 2KBP08M-E


Figure 1. Derating Curve Output Rectified Current


Figure 3. Typical Forward Characteristics Per Diode


Figure 5. Typical Junction Capacitance Per Diode


Figure 2. Maximum Non-Repetitive Peak Forward Surge Current Per Diode


Figure 4. Typical Reverse Leakage Characteristics Per Diode


Figure 6. Non-Repetitive Peak Forward Surge Current Square Waveform

