

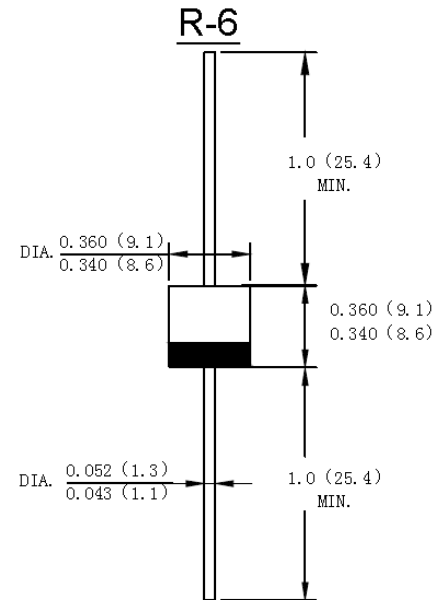
10.0 AMP. Plastic Silicon Rectifiers

Features

- Low forward voltage drop
- High current capability
- High reliability
- High surge current capability
- Plastic material-UL flammability 94V-0

Mechanical Data

- Case: Moeded plastic R-6
- Terminals: Plated leads solderable per MIL-STD-202,Method 208 guaranteed
- Polarity: Color band dentes cathode end
- Mounting Position: Any
- Making: Type Number
- Lead Free: For Rohs/Lead Free Version



Dimensions in inches and (millimeters)

Maximum Ratings and Electrical Characteristics

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

| Type Number | SYMBOL | 10A05 | 10A1 | 10A2 | 10A4 | 10A6 | 10A8 | 10A10 | Unit |
|--|-----------------|-------------|------|------|------|------|------|-------|--------------|
| Maximum Recurrent Peak Reverse Voltage | V_{RRM} | 50 | 100 | 200 | 400 | 600 | 800 | 1000 | V |
| Maximum RMS Voltage | V_{RMS} | 35 | 70 | 140 | 280 | 420 | 560 | 700 | V |
| Maximum DC Blocking Voltage | V_{DC} | 50 | 100 | 200 | 400 | 600 | 800 | 1000 | V |
| Maximum Average Forward Rectified Current.375"(9.5mm) lead length @ $T_A=60^\circ C$ | I_o | 10.0 | | | | | | | A |
| Peak Forward Surge Current 8.3ms Single half sine-wave superimposed on rated load (JEDEC Method) | I_{FSM} | 400 | | | | | | | A |
| Forward Voltage @ $I_F=10.0A$ | V_{FM} | 1.1 | | | | | | | V |
| Peak Reverse Current @ $T_A=25^\circ C$ | I_R | 5.0 | | | | | | | uA |
| At Rated DC Blocking Voltage @ $T_A=100^\circ C$ | | 100 | | | | | | | |
| Typical Junction Capacitance (Note 1) | C_j | 150 | | | | | | | pF |
| Typical Thermal Resistance Junction to Ambient(Note 2) | $R_{\theta JA}$ | 6 | | | | | | | $^\circ C/W$ |
| Operating Temperature Range | T_j | -55 to +125 | | | | | | | $^\circ C$ |
| Storage Temperature Range | T_{STG} | -55 to +150 | | | | | | | $^\circ C$ |

Note:1. Measured at 1.0 MHz and Applied reverse Voltage of 4.0V D.C

2. Leads maintained at ambient temperature at a distance of 9.5mm from the case

FIG. 1 – FORWARD CURRENT DERATING CURVE

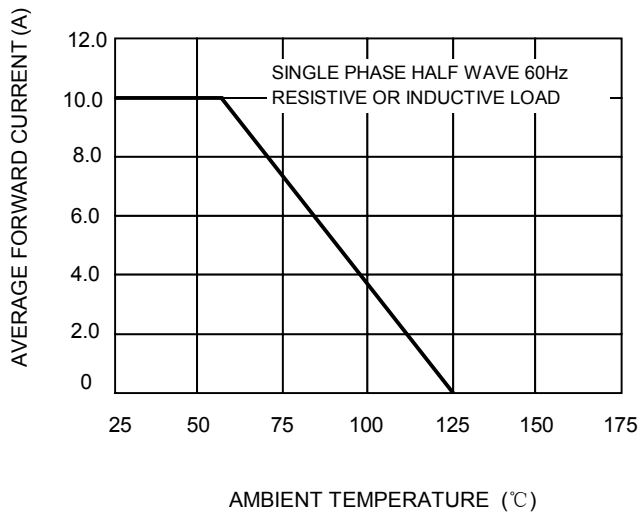


FIG.2-TYPICAL FORWARD CHARACTERISTICS

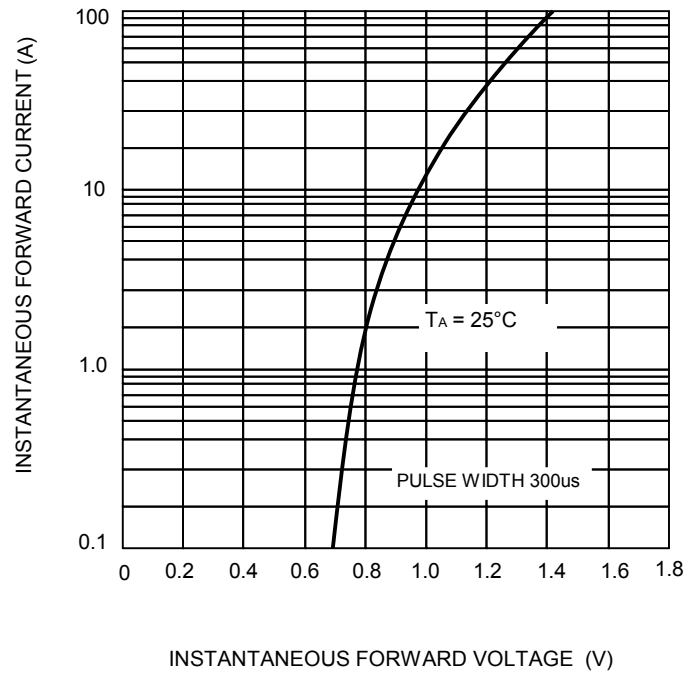


FIG. 3 – MAXIMUM NON-REPETITIVE SURGE CURRENT

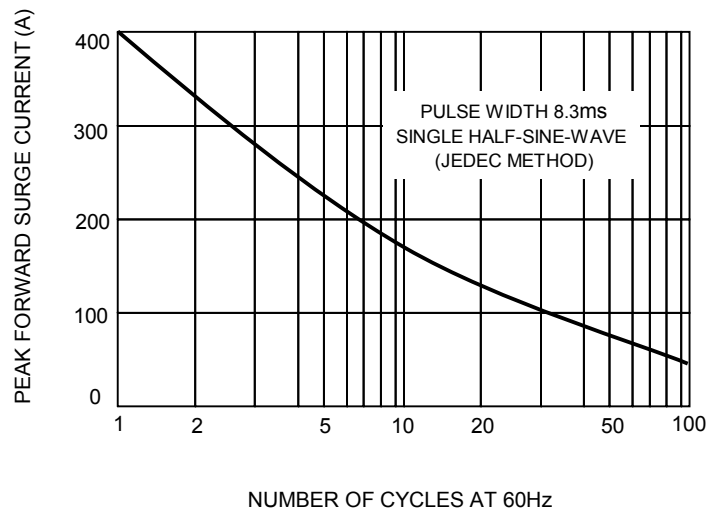


FIG.4 – TYPICAL JUNCTION CAPACITANCE

