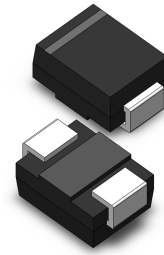


VOLTAGE RANGE: 20 - 100V
CURRENT: 1.0 A

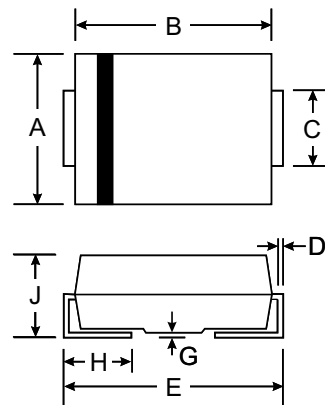
Features

- Schottky Barrier Chip
- Ideally Suited for Automatic Assembly
- Low Power Loss, High Efficiency
- For Use in Low Voltage Application
Guard Ring Die Construction
- Plastic Case Material has UL Flammability
Classification Rating 94V-O



Mechanical Data

- Case: SMB/DO-214AA, Molded Plastic
- Terminals: Solder Plated, Solderable
per MIL-STD-750, Method 2026
- Polarity: Cathode Band or Cathode Notch
- Marking: Type Number
- Weight: 0.093 grams (approx.)



| SMB(DO-214AA) | | |
|----------------------|------|------|
| Dim | Min | Max |
| A | 3.30 | 3.94 |
| B | 4.06 | 4.70 |
| C | 1.91 | 2.21 |
| D | 0.15 | 0.31 |
| E | 5.00 | 5.59 |
| G | 0.10 | 0.20 |
| H | 0.76 | 1.52 |
| J | 2.00 | 2.62 |
| All Dimensions in mm | | |

Maximum Ratings and Electrical Characteristics T_A = 25°C unless otherwise specified

Single phase, half wave, 60Hz, resistive or inductive load. For capacitive load, derate current by 20%.

| Characteristic | Symbol | SK12L | SK13L | SK14L | SK15L | SK16L | SK18L | SK110L | Unit |
|---|-------------------|-------------|-------|-------|-------------|-------|-------|--------|------|
| Maximum repetitive peak reverse voltage | V _{RRM} | 20 | 30 | 40 | 50 | 60 | 80 | 100 | V |
| Maximum RMS voltage | V _{RMS} | 14 | 21 | 28 | 35 | 42 | 56 | 70 | V |
| Maximum DC blocking voltage | V _{DC} | 20 | 30 | 40 | 50 | 60 | 80 | 100 | V |
| Maximum average forward rectified current at T _L (see fig.1) | I _(AV) | 1.0 | | | | | | | A |
| Peak forward surge current 8.3ms single half sine-wave superimposed on rated load (JEDEC Method) | I _{FSM} | 40.0 | | | | | | | A |
| Maximum instantaneous forward voltage at 1.0A | V _F | 0.45 | 0.55 | 0.70 | | 0.85 | | V | |
| Maximum DC reverse current at rated DC blocking voltage <small>T_A=25°C</small> <small>T_A=100°C</small> | I _R | 6.0 | | | 5.0 | | | mA | |
| Typical junction capacitance (NOTE 1) | C _J | 110 | | | 90 | | | pF | |
| Typical thermal resistance (NOTE 2) | R _{θJA} | 88.0 | | | | | | | °C/W |
| Operating junction temperature range | T _J | -65 to +125 | | | -65 to +150 | | | °C | |
| Storage temperature range | T _{STG} | -65 to +150 | | | | | | | °C |

Note: 1. Measured at 1MHz and applied reverse voltage of 4.0V D.C.
 2. P.C.B. mounted with 0.2x0.2" (5.0x5.0mm) copper pad areas

RATINGS AND CHARACTERISTIC CURVES SK12L THRU SK110L

