

SL13-M

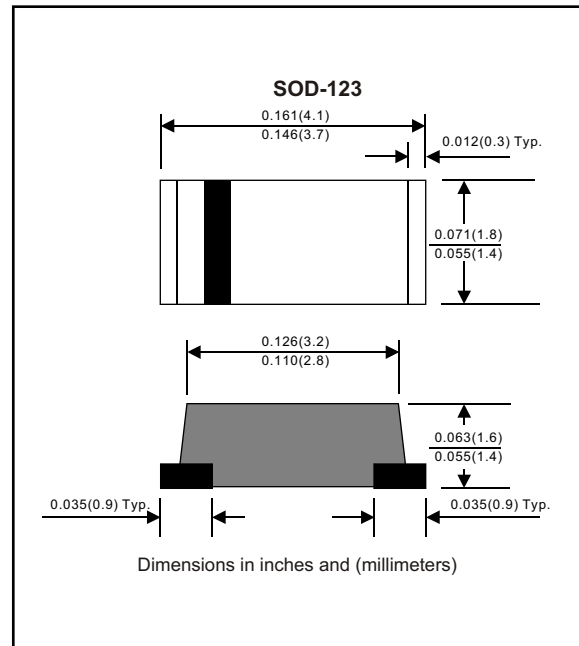
Silicon epitaxial planer type

Features

- Plastic package has Underwriters Laboratory Flammability Classification 94V-O Utilizing Flame Retardant Epoxy Molding Compound.
- For surface mounted applications.
- Exceeds environmental standards of ML-S-19500 / 228
- Low leakage current

Mechanical data

Case : Molded plastic, JEDEC SOD123 / MNISMA
 Terminals : Solder plated, solderable per ML-STD-750, Method 2026
 Polarity : Indicated by cathode band
 Mounting Position : Any
 Weight : 0.04 gram



MAXIMUM RATINGS (AT T_A=25°C unless otherwise noted)

| PARAMETER | CONDITIONS | Symbol | MIN. | TYP. | MAX. | UNIT |
|---|---|------------------|------|------|------|--------|
| Forward rectified current 50 Hz sine wave , R-load | On alumina substrate | I _O | | | 1.29 | A |
| | T _L = 129°C On glass-epoxy substrate | | | | 1.1 | A |
| Forward surge current | 8.3ms single half sine-wave superimposed on rate load (JEDEC methode) | I _{FSM} | | | 30 | A |
| Reverse current | V _R = V _{RRM} T _A = 25°C | I _R | | | 0.5 | mA |
| | V _R = V _{RRM} T _A = 100°C | | | | 10 | mA |
| Thermal resistance | Junction to ambient | R _{JA} | | 42 | | °C / w |
| Diode junction capacitance | f=1MHz and applied 10vDC reverse voltage | C _J | | 90 | | pF |
| Storage temperature | | T _{STG} | -55 | | +150 | °C |

| SYMBOLS | MARKING CODE | V _{RRM} *1 (V) | V _{RMS} *2 (V) | V _R *3 (V) | V _F *4 (V) | Operating temperature (°C) |
|---------|--------------|----------------------------|----------------------------|--------------------------|--------------------------|-------------------------------|
| SL13-M | L3 | 30 | 21 | 30 | 0.40 | -55 to +125 |

- *1 Repetitive peak reverse voltage
- *2 RMS voltage
- *3 Continuous reverse voltage
- *4 Maximum forward voltage

RATING AND CHARACTERISTIC CURVES (SL13-M)

FIG.1-TYPICAL FORWARD CHARACTERISTICS

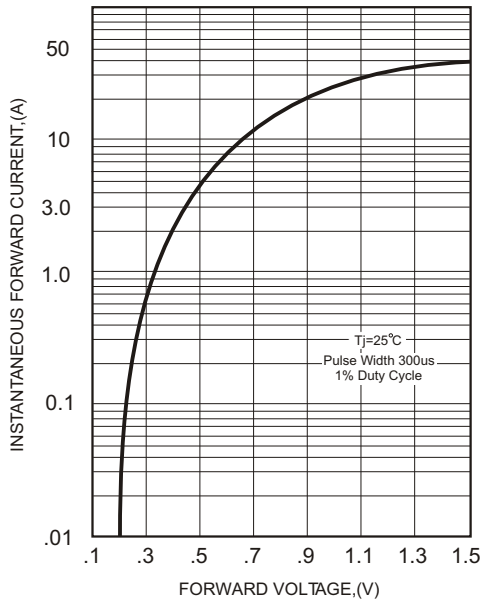


FIG.2-TYPICAL FORWARD CURRENT DERATING CURVE

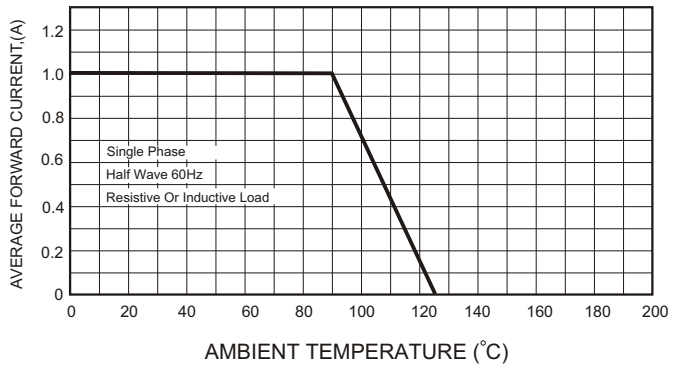


FIG.4-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

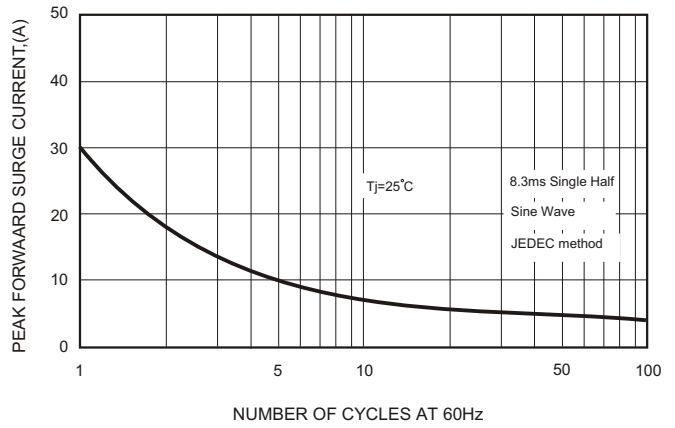


FIG.3 - TYPICAL REVERSE CHARACTERISTICS



FIG.5-TYPICAL JUNCTION CAPACITANCE

