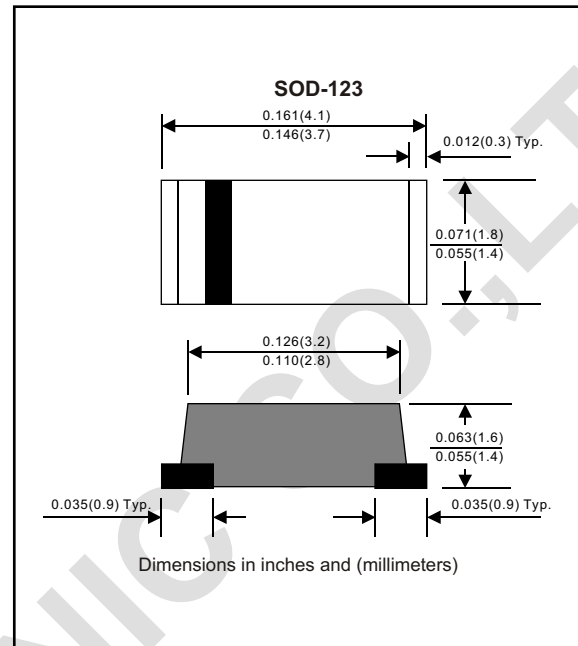


### Features

- 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 : Moulded plastic, JEDEC SOD-123 / MINISMA  
 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<sub>A</sub>=25°C unless otherwise noted)

| PARAMETER                  | CONDITIONS  | Symbol           | MIN. | TYP. | MAX. | UNIT   |
|----------------------------|---|------------------|------|------|------|--------|
| Forward rectified current  | See Fig.1   | I <sub>O</sub>   |      |      | 2.0  | A      |
| Forward surge current      | 8.3ms single half sine-wave superimposed on rate load (JEDEC methode) | I <sub>FSM</sub> |      |      | 50   | A      |
| Reverse current            | V <sub>R</sub> = V <sub>RRM</sub> T <sub>A</sub> = 25°C               | I <sub>R</sub>   |      |      | 0.5  | mA     |
|                            | V <sub>R</sub> = V <sub>RRM</sub> T <sub>A</sub> = 125°C              |                  |      |      | 10   | mA     |
| Thermal resistance         | Junction to ambient   | R <sub>JA</sub>  |      | 85   |      | °C / w |
| Diode junction capacitance | f=1MHz and applied 4vDC reverse voltage                               | C <sub>J</sub>   |      | 160  |      | pF     |
| Storage temperature        |   | T <sub>STG</sub> | -55  |      | +150 | °C     |

| SYMBOLS  | MARKING CODE | V <sub>RRM</sub> *1<br>(V) | V <sub>RMS</sub> *2<br>(V) | V <sub>R</sub> *3<br>(V) | V <sub>F</sub> *4<br>(V) | Operating temperature<br>(°C) |
|----------|--------------|----------------------------|----------------------------|--------------------------|--------------------------|-------------------------------|
| FM220-M  | 22           | 20                         | 14                         | 20                       | 0.50                     | -55 to +125                   |
| FM230-M  | 23           | 30                         | 21                         | 30                       |                          |                               |
| FM240-M  | 24           | 40                         | 28                         | 40                       |                          |                               |
| FM250-M  | 25           | 50                         | 35                         | 50                       | 0.70                     | -55 to +150                   |
| FM260-M  | 26           | 60                         | 42                         | 60                       |                          |                               |
| FM280-M  | 28           | 80                         | 56                         | 80                       | 0.85                     |                               |
| FM2100-M | 20           | 100                        | 70                         | 100                      |                          |                               |

\*1 Repetitive peak reverse voltage

\*2 RMS voltage

\*3 Continuous reverse voltage

\*4 Maximum forward voltage

### RATING AND CHARACTERISTIC CURVES (FM220-M THRU FM2100-M)

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

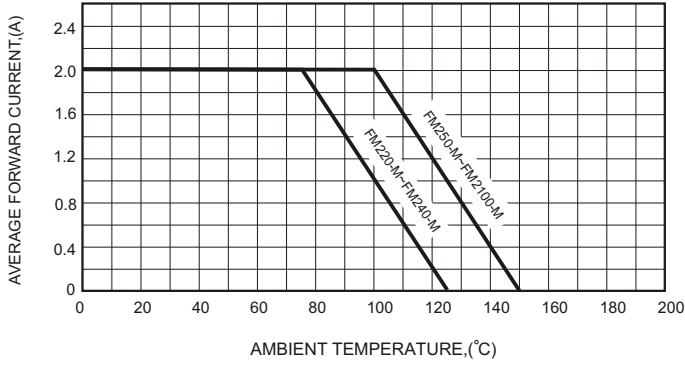


FIG.2-TYPICAL FORWARD CHARACTERISTICS

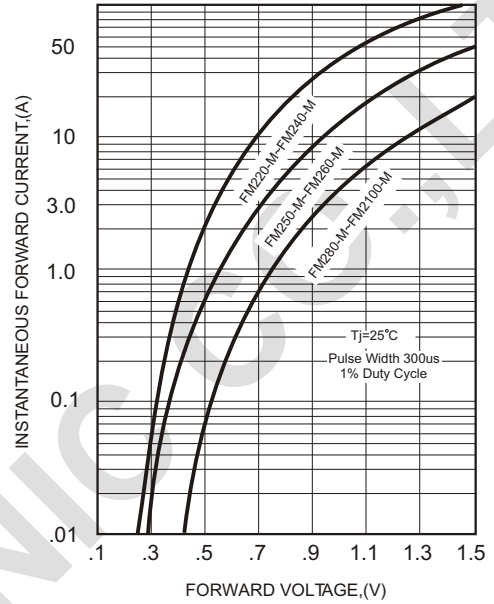


FIG.3-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

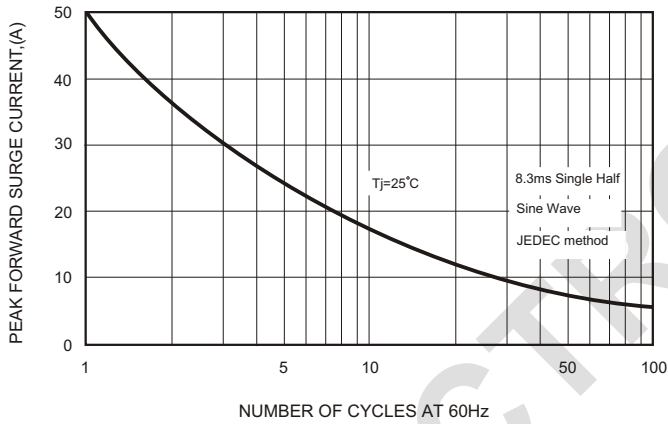


FIG.4-TYPICAL JUNCTION CAPACITANCE

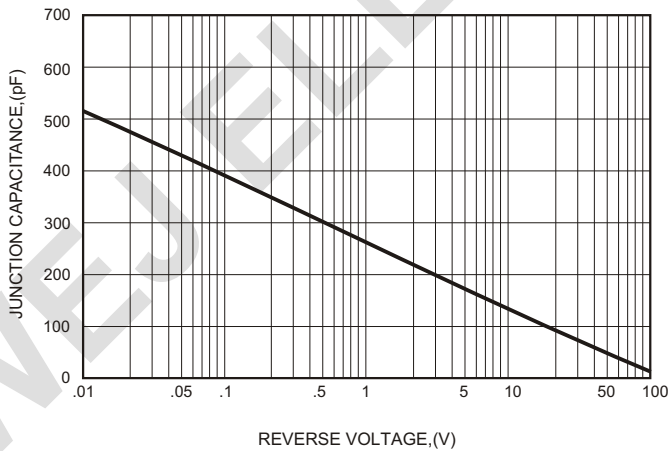


FIG.5 - TYPICAL REVERSE CHARACTERISTICS

