

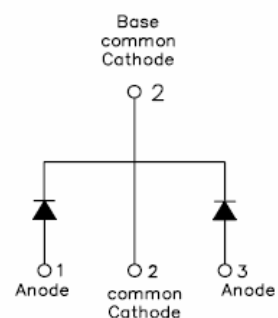
MUR1560CT ULTRAFAST PLASTIC RECTIFIER

Applications:

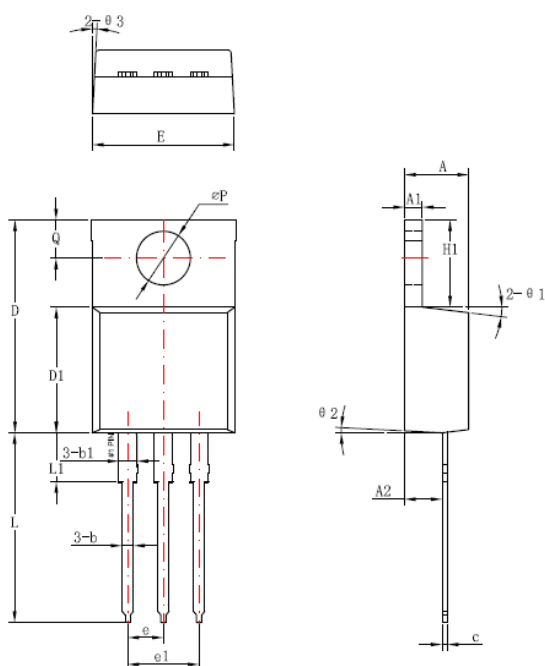
- Switching Power Supply
- Power Switching Circuits
- General Purpose

Features:

- Ultra-Fast Switching
- High Current Capability
- Low Reverse Leakage Current
- High Surge Current Capability
- Plastic Material has UL Flammability Classification 94V-0
- This is a Pb – Free Device
- All SMC parts are traceable to the wafer lot
- Additional testing can be offered upon request

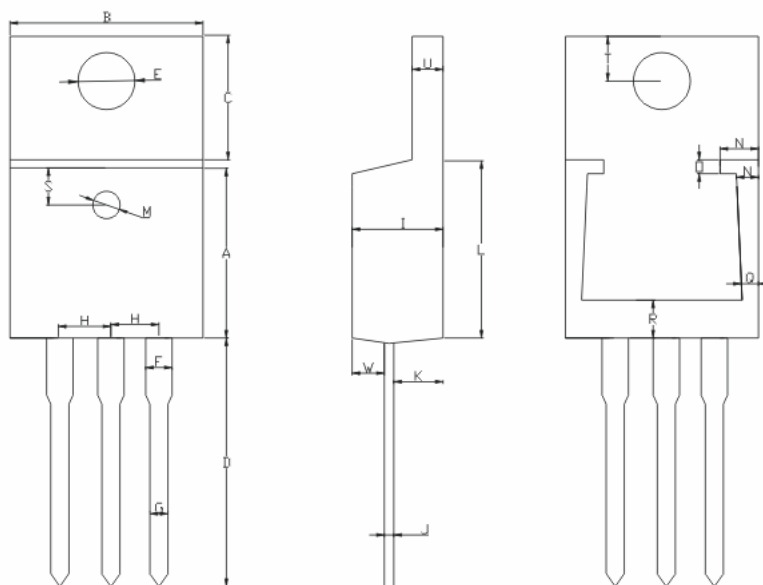


Mechanical Dimensions: In mm



| Symbol | Dimensions in millimeters | | |
|--------|---------------------------|---------|-------|
| | Min | Typical | Max |
| A | 4.42 | 4.57 | 4.72 |
| A1 | 1.17 | 1.27 | 1.37 |
| A2 | 2.59 | 2.69 | 2.89 |
| b | 0.71 | 0.81 | 0.96 |
| b1 | | 1.27 | |
| c | 0.36 | 0.38 | 0.61 |
| D | 14.94 | 15.24 | 15.54 |
| D1 | 8.85 | 9.00 | 9.15 |
| E | 10.01 | 10.16 | 10.31 |
| e | | 2.54 | |
| e1 | | 5.06 | |
| H1 | 6.04 | 6.24 | 6.44 |
| L | 12.7 | 13.56 | 13.78 |
| L1 | | 3.5 | |
| ΦP | 3.74 | 3.84 | 4.04 |
| Q | 2.54 | 2.74 | 2.94 |
| Θ1 | | 7° | |
| Θ2 | | 3° | |
| Θ3 | | 4° | |

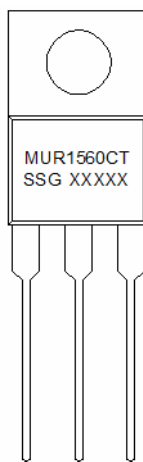
OPTION1



| | | | |
|--------------------|---------------------|--------------------|---------------------|
| A: 8.5 ± 0.5 | B: 9.5 ± 0.5 | C: 6.4 ± 0.5 | D: 14.1 ± 1 |
| E: 3.84 ± 0.03 | F: 1.27 ± 0.03 | G: 0.85 ± 0.10 | H: 2.54 ± 0.025 |
| I: 4.6 ± 0.5 | J: 0.38 ± 0.015 | K: 2.75 ± 0.25 | L: 9.0 ± 0.5 |
| M: 1.5 ± 0.05 | N: 1.8 ± 0.05 | O: 0.5 ± 0.05 | P: 1.2 ± 0.05 |
| Q: 0.9 ± 0.05 | R: 3.2 ± 0.05 | S: 1.55 ± 0.05 | T: 2.8 ± 0.15 |
| U: 1.27 ± 0.05 | W: 1.27 ± 0.03 | | |

OPTION 2 (SR)

TO-220AB

Marking Diagram:


Where XXXXX is YYWWL

| | |
|-----|--------------------------|
| MUR | = Device Type |
| 15 | = Forward Current (15A) |
| 60 | = Reverse Voltage (600V) |
| CT | = Configuration |
| SSG | = SSG |
| YY | = Year |
| WW | = Week |
| L | = Lot Number |

Cautions: Molding resin
 Epoxy resin UL:94V-0

Ordering Information:

| Device | Package | Shipping |
|-----------|-----------------------|--------------|
| MUR1560CT | TO-220AB (Pb-Free) | 50pcs / tube |

For information on tape and reel specifications, including part orientation and tape sizes, please refer to our Tape and Reel Packaging Specification.

Maximum Ratings:

| Characteristics | Symbol | Condition | Max. | Units |
|--|-------------|--|------|-------|
| Peak Inverse Voltage | V_{RWM} | - | 600 | V |
| Max. Average Forward | $I_{F(AV)}$ | 50% duty cycle @Tc=100°C, rectangular wave form | 15 | A |
| Max. Peak One Cycle Non-Repetitive Surge Current (Per leg) | I_{FSM} | 8.3ms, Half Sine pulse | 110 | A |

Electrical Characteristics:

- Weiqi Street, Airport Development Zone, Jiangning District, Nanjing, China 211113 ☎ (86) 25-87123907 •
- FAX (86) 25-87123900 • World Wide Web Site - <http://www.sangdest.com.cn> • E-Mail Address - sales@sangdest.com.cn •



| Characteristics | Symbol | Condition | Max. | Units |
|---|----------|--|------|---------------|
| Max. Forward Voltage Drop* (per leg) | V_{F1} | @ 7.5A, Pulse, $T_J = 25^\circ\text{C}$ | 2.2 | V |
| | V_{F2} | @ 7.5A, Pulse, $T_J = 125^\circ\text{C}$ | 2.0 | V |
| Max. Reverse Current* | I_{R1} | @ $V_R = \text{rated } V_R$ $T_J = 25^\circ\text{C}$ | 5.0 | μA |
| | I_{R2} | @ $V_R = \text{rated } V_R$ $T_J = 125^\circ\text{C}$ | 50 | μA |
| Max. Reverse Recovery Time | t_{rr} | $I_F=500\text{mA}$, $I_R=1\text{A}$, and $I_{rm}=250\text{mA}$ | 50 | ns |

* Pulse width < 300 μs , duty cycle < 2%

Thermal-Mechanical Specifications:

| Characteristics | Symbol | Condition | Specification | Units |
|---|-----------------|--------------|---------------|--------------------|
| Max. Junction Temperature | T_J | - | -55 to +150 | $^\circ\text{C}$ |
| Max. Storage Temperature | T_{stg} | - | -55 to +150 | $^\circ\text{C}$ |
| Maximum Thermal Resistance Junction to Case | $R_{\theta JC}$ | DC operation | 2.0 | $^\circ\text{C/W}$ |
| Approximate Weight | wt | - | 2 | g |
| Case Style | TO-220AB | | | |

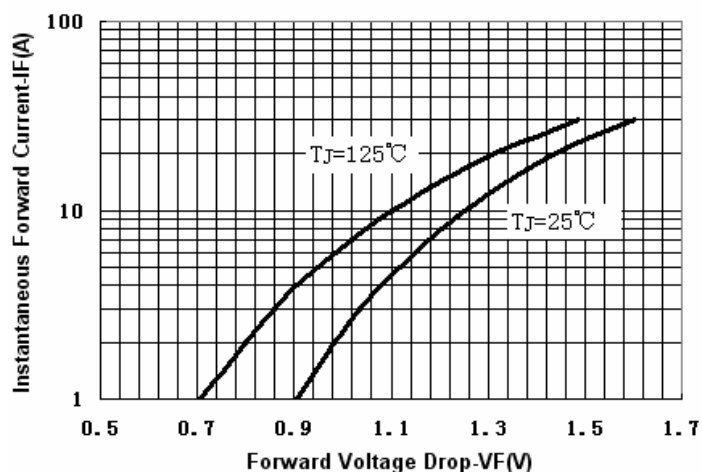


Fig.1-Typical Forward Voltage Drop Characteristics

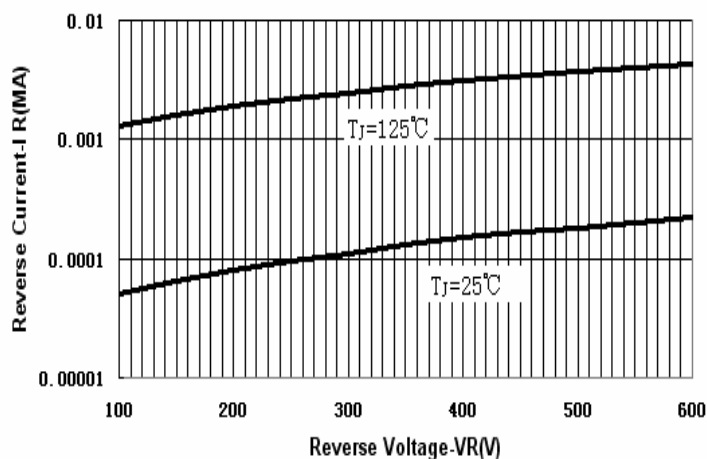


Fig.2-Typical Values of Reverse Current Vs. Reverse Voltage

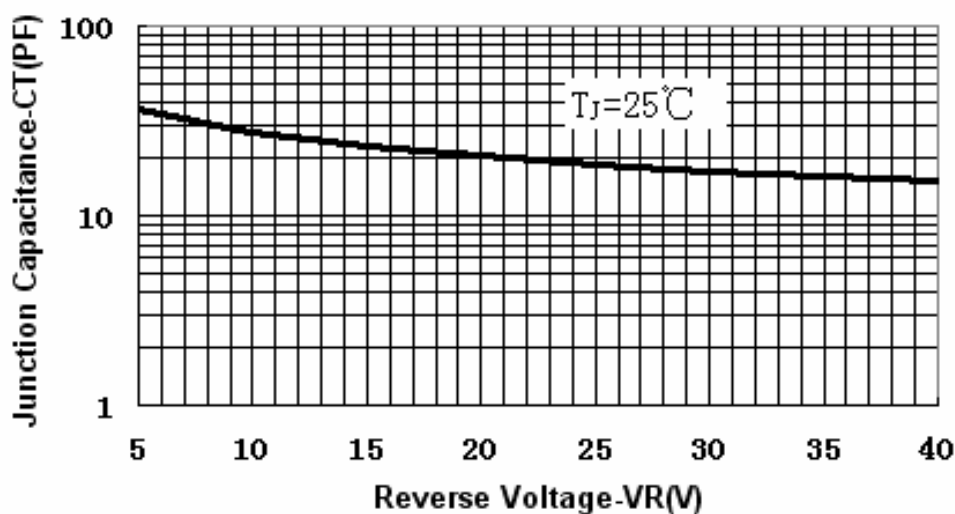


Fig.3-Typical Junction Capacitance Vs.Reverse Voltage



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