

LS4150

FAST SWITCHING SURFACE MOUNT DIODES

VOLTAGE
50 Volts
POWER
500 mWatts
QUADRO-MELF

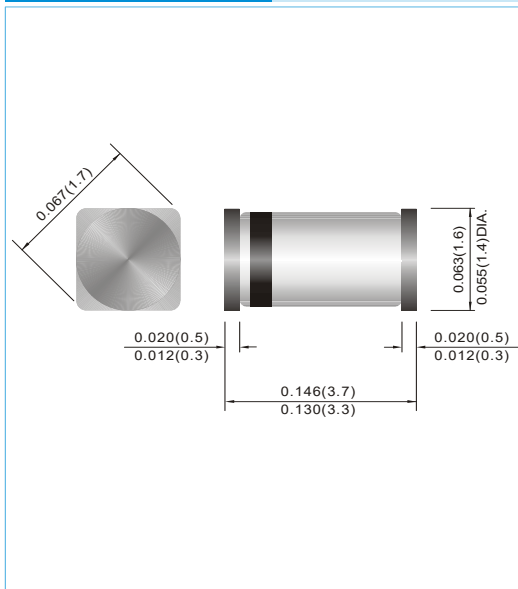
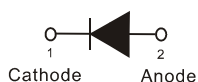
Unit : inch(mm)

FEATURES

- Fast switching Speed.
- Surface Mount Package Ideally Suited For Automatic Insertion.
- Silicon Epitaxial Planar Construction.
- Lead free in comply with EU RoHS 2002/95/EC directives

MECHANICAL DATA

- Case: QUADRO Melf, Glass
- Terminals: Solderable per MIL-STD-750, Method 2026
- Polarity: Cathode Band
- Marking: Cathode Band Only



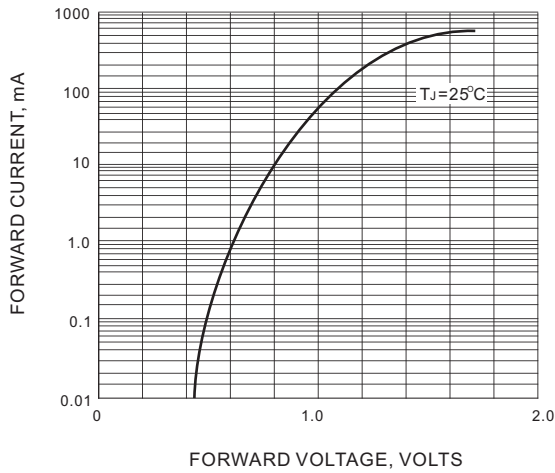
MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS (TA=25°C unless otherwise noted)

| PARAMETER | SYMBOL | LS4150 | UNITS |
|--|-----------------|-------------|-----------------------------|
| Reverse Voltage | V_R | 50 | V |
| Peak Reverse Voltage | V_{RM} | 50 | V |
| RMS Voltage | V_{RMS} | 35 | V |
| Maximum Average Forward Current at $T_A=25^\circ\text{C}$ And $f \geq 50\text{Hz}$ | $I_{F(AV)}$ | 200 | mA |
| Surge Forward Current at $t < 1\text{s}$ and $T_J=25^\circ\text{C}$ | I_{FSM} | 500 | mA |
| Power Dissipation at $T_{amb}= 25^\circ\text{C}$ | P_{TOT} | 500 | mW |
| Maximum Forward Voltage at $I_F=200\text{mA}$ | V_F | 1.0 | V |
| Maximum Leakage Current at $V_R= 50\text{V}$ | I_R | 0.1 | μA |
| Maximum Capacitance (Note 1) | C_J | 4 | pF |
| Maximum Reverse Recovery Time (Note 2) | t_{rr} | 4 | ns |
| Typical Thermal Resistance | $R_{\theta JA}$ | 350 | $^\circ\text{C} / \text{W}$ |
| Junction Temperature and Storage Temperature Range | T_J, T_S | -65 to +175 | $^\circ\text{C}$ |

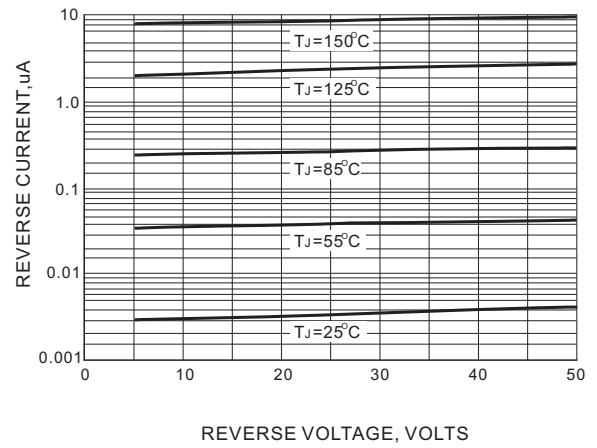
NOTE:

1. C_J at $V_R=0$, $f=1\text{MHZ}$
2. From $I_F=10\text{mA}$ to $I_R=1\text{mA}$, $V_R=6\text{Volts}$, $R_L=100\Omega$

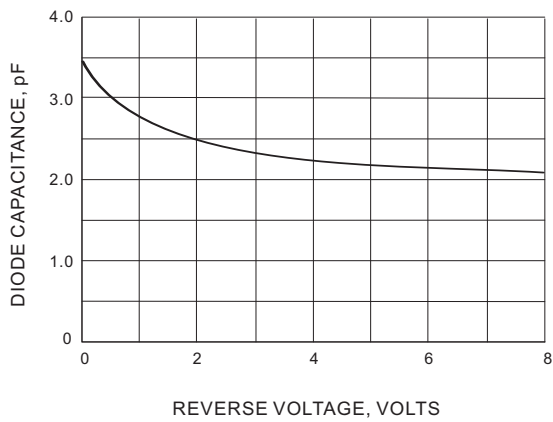
LS4150



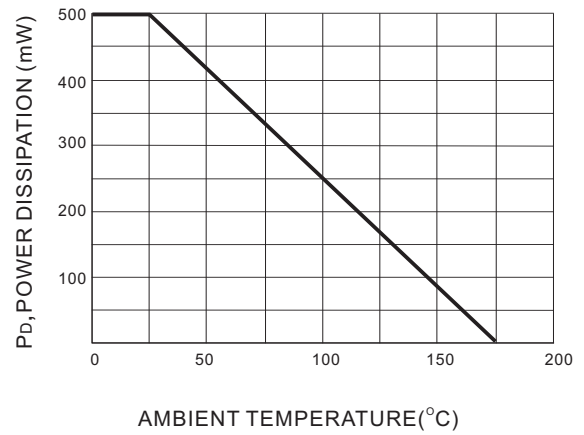
FORWARD VOLTAGE



LEAKAGE CURRENT



TYPICAL CAPATICANCE



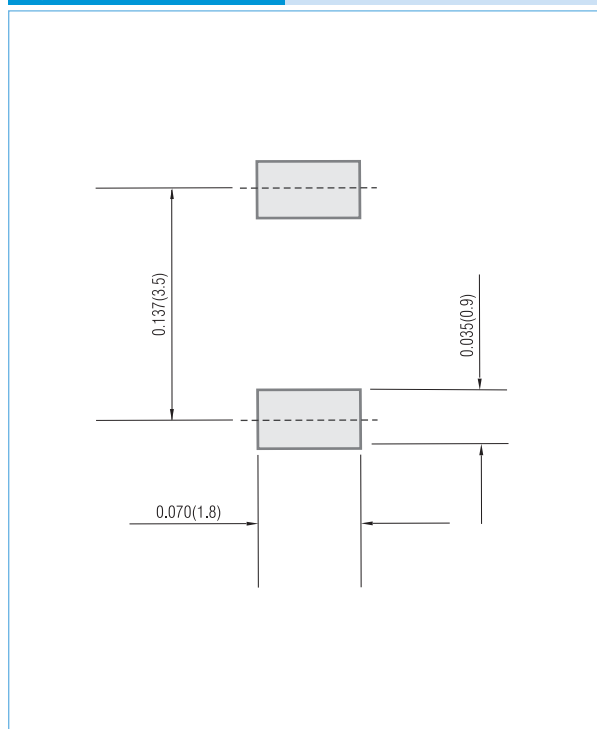
POWER DERATING

LS4150

MOUNTING PAD LAYOUT

QUADRO-MELF

Unit: inch (mm)



ORDER INFORMATION

- Packing information

T/R - 10K per 13" plastic Reel

T/R - 2.5K per 7" plastic Reel

LS4150

Part No_packing code_Version

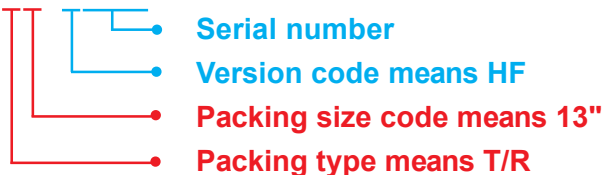
LS4150_R1_10001

LS4150_R2_10001

For example :

RB500V-40_R2_00001

Part No.



| Packing Code XX | | | | Version Code XXXXX | | |
|--------------------------------------|----------------------|----------------------------------|----------------------|---------------------------|----------------------|---------------------------------------|
| Packing type | 1 st Code | Packing size code | 2 nd Code | HF or RoHS | 1 st Code | 2 nd ~5 th Code |
| Tape and Ammunition Box (T/B) | A | N/A | 0 | HF | 0 | serial number |
| Tape and Reel (T/R) | R | 7" | 1 | RoHS | 1 | serial number |
| Bulk Packing (B/P) | B | 13" | 2 | | | |
| Tube Packing (T/P) | T | 26mm | X | | | |
| Tape and Reel (Right Oriented) (TRR) | S | 52mm | Y | | | |
| Tape and Reel (Left Oriented) (TRL) | L | PANASERT T/B CATHODE UP (PBCU) | U | | | |
| FORMING | F | PANASERT T/B CATHODE DOWN (PBCD) | D | | | |

LS4150

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