

勝特力材料 886-3-5753170  
 勝特力电子(上海) 86-21-54151736  
 勝特力电子(深圳) 86-755-83298787  
[Http://www.100y.com.tw](http://www.100y.com.tw)

## TO-247AD/TO-3P

## FEATURES:

- Plastic package Underwriters Laboratory Flammability Classification 94V-0
- Dual rectifier construction, positive centertap
- Metal silicon junction Majority carrier conduction
- Low power loss, high efficiency
- High current capability, low forward voltage drop
- High temperature soldering guaranteed:  
250°C/10 seconds, 0.25"(6.35mm) from case

## MECHANICAL DATA

Case : JEDEC TO-3P molded plastic

Terminals : Leads solderable per MIL-STD-750

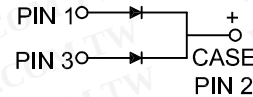
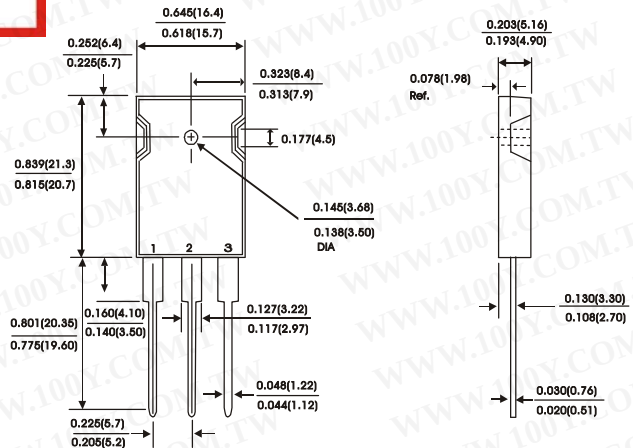
Method 2026

Polarity : As marked

Mounting Position : Any

Mounting Torque 10 in - lbs. max

Weight : 0.20 ounce, 5.6 grams



Dimensions in inches and (millimeters)

## MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25° C ambient temperature unless otherwise specified.

Single phase half wave, 60 Hz resistive or inductive load.

For capacitive load, derate current by 20%.

| Characteristic                                                                                                                            | Symbol      | SRL4020PT  | SRL4030PT | SRL4040PT | Units              |
|-------------------------------------------------------------------------------------------------------------------------------------------|-------------|------------|-----------|-----------|--------------------|
| Maximum recurrent peak reverse voltage                                                                                                    | $V_{RRM}$   | 20         | 30        | 40        | Volts              |
| Maximum RMS voltage                                                                                                                       | $V_{RMS}$   | 14         | 21        | 28        | Volts              |
| Maximum DC blocking voltage                                                                                                               | $V_{DC}$    | 20         | 30        | 40        | Volts              |
| Maximum average forward rectified current at $T_C = 105^\circ\text{C}$                                                                    | $I_O$       | 40         |           |           | Amps               |
| Peak forward surge current 8.3ms single half sine-wave superimposed on rated load (JEDEC Method)(Per leg)                                 | $I_{FSM}$   | 400        |           |           | Amps               |
| Maximum instantaneous forward voltage (Per leg)(NOTE 2) $I_F = 20A$                                                                       | $V_F$       | 0.58       |           |           | Volts              |
| Maximum instantaneous reverse current at rated DC blocking voltage(Per leg)(NOTE 2) $T_C = 25^\circ\text{C}$<br>$T_C = 100^\circ\text{C}$ | $I_R$       | 10<br>100  |           |           | mA                 |
| Typical thermal resistance(Per leg)(NOTE 1)                                                                                               | $R_{th-JC}$ | 1.2        |           |           | $^\circ\text{C/W}$ |
| Operating temperature range                                                                                                               | $T_J$       | -40to +125 |           |           | $^\circ\text{C}$   |
| Storage temperature range                                                                                                                 | $T_{Stg}$   | -40to +125 |           |           | $^\circ\text{C}$   |

NOTES:

(1) Thermal resistance from junction to case

(2) Pulse test : 300 us pulse width, 1% duty cycle

FIG.1 - TYPICAL FORWARD CURRENT DERATING CURVE

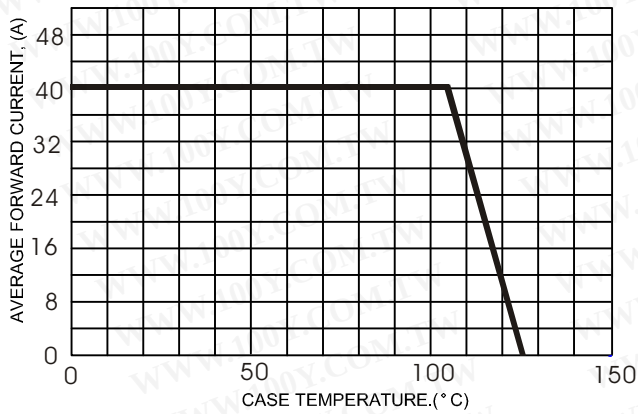


FIG.2 - TYPICAL FORWARD CHARACTERISTICS

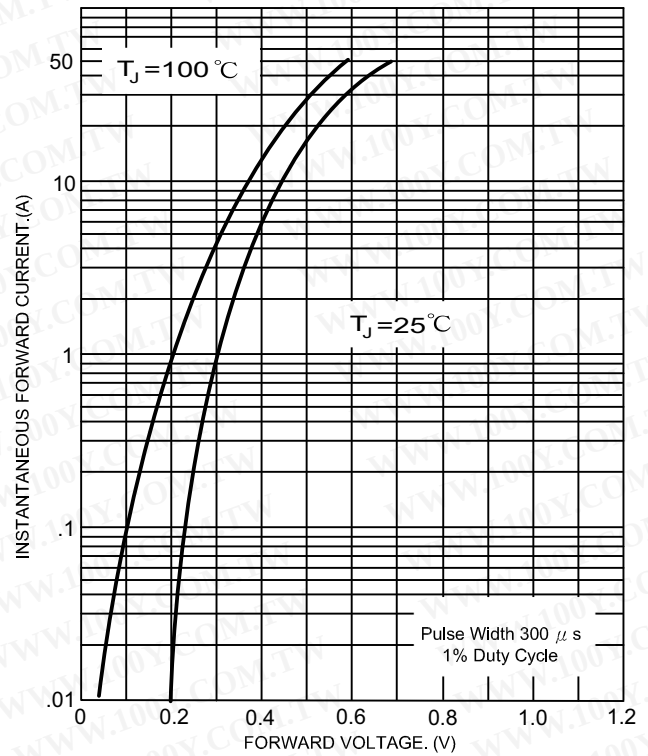


FIG.3 - MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

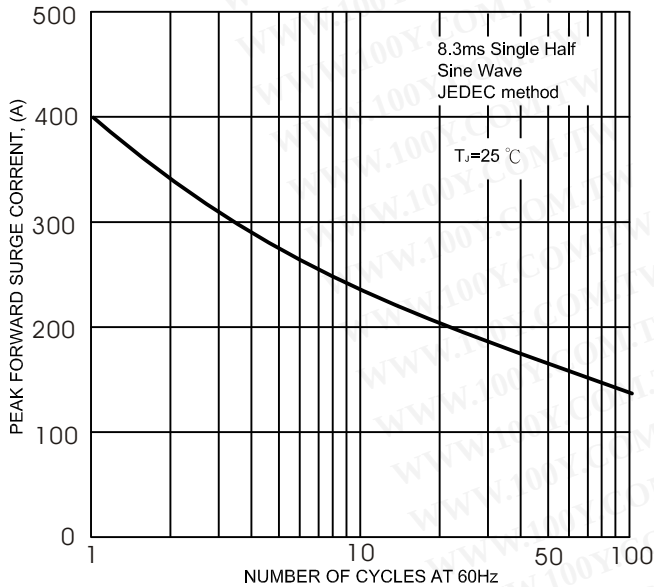


FIG.4- TYPICAL JUNCTION CAPACITANCE

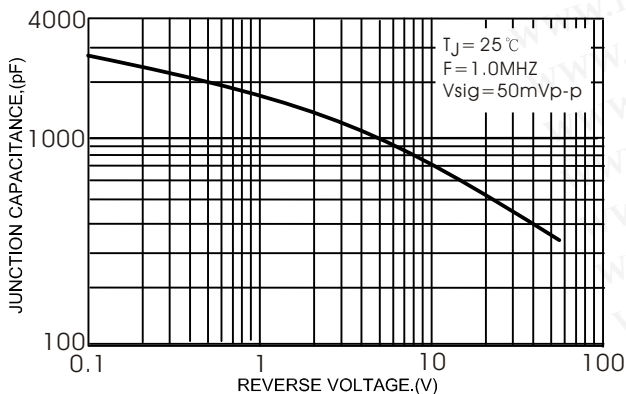
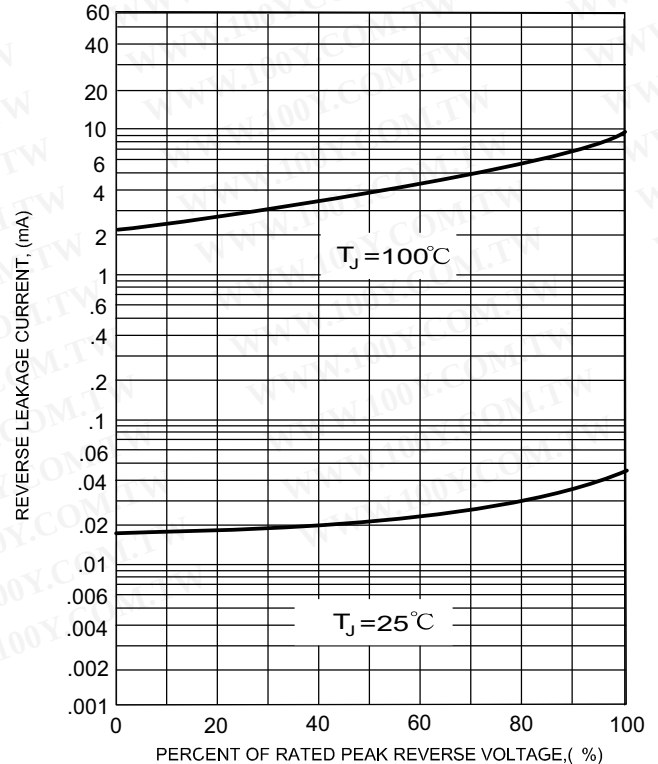


FIG.5- TYPICAL REVERSE CHARACTERISTICS



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