

RoHS Compliant Product

A suffix of "-C" specifies halogen & lead-free

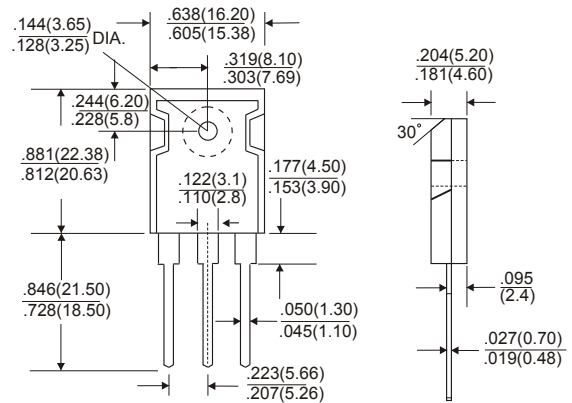
FEATURES

- Low forward voltage drop
- High current capability
- High reliability
- High surge current capability
- Epitaxial construction

MECHANICAL DATA

- Case: Molded plastic
- Epoxy: UL 94V-0 rate flame retardant
- Lead: Lead solderable per MIL-S TD-202, method 208 guaranteed
- Polarity: As Marked
- Mounting position: Any
- Weight: 5.60 grams

TO-247 (TO-3P)



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating 25 °C ambient temperature unless otherwise specified.
Single phase half wave, 60Hz, resistive or inductive load.
For capacitive load, derate current by 20%.

TYPE NUMBER	SR40150	UNITS
Maximum Recurrent Peak Reverse Voltage	150	V
Working Peak Reverse Voltage	150	V
Maximum DC Blocking Voltage	150	V
Maximum Average Forward Rectified Current, See Fig. 1	40.0	A
Peak Forward Surge Current, 8.3 mS single half Sine-wave superimposed on rated load (JEDEC method)	350	A
Maximum Instantaneous Forward Voltage at 20.0A	0.85	V
Maximum DC Reverse Current Ta=25 °C	0.03	mA
At Rated DC Blocking Voltage Ta=125	4.5	mA
Typical Junction Capacitance (Note 1)	900	pF
Typical Thermal Resistance RθJC (Note 2)	3.0	°C / W
Operating Temperature Range T _J	-50 ~ +150	°C
Storage Temperature Range T _{STG}	-65 ~ +175	°C

NOTES:

1. Measured at 1MHz and applied reverse voltage of 5.0V D.C.
2. Thermal Resistance Junction to Ambient Vertical PC Board Mounting 0.5"(12.7mm) Lead Length.

● RATING AND CHARACTERISTIC CURVES (SR40150)

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

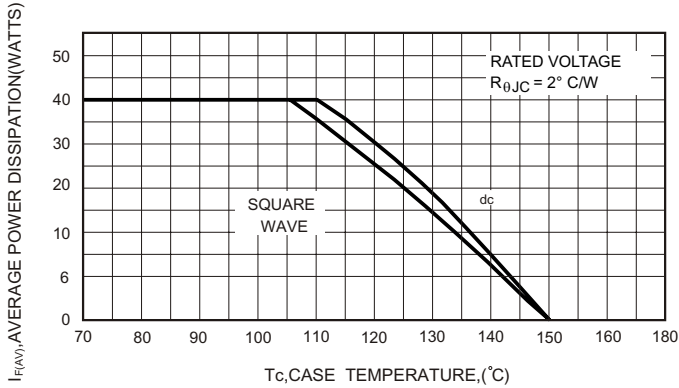


FIG.2- TYPICAL FORWARD VOLTAGE (PER LEG)

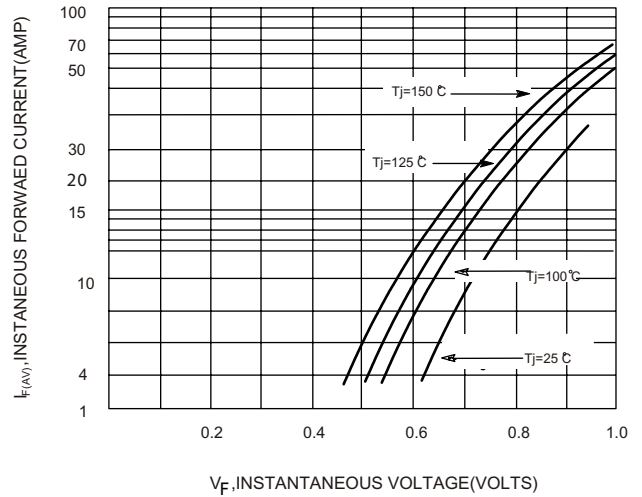


FIG.3-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

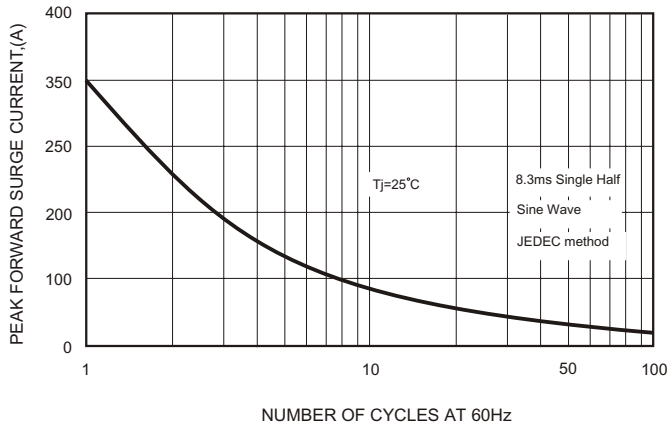


FIG.5-TYPICAL REVERSE CURRENT (PER LEG)

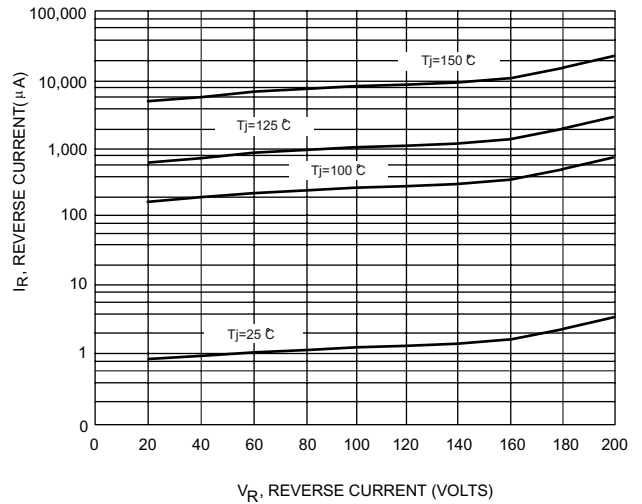


FIG.4-TYPICAL JUNCTION CAPACITANCE

