DACO SEMICONDUCTOR CO., LTD.

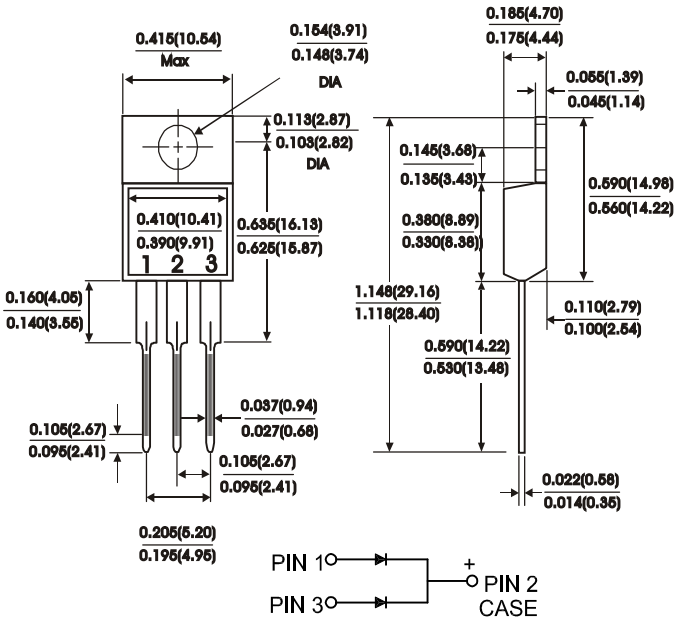
SR15100CT

SCHOTTKY BARRIER RECTIFIER

FEATURES:

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

TO-220 **AB**



Dimensions in inches and (millimeters)

MECHANICAL DATA

Case : JEDEC TO-220AB molded plastic
Teminals : Leads solderable per MIL-STD-750 Method 2026
Polarity : As marked
Mounting Position : Any
Mounting Torque 5 in - lbs.max
Weight : 0.08 ounce, 2.24 grams

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

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

Characteristic	Symbol	SR15100CT	Units
Maximum recurrent peak reverse voltage	V_{RRM}	100	Volts
Maximum RMS voltage	V_{RMS}	70	Volts
Maximum DC blocking voltage	V_{DC}	100	Volts
Maximum average forward rectified current at Tc=90℃(Per Pak)	$I_{(AV)}$	15	Amps
Peak forward surge current 8.3ms single half sine-wave superimposed on rated load (JEDEC Method)(Per leg)	I_{FSM}	100	Amps
Maximum instantaneous forward voltage (Per leg)(NOTE 2) IF=7.5A	V_F	0.81	Volts
Maximum instantaneous reverse current at rated DC blocking voltage(Per leg)(NOTE 2) Tc=25℃ Tc=125℃	I_R	0.5 50.0	mA
Typical thermal resistance(Per leg)(NOTE 1)	R_{th}-JC	5.0	℃/W
Operating temperature range	T_J	-65 to+150	℃
Storage temperature range	T_{Stg}	-65 to+150	℃

NOTES:
(1)Thermal resistance from junction to case
(2)Pulse test : 300 us pulse width, 1% duty cycle
(3)Marking : SR15100CT (Symbol) = SR15100 (Marking) (Without Marking "CT")

RATINGS AND CHARACTERISTIC CURVES

FIG.1 - TYPICAL FORWARD CORRENT DERATING CURVE

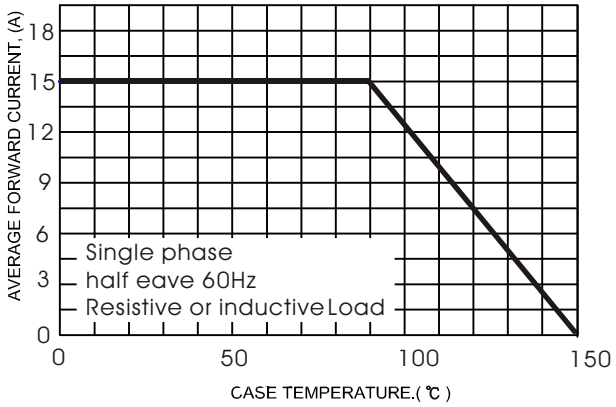


FIG.2 - TYPICAL FORWARD CHARACTERISTICS

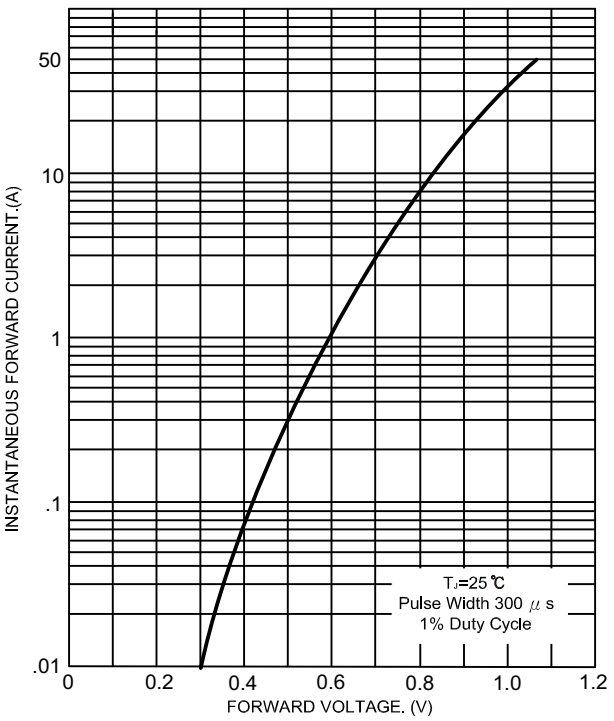


FIG.3 - MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

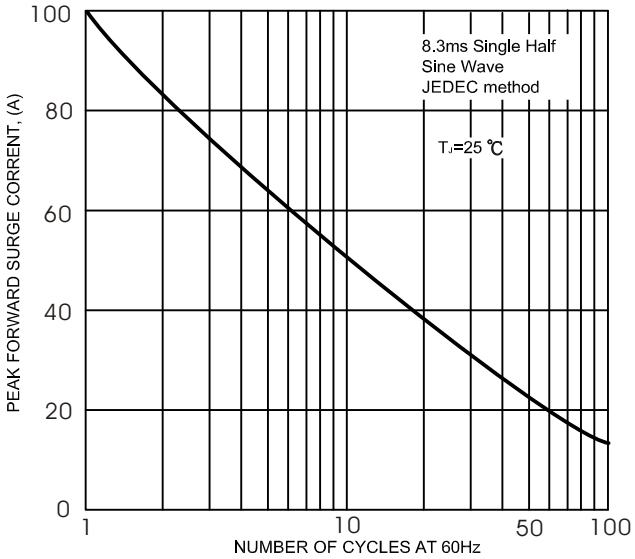


FIG.4- TYPICAL JUNCTION CAPACITANCE

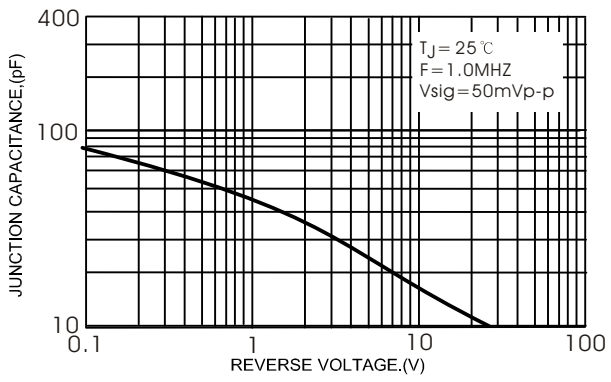
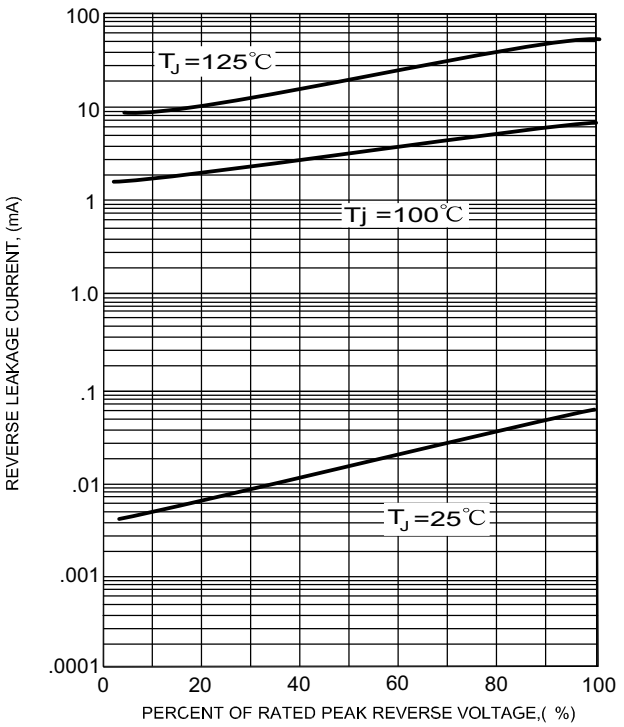


FIG.5- TYPICAL REVERSE CHARACTERISTICS



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