

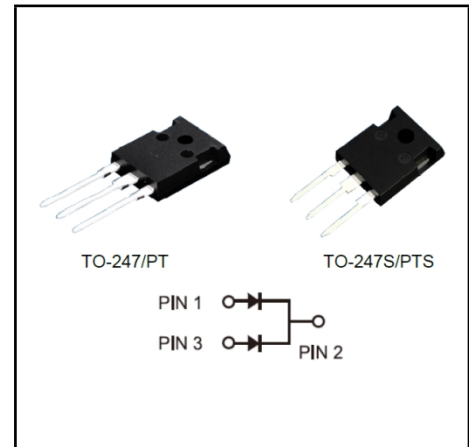
SCHOTTKY BARRIER RECTIFIER
Reverse Voltage - 100 V
Forward Current – 40 A
FEATURES

- ◆Low forward voltage
- ◆High current capability
- ◆High forward surge capability
- ◆Low power losses · High efficiency
- ◆Guarding for over voltage protection
- ◆Lead free in comply with EU RoHS 2011/65/EU directives

MECHANICAL DATA

◆Case: TO-247/PT TO-247/PTS

◆Solder bath temperature 275°C maximum, 10s per JESD22-106


Primary Characteristic

I_o	2*20A
V_{RRM}	100V
I_{FSM}	250A
V_F	0.66V
T_J Max	150°C

Maximum Ratings (Per Leg) at Ta=25°C unless otherwise specified

Parameter		Symbols	Value	Units
Maximum Repetitive Peak Reverse Voltage		V_{RRM}	100	V
Maximum RMS voltage		V_{RMS}	70	V
Maximum DC Blocking Voltage		V_{DC}	100	V
Maximum Average Forward Rectified Current	Per Leg	I_o	20	A
	Total		40	
Peak Forward Surge Current, 8.3ms Single Half Sine-wave		I_{FSM}	250	A
Operating Temperature Range		T_J	-50 ~ +150	°C
Storage Temperature Range		T_{STG}	-50 ~ +150	°C
Typical Thermal Resistance (Note1)		R_{θJA}/ R_{θJC}	2	°C/W

Note1: Thermal resistance from Junction to case per leg mounted on heatsink.
Electrical Characteristics (Per Leg) unless otherwise specified

Characteristics		Symbols	Value		Units
Forward Voltage Drop(Note2)		V_F	Typ	Max	V
at I _F =5A	TA=25°C		0.48	-	
	TA=125°C		0.42	-	
at I _F =10A	TA=25°C		0.57	0.60	
	TA=125°C		0.54	-	
at I _F =20A	TA=25°C		0.71	0.75	
	TA=125°C		0.66	-	
Maximum Reverse Current at V _R =100V	TA=25°C	I_R	15	60	uA
	TA=125°C		9	-	mA

Note2: Pulse test: 300 μs pulse width, 1 % duty cycle

RATINGS AND CHARACTERISTIC CURVES

FIG. 1 MAXIMUM FORWARD CURRENT DERATING CURVE

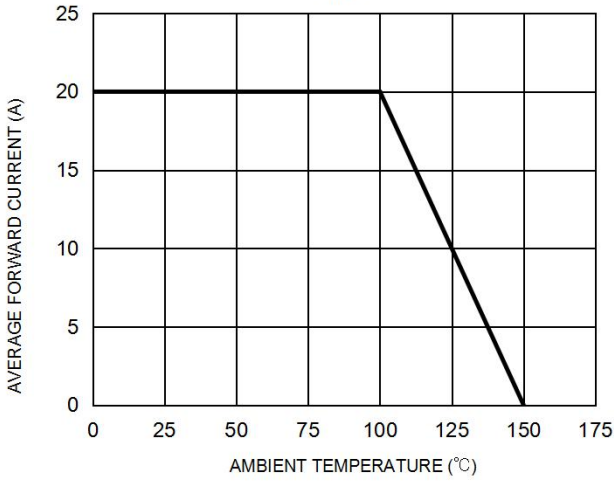


FIG. 2 MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT PER LEG

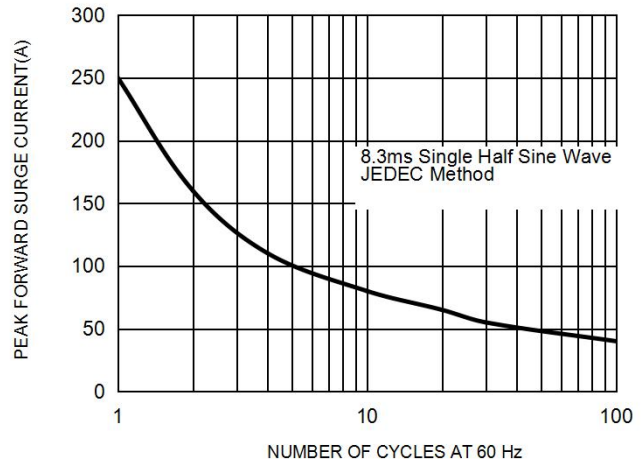


FIG. 3 TYPICAL FORWARD CHARACTERISTICS PER LEG

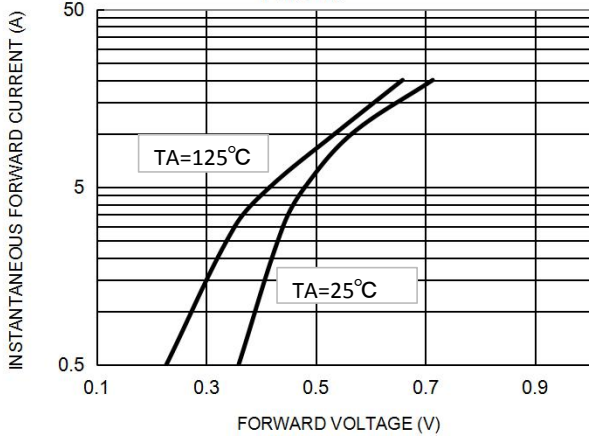
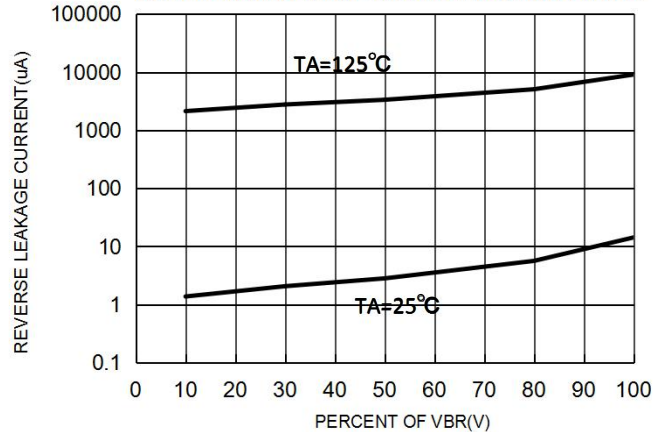
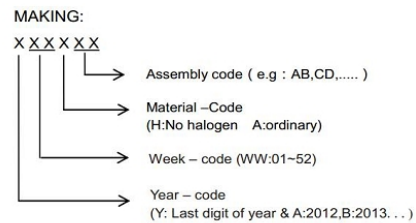
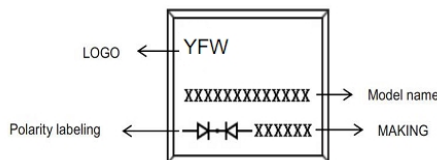


FIG. 4 TYPICAL REVERSE CHARACTERISTICS PER LEG



Marking on the body

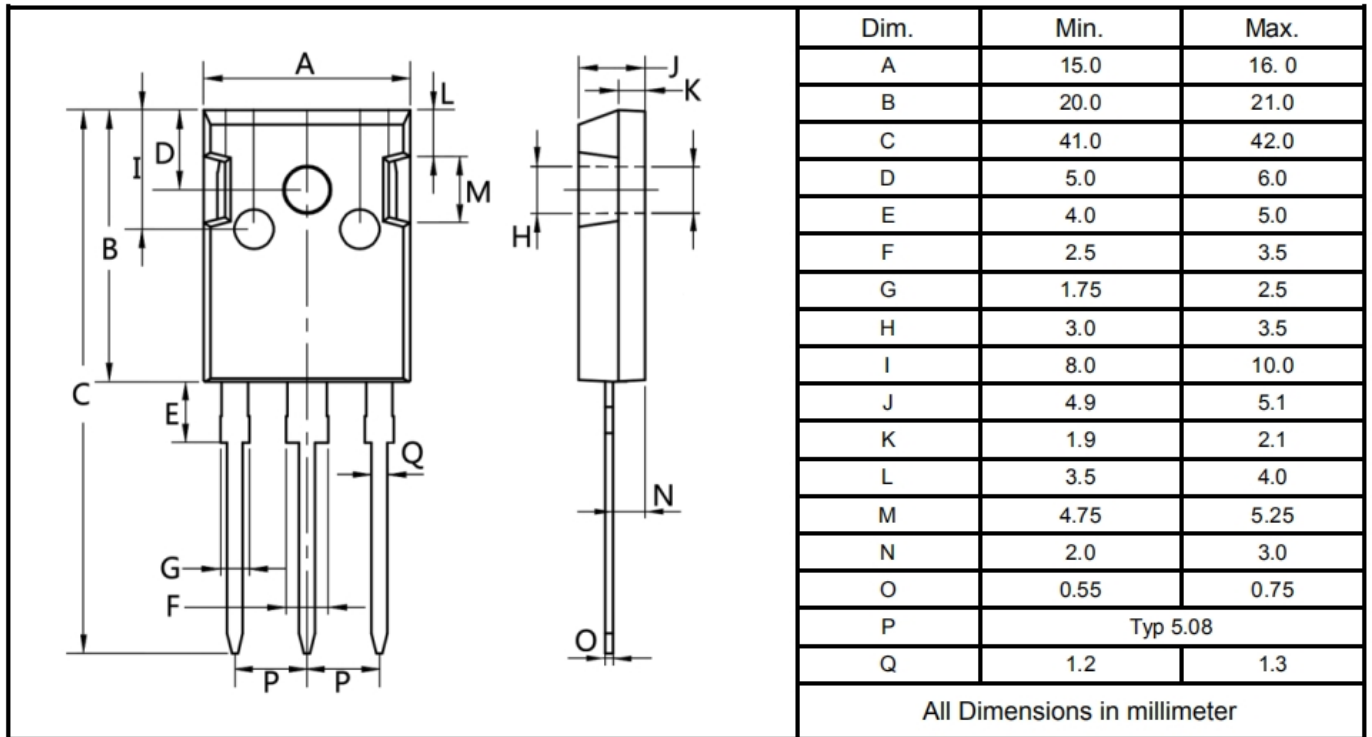


Ordering information

Part Number	Package	Unit Weight	Base Quantity	Delivery mode
SRT40L100PT	TO-247	0.209oz(5.93g)	30 pcs / tube	600pcs/box 2400pcs/carton
SRT40L100PTS	TO-247S	0.158oz(4.48g)	30 pcs / tube	600pcs/box 2400pcs/carton

Note: For Halogen Free molding compound, add "H" suffix to part number above.

TO-247



TO-247S

