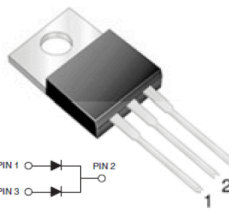
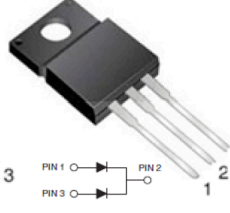

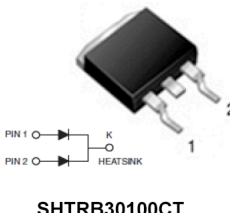
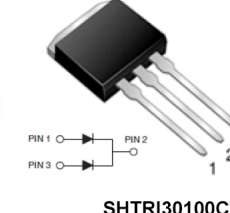


SCHOTTKY BARRIER RECTIFIERS	REVERSE VOLTAGE	100	Volts
	FORWARD CURRENT	30	Amperes
<p><b>FEATURES</b></p> <ul style="list-style-type: none"> <li>●Metal of silicon rectifier , majority carrier conduction</li> <li>●Trench Schottky Technology</li> <li>●Low power loss, high efficiency</li> <li>●High current capability, low VF</li> <li>●High surge capacity</li> <li>●Plastic package has <b>UL</b> flammability classification 94V-0</li> <li>●For use in low voltage,high frequency inverters,free wheeling,<b>switching power supplies, DC-DC converter</b>,and polarity protection applications</li> </ul> <p><b>MECHANICAL DATA</b></p> <ul style="list-style-type: none"> <li>●Case: TO-220AB / ITO-220AB / TO-262AA / TO-263AB</li> <li>●Polarity: As marked on the body</li> <li>●Weight: 0.08ounces,2.24 grams</li> <li>●Mounting position :Any</li> </ul>	<p><b>TO-220AB</b></p>  <p>SHTR30100CT</p>	<p><b>ITO-220AB</b></p>  <p>SHTRF30100CT</p>	
	<p><b>TO-263AB</b></p>  <p>SHTRB30100CT</p>	<p><b>TO-262AA</b></p>  <p>SHTRI30100CT</p>	

**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

Rating at 25°C ambient temperature unless otherwise specified.

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

For capacitive load, derate current by 20%

**MAXIMUM RATINGS (T<sub>A</sub> = 25 °C unless otherwise noted)**

CHARACTERISTICS	SYMBOL	SHTR30100CT, SHTRF30100CT, SHTRI30100CT, SHTRB30100CT	UNIT
Maximum Recurrent Peak Reverse Voltage	V <sub>RRM</sub>	100	V
Maximum RMS Voltage	V <sub>RMS</sub>	70	V
Maximum DC Blocking Voltage	V <sub>DC</sub>	100	V
Maximum Average Forward Rectified Current ( See Fig.1)	I <sub>(AV)</sub>	30	A
Maximum Average Forward Rectified Current ( Per Leg )		15	
Peak Forward Surge Current 8.3ms Single Half Sine-Wave Super Imposed on Rated Load	I <sub>FSM</sub>	150	A
Peak repetitive reverse current at tp = 2 μs, 1 kHz	I <sub>RRM</sub>	1	A
Operating Temperature Range	T <sub>J</sub>	-55 to +150	°C
Storage Temperature Range	T <sub>STG</sub>	-55 to +175	°C

**ELECTRICAL CHARACTERISTICS (T<sub>A</sub> = 25 °C unless otherwise noted)**

PARAMETER / CONDITIONS	SYMBOL	Typ		Max	UNIT
		SHTR30100CT	SHTRF30100CT		
Breakdown voltage per diode	V <sub>BR</sub>	110 (minimun)		-	V
Instantaneous forward voltage per diode (Note1) IF=7.5A @TJ=25°C IF=7.5A @TJ=125°C IF=15A @TJ=25°C IF=15A @TJ=125°C	V <sub>F</sub>	0.61		0.66	V
		0.57		0.61	
		0.79		0.90	
		0.71		0.77	
Maximum DC Reverse Current @TJ=25°C at Rated DC Bolcking Voltage @TJ=125°C	I <sub>R</sub>	135			μA
		36			mA
Typical Junction Capacitance (Note2)	C <sub>J</sub>	460			pF

**THERMAL CHARACTERISTICS (T<sub>A</sub> = 25 °C unless otherwise noted)**

PARAMETER	SYMBOL	Typ				UNIT
		SHTR30100CT	SHTRF30100CT	SHTRI30100CT	SHTRB30100CT	
Thermal Resistance Per Diode (Note3)	R <sub>θJC</sub>	3.0	5.5	3.5	3.5	°C/W

NOTES:1.300us pulse width,2% duty cycle.

2.Measured at 1.0 MHz and applied reverse voltage of 5.0V DC.

3. Thermal resistance junction to case.

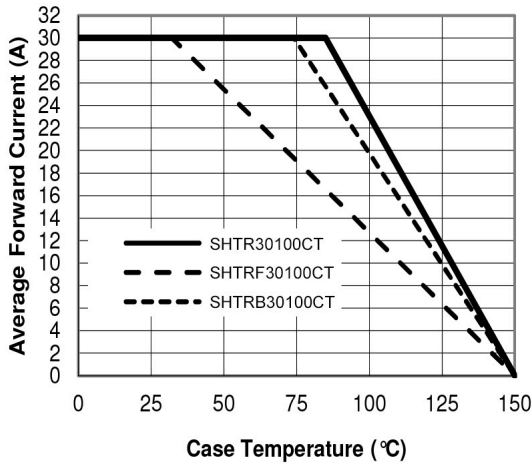


Figure 1. Forward Current Derating Curve

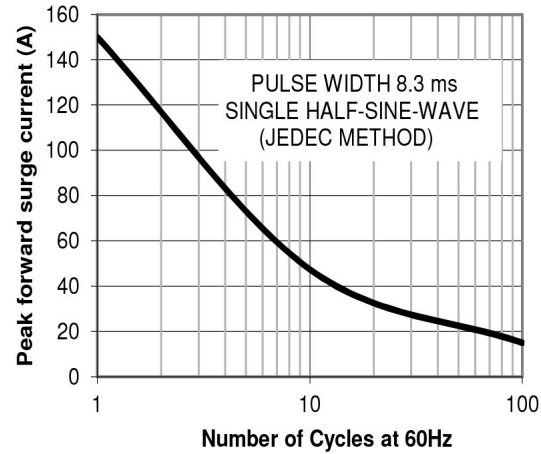


Figure 2. Maximum NON-Repetitive

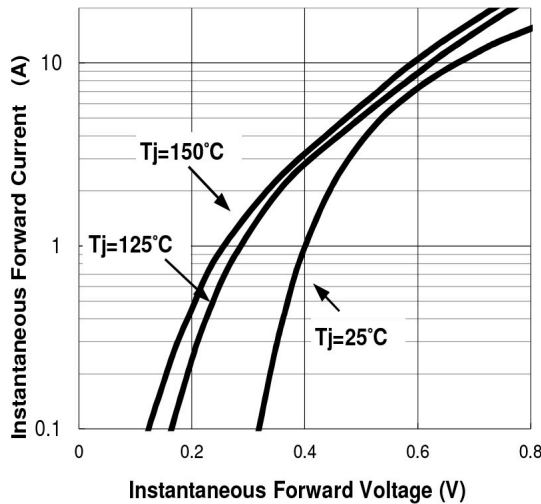


Figure 3. Typical Instantaneous Forward Characteristics Per Leg

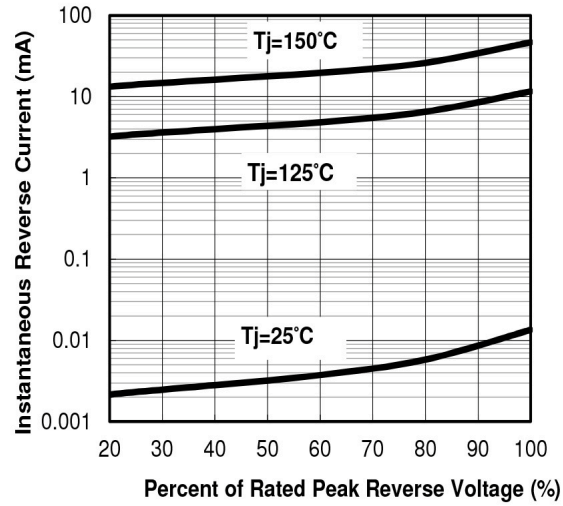


Figure 4. Typical Reverse Characteristics

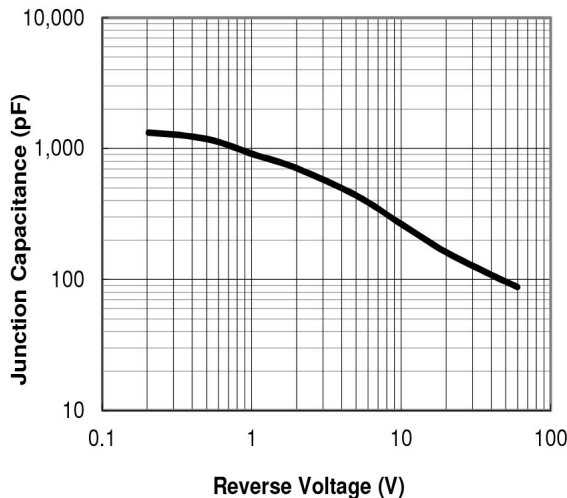


Figure 5. Typical Junction Capacitance

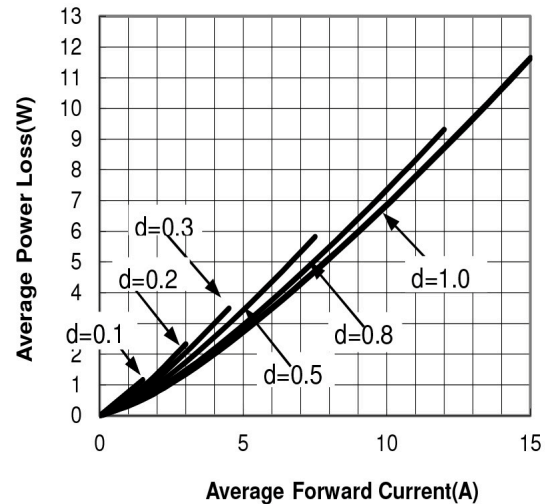
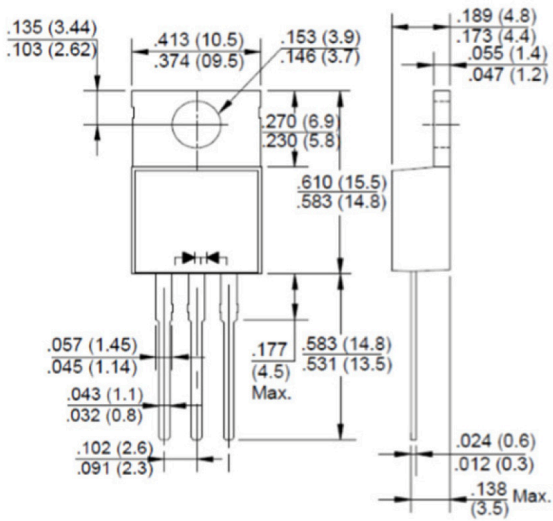
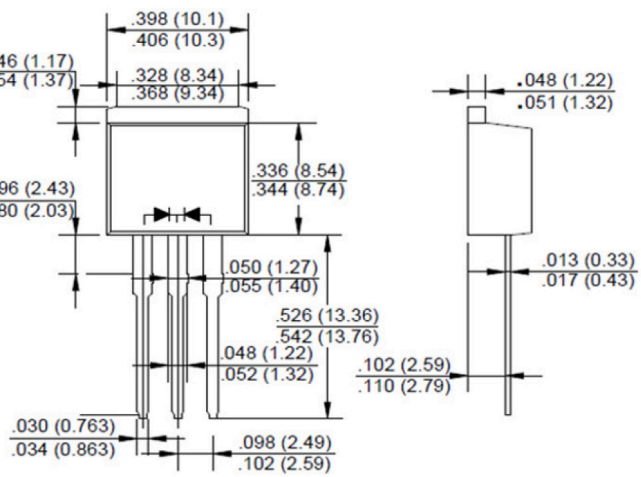


Figure 6. Forward Power Loss Characteristics

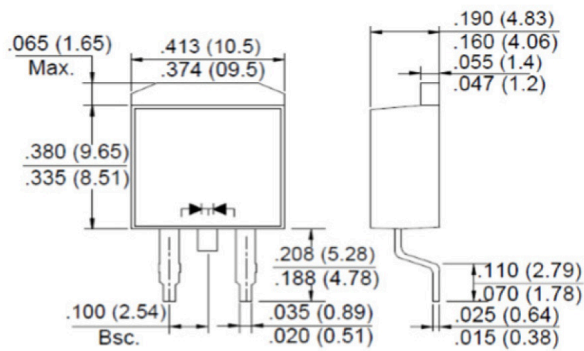
TO-220AB



TO-262AA



TO-263AB



ITO-220AB

