

TECHNICAL DATA  
DATA SHEET 649, REV. A

**HERMETIC POWER SCHOTTKY RECTIFIER**  
**200°C Maximum Operation Temperature**

**DESCRIPTION:** 150 VOLT, 30 AMP, POWER SCHOTTKY RECTIFIERS IN A HERMETIC SHD-2 / 2A / 2B PACKAGE.

**MAXIMUM RATINGS**

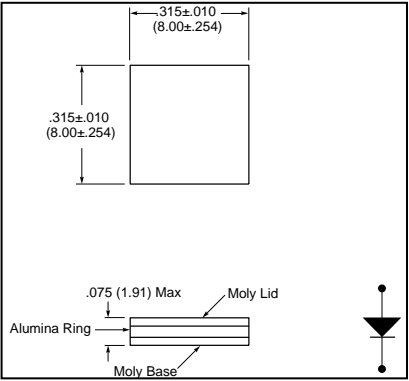
ALL RATINGS ARE @  $T_C = 25^\circ\text{C}$  UNLESS OTHERWISE SPECIFIED.

RATING	SYMBOL	MAX.	UNITS
PEAK INVERSE VOLTAGE	PIV	150	Volts
MAXIMUM DC OUTPUT CURRENT (With Cathode Maintained @ $T_C=100^\circ\text{C}$ )	$I_O$	30	Amps
MAXIMUM NONREPETITIVE FORWARD SURGE CURRENT ( $t=10\text{ms}$ , Sine)	$I_{FSM}$	570	Amps
MAXIMUM JUNCTION CAPACITANCE ( $V_r=5\text{V}$ )	$C_T$	1000	pF
MAXIMUM THERMAL RESISTANCE (Junction to Mounting Surface, Cathode)	$R_{\theta JC}$	0.9	$^\circ\text{C/W}$
MAXIMUM STORAGE TEMPERATURE RANGE	$T_{stg}$	-65 to +175	$^\circ\text{C}$
MAXIMUM OPERATING TEMPERATURE RANGE	$T_{op}/T_{stg}$	-65 to +200	$^\circ\text{C}$

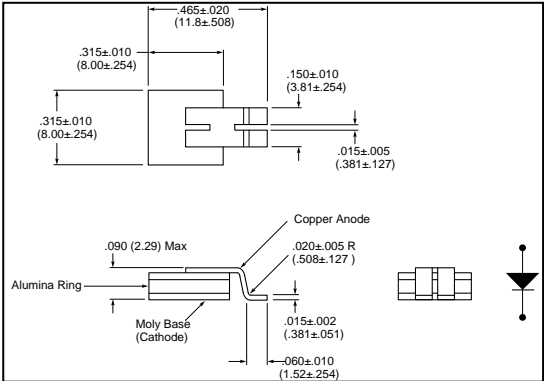
**ELECTRICAL CHARACTERISTICS**

CHARACTERISTIC	SYMBOL	MAX.	UNITS
MAXIMUM FORWARD VOLTAGE DROP, Pulsed (per leg, $I_f = 30$ Amps) $T_J = 25^\circ\text{C}$ $T_J = 125^\circ\text{C}$	$V_f$	0.84 0.68	Volts
MAXIMUM REVERSE CURRENT (per leg, $I_r$ @ 150 V PIV) $T_J = 25^\circ\text{C}$ $T_J = 125^\circ\text{C}$	$I_r$	1.0 15	mA

MECHANICAL DIMENSIONS: In Inches / mm

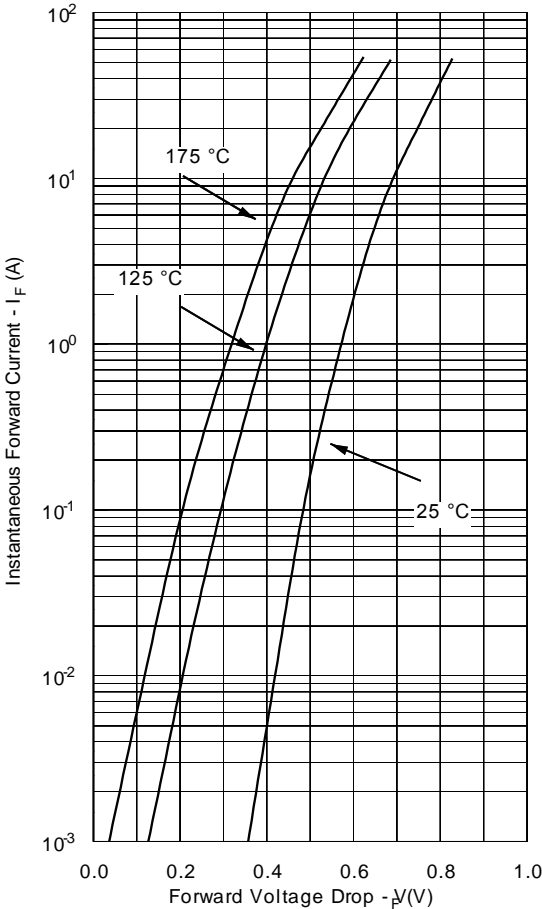


**SHD-2**

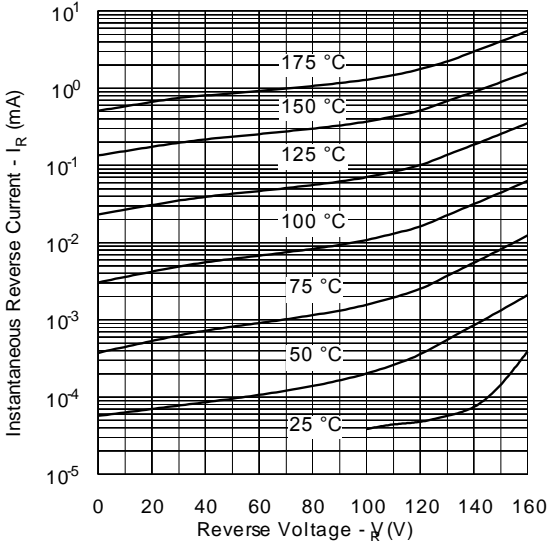


**SHD-2B**

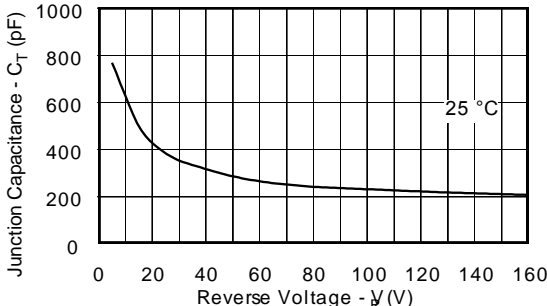
Typical Forward Characteristics



Typical Reverse Characteristics



Typical Junction Capacitance



**SENSITRON**  
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