

TECHNICAL DATA  
DATA SHEET 4133, REV. A

## HERMETIC POWER SCHOTTKY RECTIFIER

### Very Low Forward Voltage Drop

**DESCRIPTION:** A SINGLE / DUAL 45 VOLT, 15 AMP, POWER SCHOTTKY RECTIFIER IN HERMETIC SMD-1 PACKAGE.

**MAXIMUM RATINGS**

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

RATING	SYMBOL	MAX.	UNITS
PEAK INVERSE VOLTAGE PER LEG	PIV	45	Volts
MAXIMUM DC OUTPUT CURRENT PER LEG (@ $T_c=100^\circ\text{C}$ )	$I_o$	15	Amps
MAXIMUM NONREPETITIVE FORWARD SURGE CURRENT PER LEG ( $t = 8.3\text{ms}$ , Sine)	$I_{FSM}$	200	Amps
MAXIMUM JUNCTION CAPACITANCE PER LEG ( $V_r = 5\text{V}$ , $T_J = 25^\circ\text{C}$ , $f_{SIG} = 1\text{MHz}$ , $V_{SIG} = 50\text{mV P-P}$ )	$C_T$	800	pF
MAXIMUM THERMAL RESISTANCE PER LEG (Junction to Case)	$R_{\theta JC}$	1.21	$^\circ\text{C/W}$
MAXIMUM OPERATING AND STORAGE TEMPERATURE RANGE	Top/Tstg	-65 to + 150	$^\circ\text{C}$

**ELECTRICAL CHARACTERISTICS**

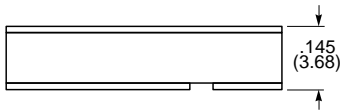
CHARACTERISTIC	SYMBOL	MAX.	UNITS
MAXIMUM FORWARD VOLTAGE DROP, Pulsed ( $I_f = 15\text{ Amps}$ ) PER LEG $T_J = 25^\circ\text{C}$ $T_J = 125^\circ\text{C}$	$V_f$	0.65 0.60	Volts
MAXIMUM REVERSE CURRENT ( $I_r$ @ 45 V PIV) PER LEG $T_J = 25^\circ\text{C}$ $T_J = 125^\circ\text{C}$	$I_r$	1.5 70	mA

**Note:**  $V_f$  Curves are shown for die only.

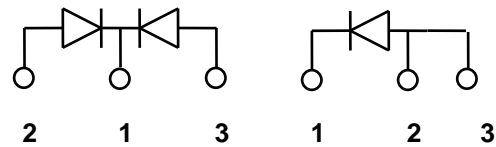
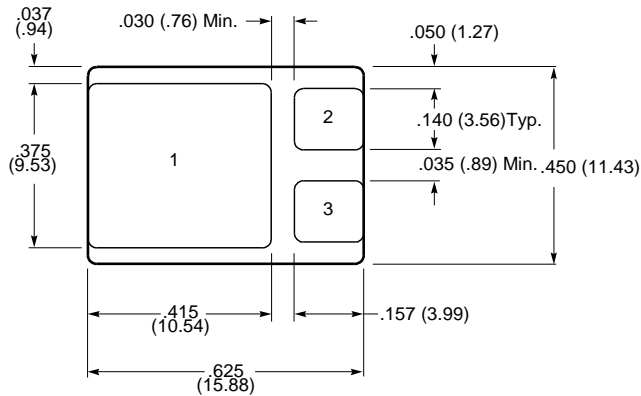
**SENSITRON**

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**MECHANICAL DIMENSIONS: IN Inches / mm**



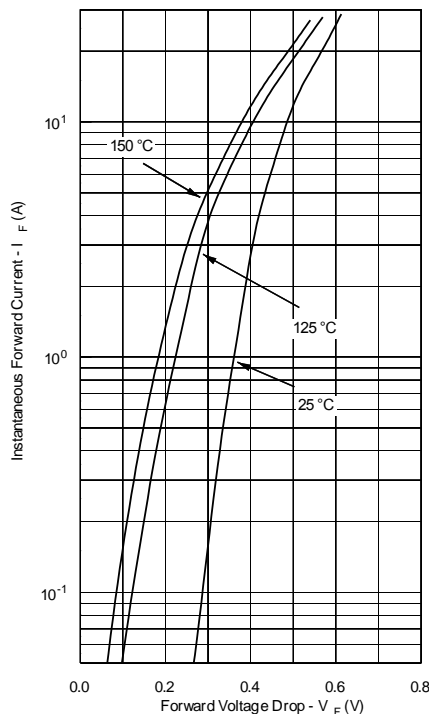
**SMD-1**



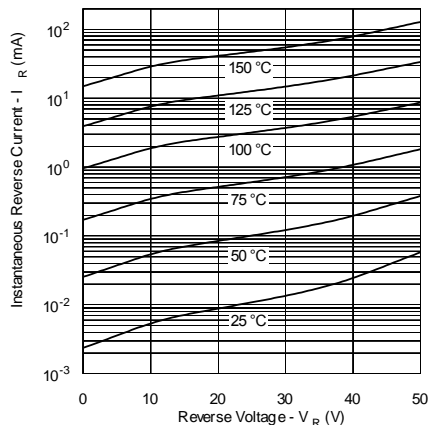
**PINOUT TABLE**

<b>DEVICE TYPE</b>	<b>PIN 1</b>	<b>PIN 2</b>	<b>PIN 3</b>
SINGLE RECTIFIER	CATHODE	ANODE	ANODE
DUAL RECTIFIER COMMON CATHODE (P)	COMMON CATHODE	ANODE 1	ANODE 2

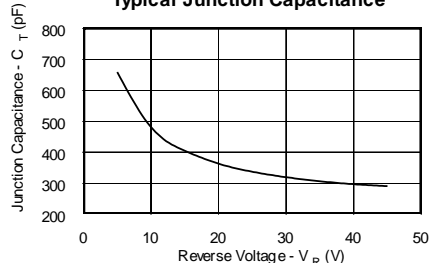
**Typical Forward Characteristics**



**Typical Reverse Characteristics**



**Typical Junction Capacitance**



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