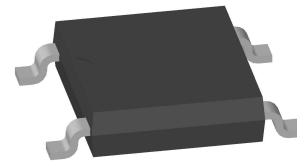


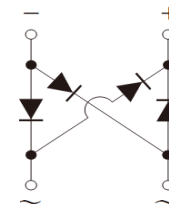
Features

- Low forward voltage drop
- Low power losses, high efficiency
- High Current Capability
- High surge capability
- High temperature soldering:
260°C/10 seconds at terminals
- Component in accordance to
RoHS 2011/65/EU and WEEE 2002/96/EC



RoHS
COMPLIANT

ABS



Mechanical Date

- **Case:**ABS
Molding compound meets
UL 94 V-0 flammability rating
- **Terminals:** Solder plated, solderable per
MIL-STD-750, Method 2026
- **Polarity:** Polarity symbols marked on case
- **Mounting Position:** Any

Major Ratings and Characteristics

$I_{F(AV)}$	1.0A
V_{RRM}	200 V to 1000 V
I_{FSM}	35A
I_R	5 μ A
V_F	1.0V
$T_{Jmax.}$	150°C

Maximum Ratings & Thermal Characteristics ($T_A=25^\circ\text{C}$ unless otherwise noted)

Items	Symbol	ABS 12	ABS 14	ABS 16	ABS 18	ABS 110	Unit
Maximum repetitive peak reverse voltage	V_{RRM}	200	400	600	800	1000	V
Maximum RMS voltage	V_{RMS}	140	280	420	560	700	V
Maximum DC blocking voltage	V_{DC}	200	400	600	800	1000	V
Maximum average forward rectified current at $T_L=100^\circ\text{C}$	$I_{F(AV)}$	1.0					A
Peak forward surge current 8.3 ms single half sine-wave superimposed on rated load	I_{FSM}	35.0					A
Thermal resistance from junction to lead ⁽¹⁾	$R_{\theta JL}$	25.0					$^\circ\text{C}/\text{W}$
Operating junction temperature range	T_J	-55 to +150					$^\circ\text{C}$
storage temperature range	T_{STG}	-55 to +150					

Note1: Mounted on glass epoxy PC board with 1.3mm² solder pad.

Electrical Characteristics ($T_A = 25^\circ\text{C}$ unless otherwise noted)

Items	Test conditions	Symbol	Min.	Typ.	Max.	Unit
Instantaneous forward voltage per leg	$I_F=1.0A^{(2)}$	V_F	-	-	1.00	V
Reverse current	$V_R=V_{DC}$	I_R	-	-	5	μA
					500	

Note 2: Pulse test:300 μ s pulse width,1% duty cycle.

Characteristics Curves

Fig.1 Forward Current Derating Curve

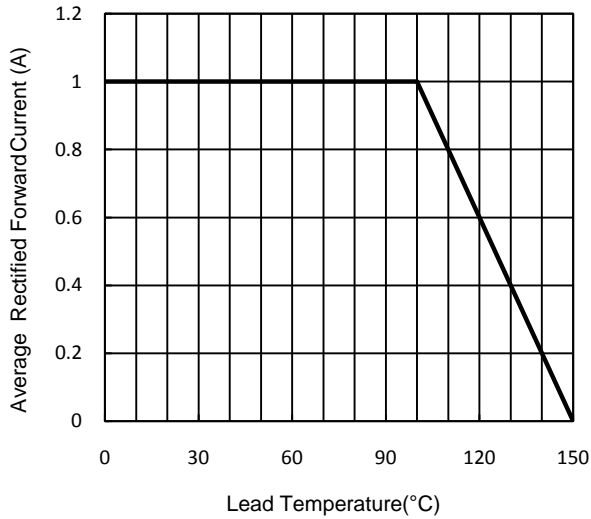


Fig.2 Maximum Non-Repetitive Peak Forward Surge Current

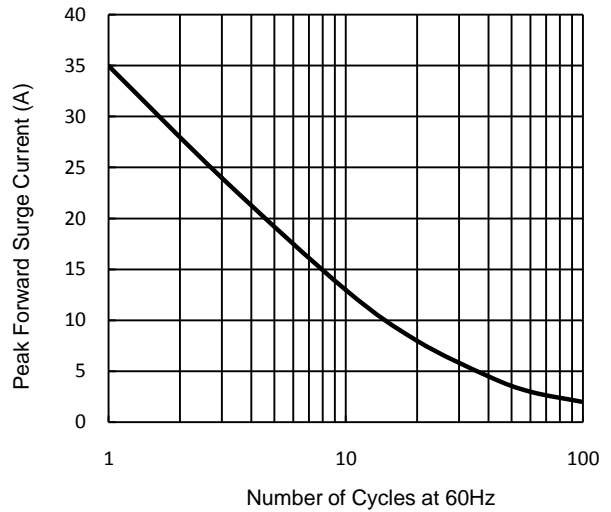


Fig.3 Typical Forward Current Characteristics

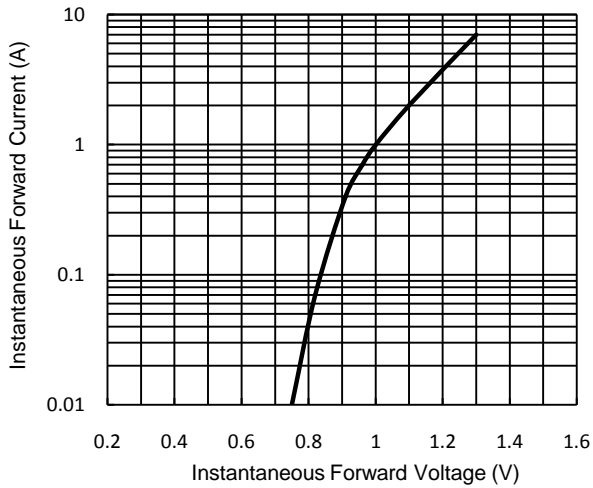
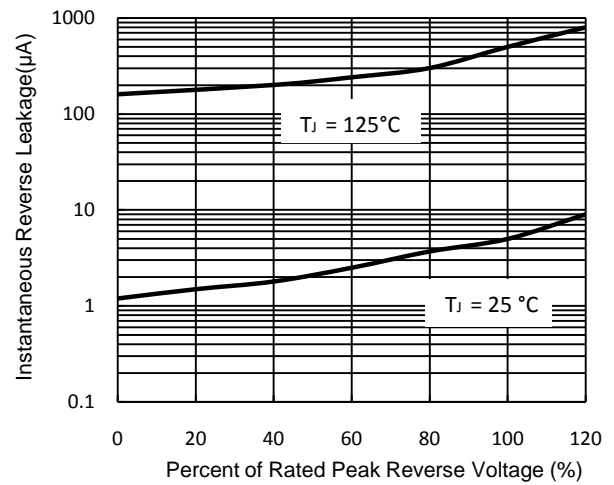
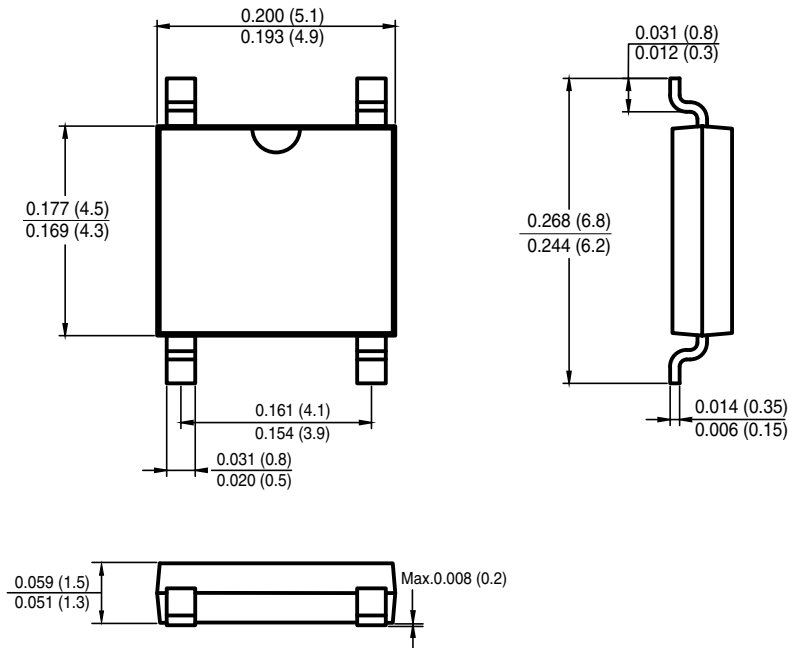


Fig.4 Typical Reverse Characteristics

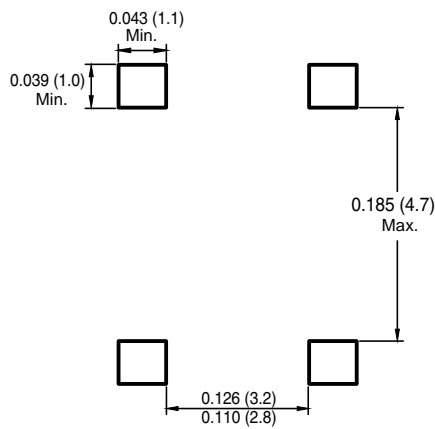


Package Outline

ABS



Mounting Pad Layout



Dimensions in inches and (millimeters)