



RUST

50ns ULTRA-FAST RECOVERY
HIGH VOLTAGE RECTIFIER DIODES

- PIV to 10,000 Volts
- 50ns ultra-fast recovery
- Small size
- Exceptionally low leakage
- High surge capability
- Avalanche characteristics



PRV	8 KV	10KV
EDI SERIES	RUST2008	RUST2010

ELECTRICAL CHARACTERISTICS (at $T_A=25^\circ\text{C}$ Unless Otherwise Specified)

Average Rectified Forward Current @ 50°C , I_o (Fig1)	100 mA
Max. Peak Surge Current, I_{FSM} (8.3ms) (Fig.2)	5 Amp
Max. Reverse Recovery, T_{rr} , Fig.4	50ns
Max. Forward Voltage Drop @ 100 mA, V_F	26 Volts
Max. DC Reverse Current @ PRV and 25°C , I_R	1 μA
Max. DC Reverse Current @ PRV and 100°C , I_R	25 μA
Ambient Operating Temperature Range, T_A	-55 to +150 $^\circ\text{C}$
Storage Temperature Range, T_{STG}	-55 to +150 $^\circ\text{C}$

NOTES:

- 1.It is recommended that a proper heat sink be used on the terminals of this device between the body and soldering point to prevent damage from excess heat.
- 2.If operated over 10,000v/inch in length, devices should be immersed in oil or re - encapsulated.

EDI reserves the right to change these specifications at any time without notice.

RUST

FIG.1

OUTPUT CURRENT vs AMBIENT TEMPERATURE

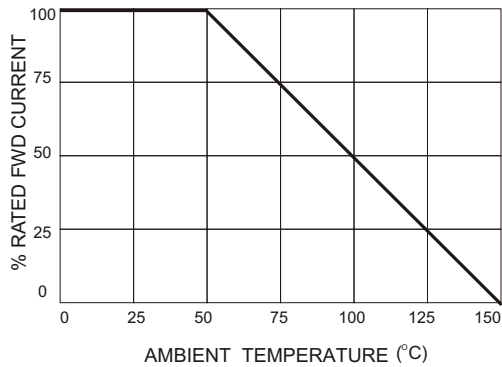


FIG.2

NON-REPETITIVE SURGE CURRENT

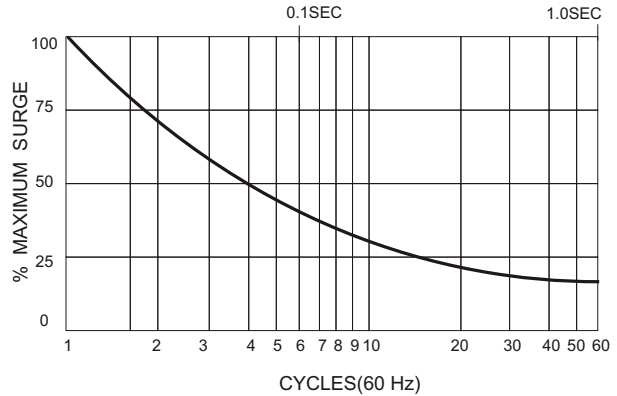
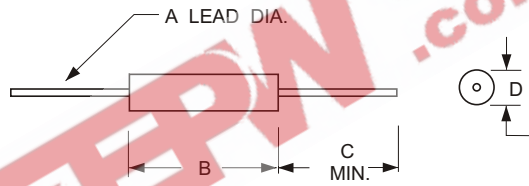


FIG.3

MECHANICAL Leads - solid silver

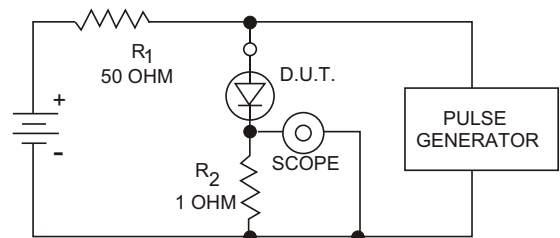
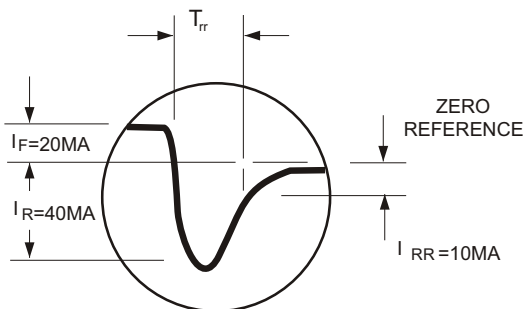


	INCHES	MM
A	0.02	0.5
B	0.60	15.2
C	0.50	12.7
D	0.16	4.0

TEST CIRCUIT

FIG.4

TYPICAL REVERSE RECOVERY WAVEFORM



R₁, R₂ NON-INDUCTIVE RESISTORS
 PULSE GENERATOR-HEWLETT PACKARD 214A OR EQUIV.
 IKC REP.RATE, 10 μ SEC. PULSE WIDTH
 ADJUST PULSE AMPLITUDE FOR PEAK I_R

ELECTRONIC DEVICES, INC. DESIGNERS AND MANUFACTURERS OF SOLID STATE DEVICES SINCE 1951.

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