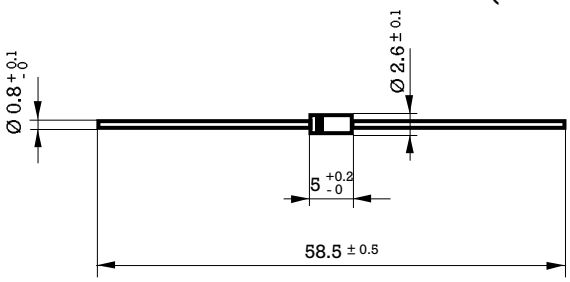
1 Amp. Glass Passivated Ultrafast Recovery Rectifier

Dimensions in mm. DO-41 (Plastic)



Voltage 50 to 1000 V. Current 1 A at 55 °C.

HYPERECTIFIER®

Mounting instructions

1. Min. distance from body to soldering point, 4 mm.
2. Max. solder temperature, 350 °C.
3. Max. soldering time, 3.5 sec.
4. Do not bend lead at a point closer than 2 mm. to the body.

- **Glass Passivated Junction**
- High current capability
- The plastic material carries U/L recognition 94 V-0
- Terminals: Axial Leads
- Polarity: Color band denotes cathode

Maximum Ratings, according to IEC publication No. 134

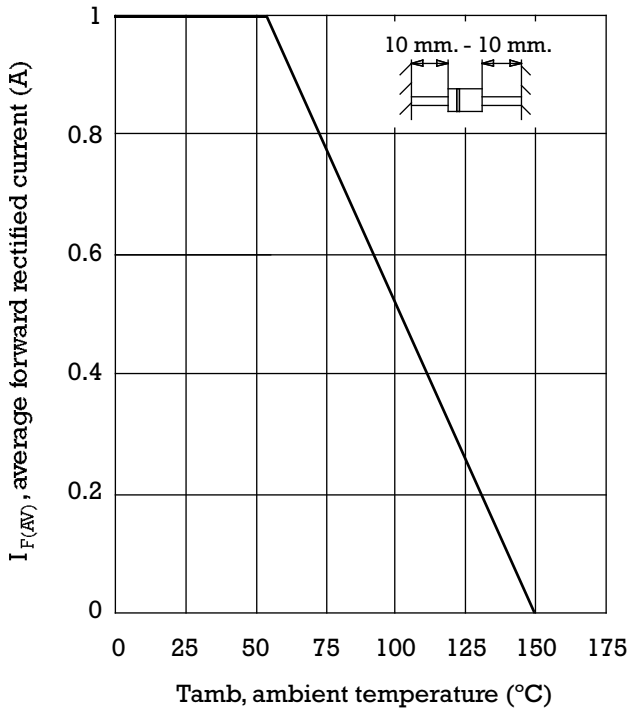
		FUF 4001	FUF 4002	FUF 4003	FUF 4004	FUF 4005	FUF 4006	FUF 4007
V_{RRM}	Peak Recurrent reverse voltage (V)	50	100	200	400	600	800	1000
V_{RMS}	Maximum RMS voltage	35	70	140	280	420	560	700
V_{DC}	Maximum DC blocking voltage	50	100	200	400	600	800	1000
$I_{F(AV)}$	Forward current at Tamb = 55 °C	1 A						
I_{FRM}	Recurrent peak forward surge current	10 A						
I_{FSM}	8.3 ms. peak forward surge current (Jedec Method)	30 A						
t_{rr}	Max. reverse recovery time from I_F = 0.5 A ; I_R = 1 A ; I_{RR} = 0.25 A	50 ns				75 ns		
C_j	Typical Junction Capacitance at 1 MHz and reverse voltaje of $4V_{DC}$	15 pF						
T_j	Operating temperature range	– 65 to + 150 °C						
T_{stg}	Storage temperature range	– 65 to + 150 °C						
E_{RSM}	Maximum non repetitive peak reverse avalanche energy. I_R = 0.5A ; T_J = 25 °C	20 mJ						

Electrical Characteristics at Tamb = 25 °C

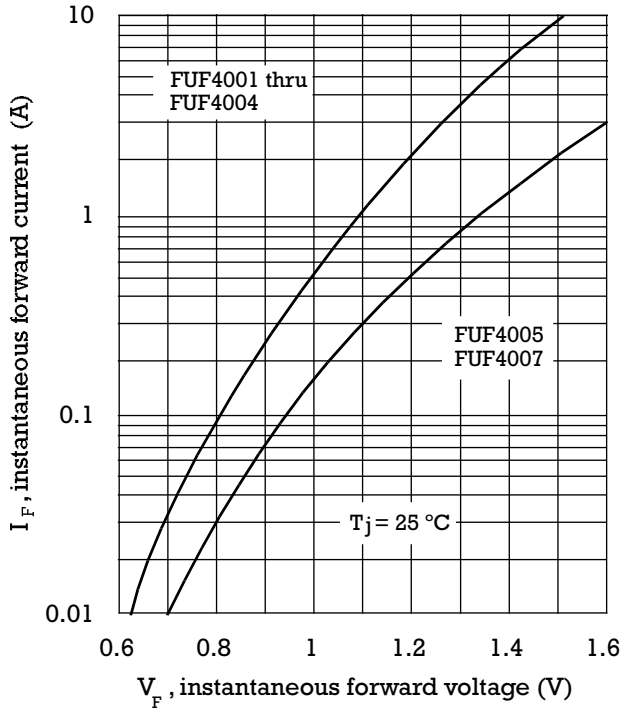
V_F	Max. forward voltage drop at I_F = 1 A	1.3 V	1.7 V
I_R	Max. reverse current at V_{RRM} at 25 °C	5 µ A	
R_{thj-a}	Max. thermal resistance (l = 10 mm.)	50 °C/W	

Rating And Characteristic Curves

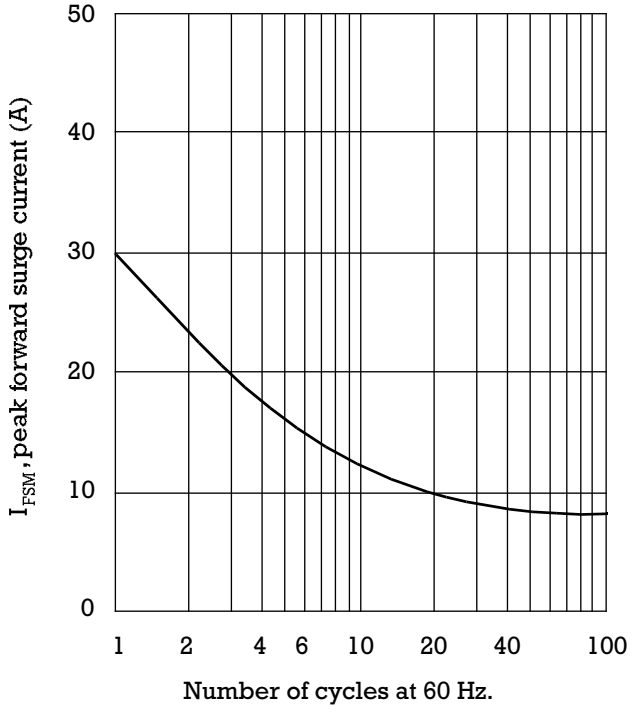
FORWARD CURRENT DERATING CURVE



TYPICAL FORWARD CHARACTERISTIC



MAXIMUM NON REPETITIVE
PEAK FORWARD SURGE CURRENT



TYPICAL JUNCTION CAPACITANCE