

**VOLTAGE RANGE: 80V**  
**CURRENT: 0.5A**

### Features

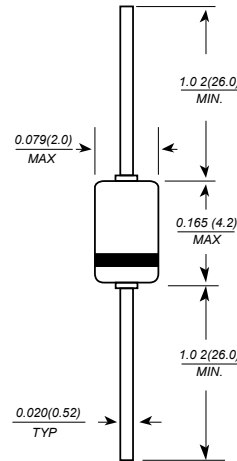
- Small foot print, surface mountable
- Very low forward voltage drop
- High frequency operation
- Guard ring for enhanced ruggedness and long term reliability

### Mechanical Data

- Case: DO-35, glass case
- Polarity: Color band denotes cathode
- Weight: 0.004 ounces, 0.13 grams



### DO-35(GLASS)



Dimensions in millimeters

### Maximum Ratings and Electrical Characteristics T<sub>A</sub> = 25°C unless otherwise specified

Single phase, half wave, 60Hz, resistive or inductive load. For capacitive load, derate current by 20%.

Parameter	Symbol	Value	Unit
Repetitive Peak Reverse Voltage	V <sub>RRM</sub>	80	V
Forward Continuous Current* T <sub>a</sub> = 70 °C	I <sub>F</sub>	500	mA
Repetitive Peak Forward Current* t <sub>p</sub> = 1s δ ≤ 0.5	I <sub>FRM</sub>	3	A
Surge non Repetitive Forward Current* t <sub>p</sub> ≤ 10ms	I <sub>FSM</sub>	10	A
Storage and Junction Temperature Range	T <sub>stg</sub>	- 65 to 150	°C
	T <sub>j</sub>	- 65 to 125	°C
Maximum Lead Temperature for Soldering during 10s at 4mm from Case	T <sub>L</sub>	230	°C

Symbol	Test Conditions		Min.	Typ.	Max.	Unit
I <sub>R</sub> **	T <sub>j</sub> = 25°C	V <sub>R</sub> = 80V			200	μA
V <sub>F</sub> **	T <sub>j</sub> = 25°C	I <sub>F</sub> = 10mA			0.32	V
		I <sub>F</sub> = 100mA			0.42	
		I <sub>F</sub> = 1A			1	
Symbol	Test Conditions		Min.	Typ.	Max.	Unit
C	T <sub>j</sub> = 25°C	f = 1MHz	V <sub>R</sub> = 0V		120	pF
			V <sub>R</sub> = 5V		35	

Figure 1. Forward current versus forward voltage at low level (typical values).

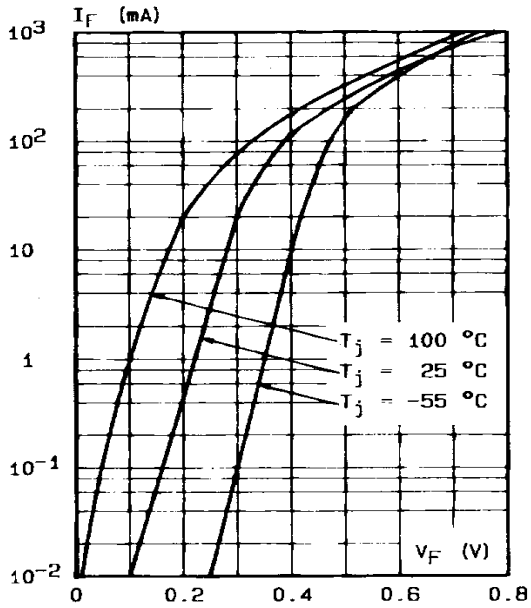


Figure 2. Forward current versus forward voltage at high level (typical values).

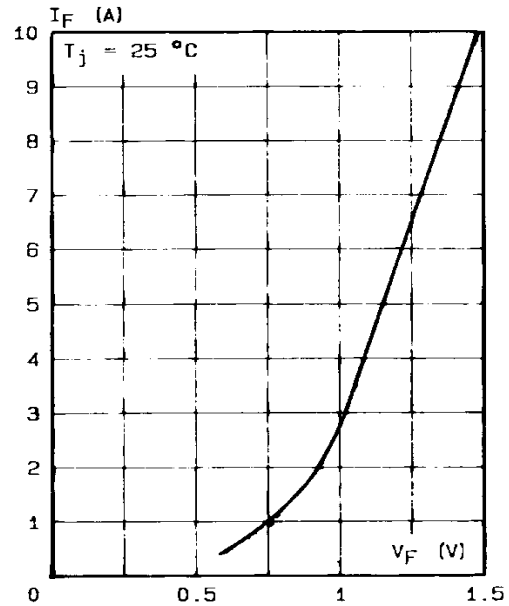


Figure 3. Reverse current versus junction temperature.

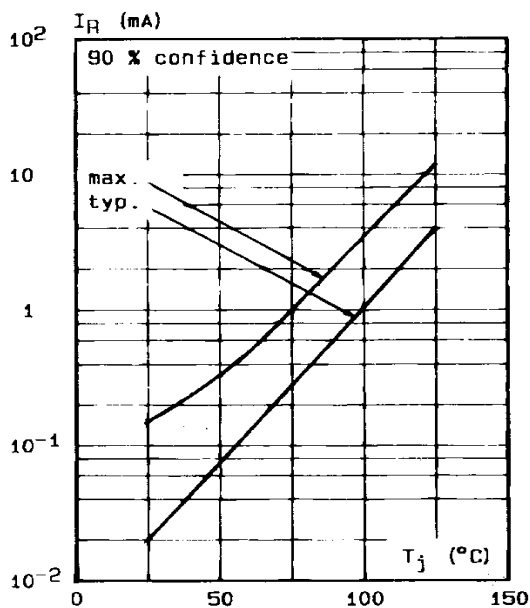
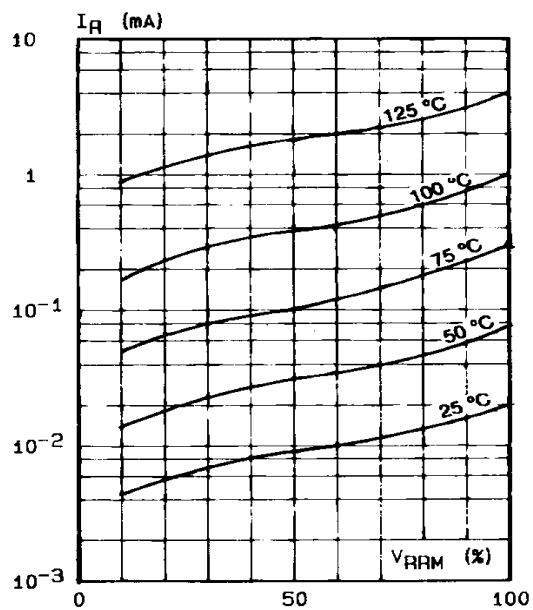
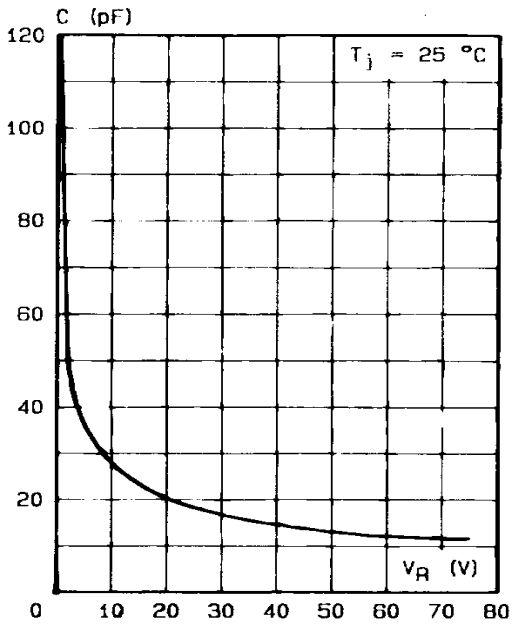


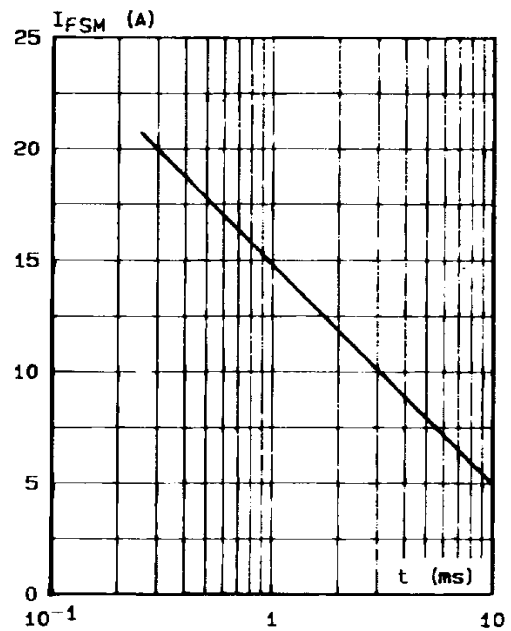
Figure 4. Reverse current versus  $V_{RRM}$  in per cent.



**Figure 5. Capacitance C versus reverse applied voltage  $V_R$  (typical values).**



**Figure 6. Surge non repetitive forward current for a rectangular pulse with  $t \leq 10$  ms.**



**Figure 7. Surge non repetitive forward current versus number of cycles.**

