



ESJA53-20A

5mA Axial Leaded High Voltage Silicon Diode

Features

Mechanical Data

- Weight: 0.3 grams (approx.)
- Vibration Proof: 5 G

Maximum Ratings and Electrical Characteristics

 @ $T_A = 25^\circ\text{C}$ unless otherwise specified

Items	Conditions	Symbols	Ratings	Units
Repetitive peak reverse voltage		V_{RRM}	20	kV peak
Non-repetitive peak forward current	50Hz Sine-half wave peak value	I_{FSM}	0.5	A peak
Average forward current	50Hz Sine-wave	I_{AV}	5	mA
Allowable junction temperature		T_j	120	°C
Storage Temperature range		T_{stg}	-40—120	°C
Allowable operating case temperature		T_c	100	°C
Maximum forward voltage drop	$1F=10\text{mA}$	VF	75	V
Maximum reverse current	$VR=20\text{kV}$	IR_1	2	uA
Maximum reverse current	$VR=20\text{kV}, 100^\circ\text{C}$	IR_2	5	uA
Maximum reverse recovery time	$1F=2\text{mA}, 1R=4\text{mA}$	T_{rr}	0.08	uS
Maximum junction capacitance	$F=1\text{MHz}, VR=0\text{V}$	C_j	1	PF

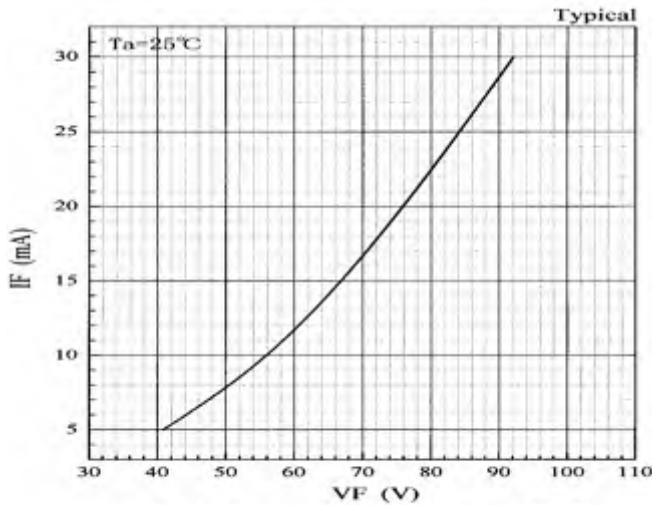


Fig. 1 Forward characteristic [VF-IF]

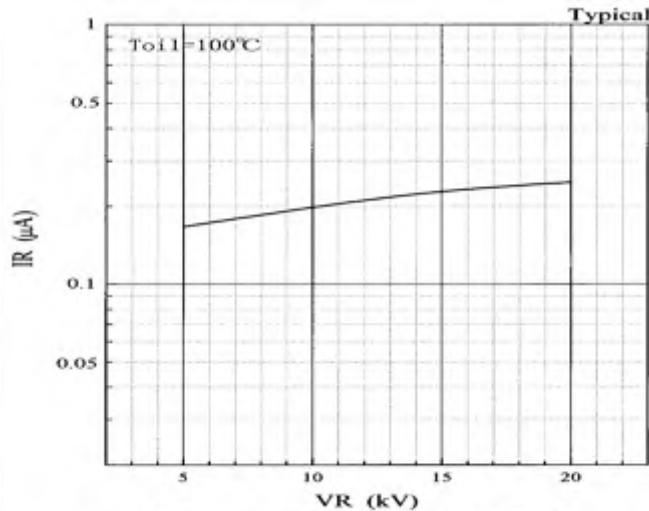


Fig. 2 Reverse characteristic [VR-IR]

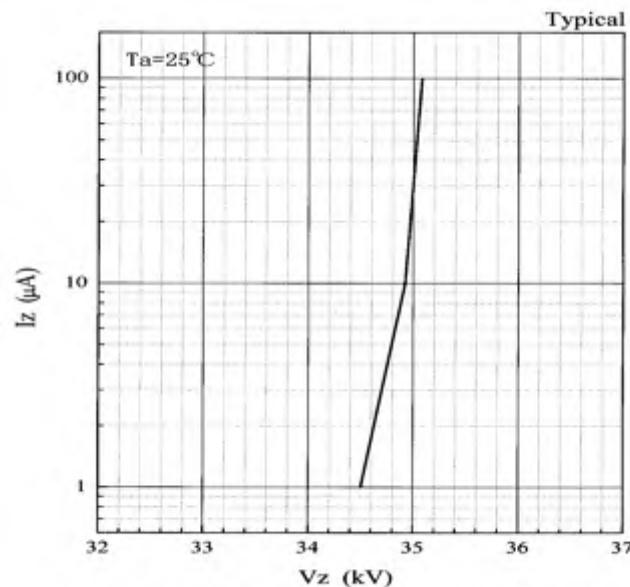


Fig. 3 Avalanche characteristic [Vz-Iz]

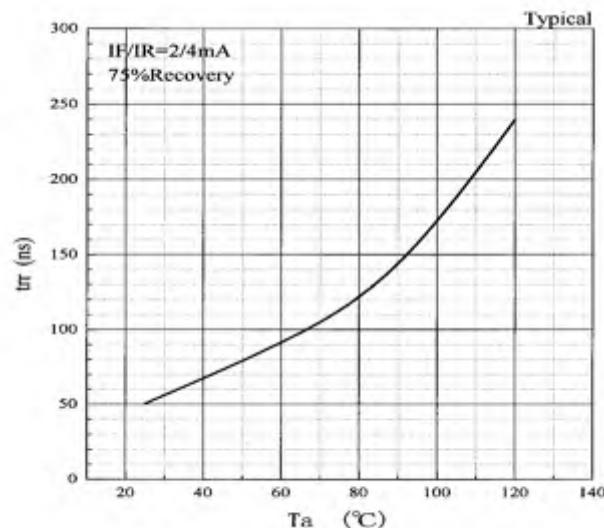


Fig. 4 Reverse recovery time characteristic [Ta-trr]