

FEATURES

- The plastic package carries Underwrites Laboratory Flammability Classification 94V-0
- Construction utilizes void-free molded plastic technique
- Low reverse leakage
- High forward surge current capability
- High temperature soldering guaranteed:260°C/10 seconds at terminals
- 0.375"(9.5mm) lead length, 5lbs.(2.3kg).

MECHANICAL DATA

- *Case:* JEDEC DO-41 molded plastic body
- *Terminals:* Lead solderable per MIL-STD-750,method 2026
- *Polarity:* Color band denotes cathode end
- *Mounting Position:* Any
- *Weight:* 0.012ounce, 0.33 gram

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

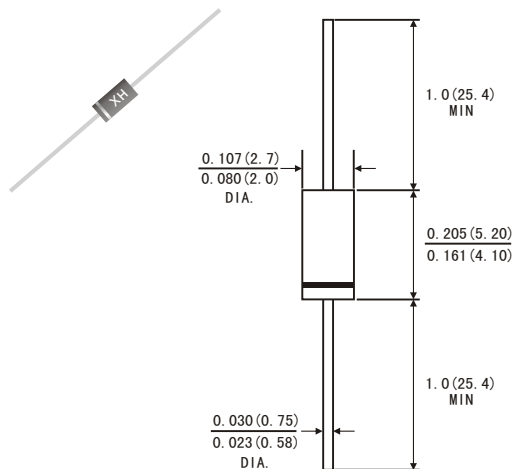
(Ratings at 25°C ambient temperature unless otherwise specified ,Single phase ,half wave 60Hz,,resistive or inductive load. For capacitive load, derate by 20%.)

	Symbols	1N 4001	1N 4002	1N 4003	1N 4004	1N 4005	1N 4006	1N 4007	Unis
Maximum Recurrent Peak Reverse Voltage	V _{RRM}	50	100	200	400	600	800	1000	Volts
Maximum RMS Voltage	V _{RMS}	35	70	140	280	420	560	700	Volts
Maximum DC Blocking Voltage	V _{DC}	50	100	200	400	600	800	1000	Volts
Maximum average Forward Rectified Current 0.375"(9.5mm) lead length at T _A =75°C	I _(AV)	1.0							Amp
Peak Forward Surge Current (8.3ms half sine-wave superimposed on rated load (JEDEC method) T _A =75°C	I _{FSM}	30.0							Amps
Maximum Instantaneous Forward Voltage at 1.0 A	V _F	1.0							Volts
Maximum Reverse current at rated DC Blocking Voltage	I _R	T _r =25 °C							μA
		T _r =100 °C							
Typical Thermal resistance (Note 2)	R _{θJA}	65.0							°C/W
Typical Junction Capacitance(Note 1)	C _J	10.0							pF
Maximum DC Blocking Voltage temperature	T _A	+150							°C
Operating and Storage temperature Range	T _J T _{STG}	-65 to+150							°C

Note: 1.Measured at 1MHz and applied reverse voltage of 4.0V DC.

2.Thermal resistance from junction to ambient and from junction to lead at 0.375"(9.5mm)lead length, P.C.B. mounted

DO-41



Dimensions in inches and (millimeters)

FIG.1-FORWARD CURRENT DERATING CURVE

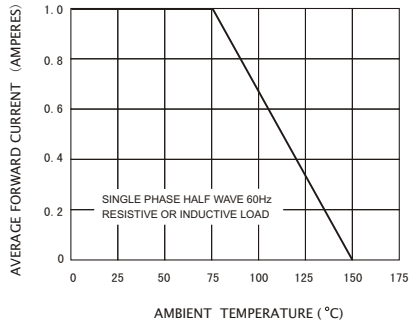


FIG.2-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

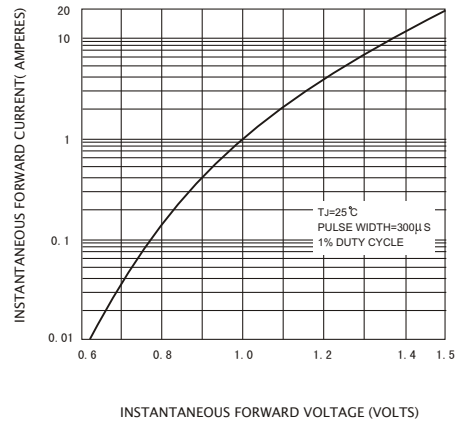


FIG.3-MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

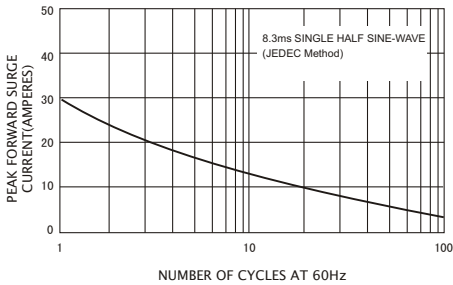


FIG.4-TYPICAL REVERSE CHARACTERISTICS

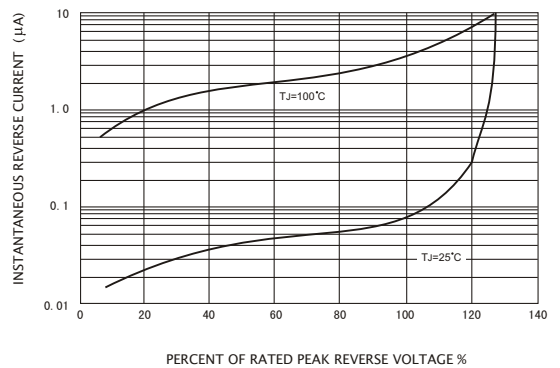


FIG.5-TYPICAL JUNCTION CAPACITANCE

