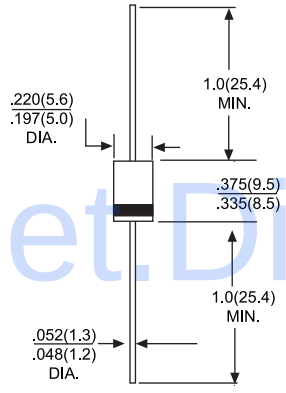
1N5400 THRU 1N5408

3.0 AMPS. SILICON RECTIFIERS

Voltage Range
50 to 1000 Volts
Current
3.0 Amperes

DO-201AD



Dimensions in inches and (millimeters)

Features

- Low forward voltage drop
- High current capability
- High reliability
- High surge current capability

Mechanical Data

- Cases:Molded plastic
- Epoxy:UL 94V-O rate flame retardant
- Lead:Axial leads,solderable per MIL-STD-202, Method 208 guaranteed
- Polarity:Color band denotes cathode end
- High temperature soldering guaranteed: 250°C/10 seconds/.375",(9.5mm) lead lengths at 5 lbs.,(2.3kg) tension
- Weight:1.2 grams

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

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

Type Number		1N5400	1N5401	1N5402	1N5404	1N5406	1N5407	1N5408	UNITS
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	50	100	200	400	600	800	1000	V
Maximum RMS Voltage	V_{RMS}	35	70	140	280	420	560	700	V
Maximum DC Blocking Voltage	V_{DC}	50	100	200	400	600	800	1000	V
Maximum Average Forward Rectified Current .375"(9.5mm) Lead Length @T_A = 75°C	$I_{F(AV)}$	3.0							A
Peak Forward Surge Current, 8.3 ms Single Half Sine-wave Superimposed on Rated Load (JEDEC method)	I_{FSM}	200							A
Maximum Instantaneous Forward Voltage @2.0A	V_F	1.0							V
Maximun DC Reverse Current @ T_A = 25°C at Rated DC Blocking Voltage @ T_A = 100°C	I_R	5.0 100							uA uA
Maximun Full Load Reverse Current, Full Cycle Average .375"(9.5mm) Lead Length @T_L=75°C	I_R	30							uA
Typical Junction Capacitance (Note 1)	C_J	50							pF
Typical Thermal Resistance (Note 2)	$R_{\theta JA}$	8							°C/W
Operating Temperature Range	T_J	-55 to+125							°C
Storage Temperature Range	T_{STG}	-55 to+150							°C

NOTES: 1. Measured at 1 MHz and Applied Reverse Voltage of 4.0 Volts D.C.
2.Thermal Resistance from Junction to Ambient .375"(9.5mm) Lead Length.

RATING AND CHARACTERISTIC CURVES
1N5400 THRU 1N5408

FIG.1- MAXIMUM FORWARD CURRENT DERATING CURVE

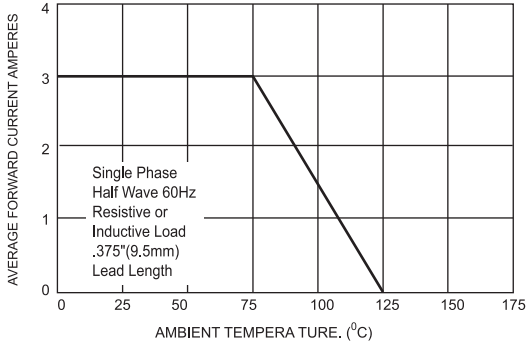


FIG.2- MAXIMUN NON-REPETITIVE FORWARD SURGE CURRENT

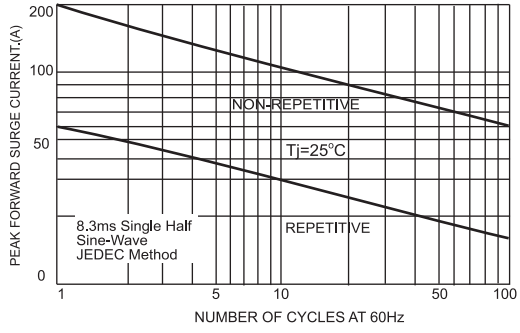


FIG.4-TYPICAL REVERSE CHARACTERISTICS

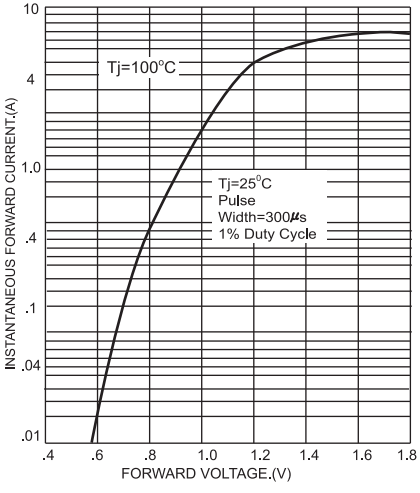


FIG.4-TYPICAL JUNCTION CAPACITANCE

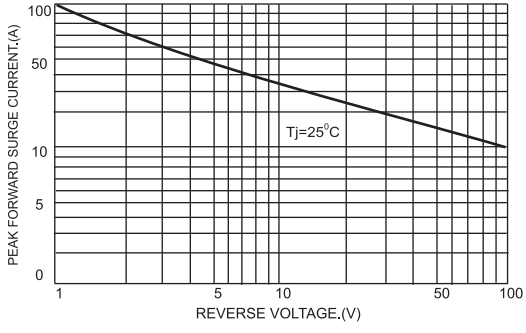


FIG.5- TYPICAL REVERSE CHARACTERISTICS