R1200 THRU R2500

HIGH VOLTAGE SILICON RECTIFIERS

VOLTAGE RANGE
1200 to 2500 Volts
CURRENT
500 & 200 m Ampere

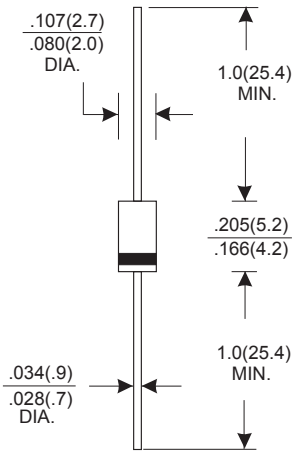
FEATURES

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

MECHANICAL DATA

* Case: Molded plastic
* Epoxy: UL 94V-0 rate flame retardant
* Lead: Axial leads, solderable per MIL-STD-202, method 208 guranteed
* Polarity: Color band denotes cathode end
* Mounting position: Any
* Weight: 0.34 grams

DO-41



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

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

TYPE NUMBER	R1200	R1500	R1600	R1800	R2000	R2500	UNITS
Maximum Recurrent Peak Reverse Voltage	1200	1500	1600	1800	2000	2500	V
Maximum RMS Voltage	840	1050	1120	1260	1400	1750	V
Maximum DC Blocking Voltage	1200	1500	1600	1800	2000	2500	V
Maximum Average Forward Rectified Current .375"(9.5mm) Lead Length at Ta=50˚C	500				200		mA
Peak Forward Surge Current, 8.3 ms single half sine-wave superimposed on rated load (JEDEC method)	30						A
Maximum Instantaneous Forward Voltage at 0.5A/0.2A D.C.	2.0				3.0		V
Maximum DC Reverse Current Ta=25˚C	5.0						μA
at Rated DC Blocking Voltage Ta=100˚C	50						μA
Typical Junction Capacitance (Note 1)	30						pF
Operating and Storage Temperature Range T_J, T_{STG}	-65 — +175						˚C

NOTES:

1. Measured at 1MHz and applied reverse voltage of 4.0V D.C.

RATING AND CHARACTERISTIC CURVES (R1200 THRU R2500)

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

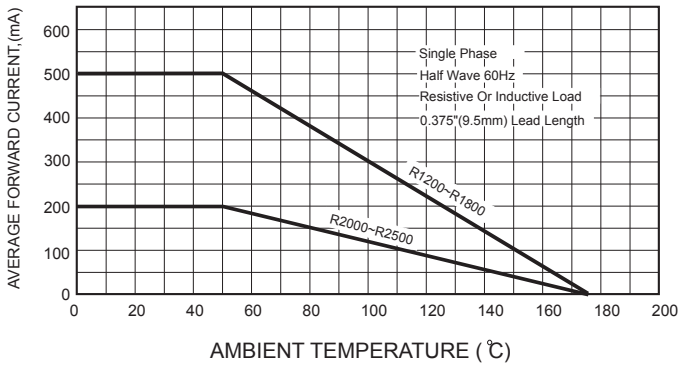


FIG.2 - TYPICAL REVERSE CHARACTERISTICS

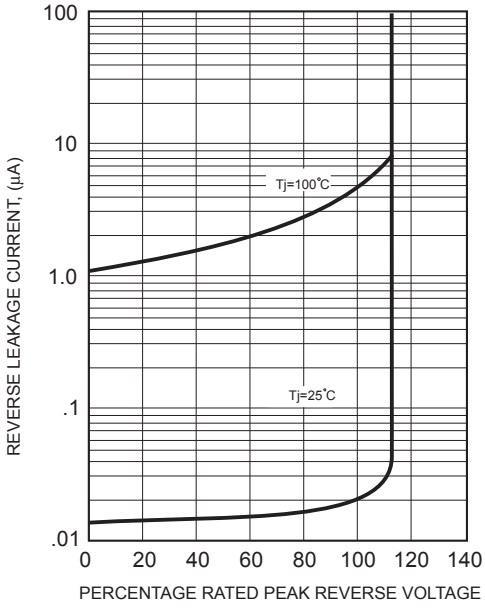


FIG.3-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

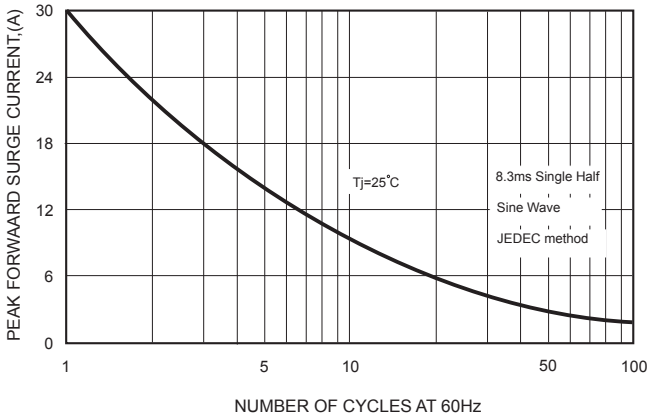


FIG.4-TYPICAL JUNCTION CAPACITANCE

