

1N5391 THRU 1N5399

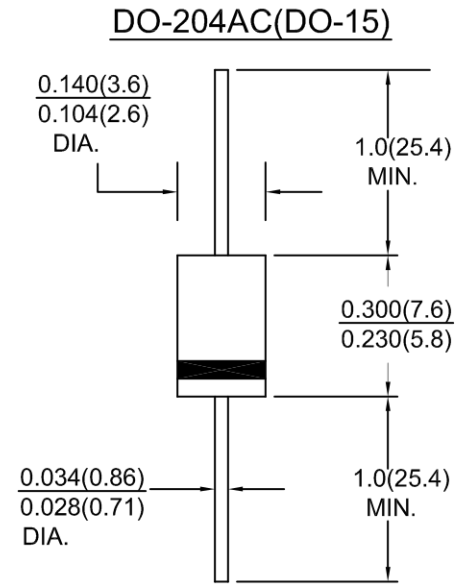
SILICON RECTIFIERS

FEATURES:

- Low cost
- High surge current capability
- Low leakage current
- Low forward voltage drop
- Diffused junction

MECHANICAL DATA

Case : Molded plastic use UL 94V-0 recognized flame retardant epoxy
Terminals : Axial leads, solderable per MIL-STD-202, Method 208 guaranteed
Polarity : Color band on body denotes cathode
Mounting Position : Any
Weight : 0.40 gram



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25° C ambient temp. unless otherwise specified.

Single phase, half sine wave, 60 Hz, resistive or inductive load.

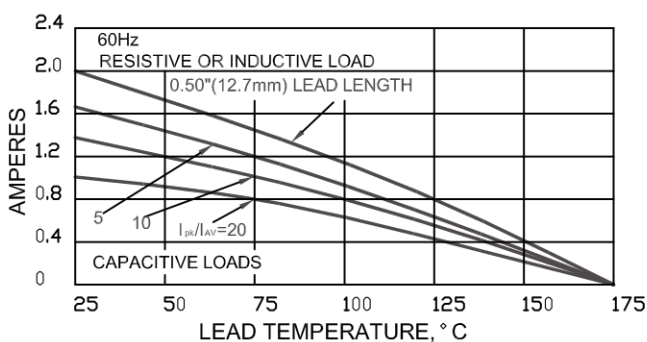
For capacitive load, derate current by 20 %.

Characteristic	Symbol	1N 5391	1N 5392	1N 5393	1N 5394	1N 5395	1N 5396	1N 5397	1N 5398	1N 5399	Units
Maximum recurrent peak reverse voltage	V _{RRM}	50	100	200	300	400	500	600	800	1000	Volts
Maximum RMS voltage	V _{RMS}	35	70	140	210	280	350	420	560	700	Volts
Maximum DC blocking voltage	V _{DC}	50	100	200	300	400	500	600	800	1000	Volts
Maximum average forward rectified current at Ta=75° C	I _O	1.5									Amps
Peak forward surge current ,8.3ms single half sine-wave superimposed on rated load(JEDEC Method)	I _{FSM}	50.0									Amps
Maximum instantaneous forward voltage at 1.5 A	V _F	1.1	1.0								Volts
Maximum DC reverse current Ta=25° C at rated DC reverse voltage Ta=125° C	I _R	5.0 50.0									μ A
Typical junction capacitance	C _j	25									pF
Operating junction and storage temperature range	T _j ,T _{stg}	-65 to +125					-65 to +150				° C

RATINGS AND CHARACTERISTIC CURVES 1N5391 THRU 1N5399

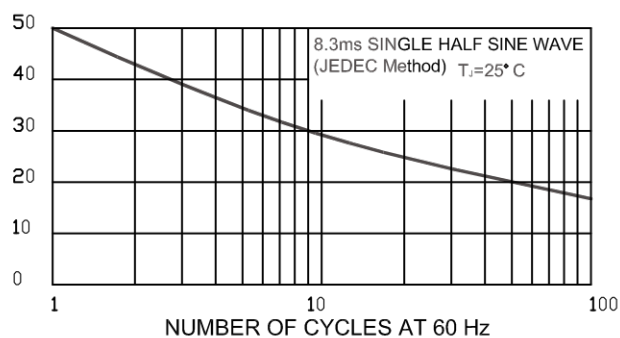
AVERAGE FORWARD RECTIFIED CURRENT, AMPERES

FIG.1-DERATING CURVE FOR OUTPUT RECTIFIER CURRENT



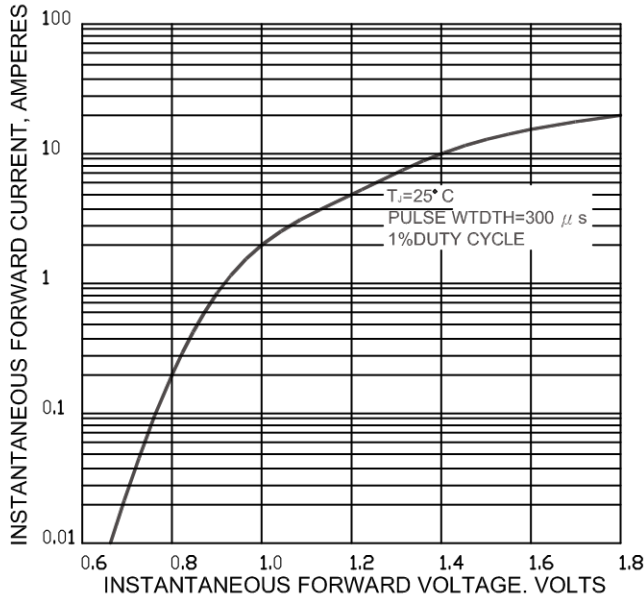
PEAK FORWARD SURGE CURRENT, AMPERES

FIG.2-MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT



INSTANTANEOUS FORWARD CURRENT, AMPERES

FIG.3-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS



INSTANTANEOUS REVERSE CURRENT, MICROAMPERES

FIG.4-TYPICAL REVERSE CHARACTERISTICS

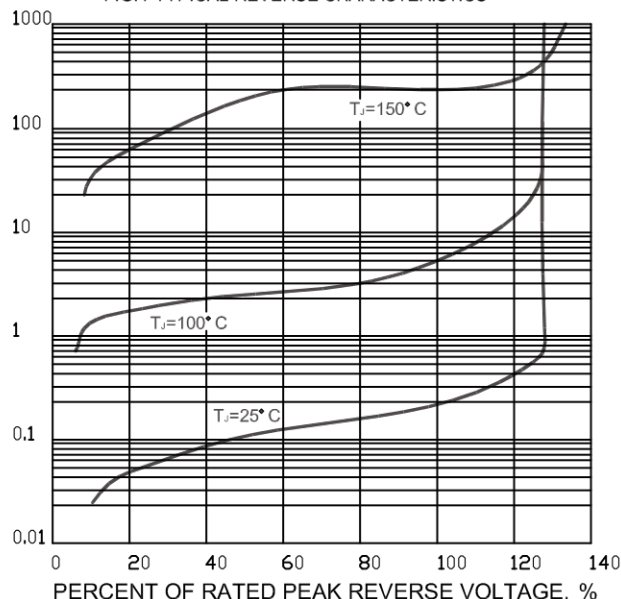


FIG.5-TYPICAL JUNCTION CAPACITANCE

