

HVR112 - HVR120

PRV : 1200 - 2000 Volts

Io : 1.0 Ampere

FEATURES :

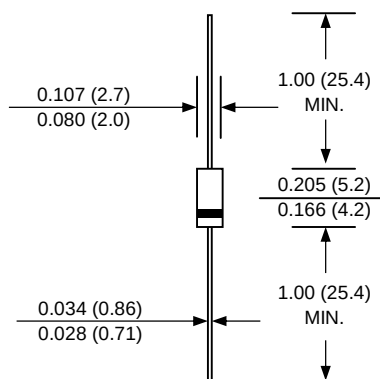
- * High current capability
- * High surge current capability
- * High reliability
- * Low reverse current
- * Low forward voltage drop
- * **Pb / RoHS Free**

MECHANICAL DATA :

- * Case : DO-41 Molded plastic
- * Epoxy : UL94V-O rate flame retardant
- * Lead : Axial lead solderable per MIL-STD-202, Method 208 guaranteed
- * Polarity : Color band denotes cathode end
- * Mounting position : Any
- * Weight : 0.34 gram

HIGH VOLTAGE RECTIFIER DIODES

DO - 41



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25 °C ambient temperature unless otherwise specified.

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

For capacitive load, derate current by 20%.

RATING	SYMBOL	HVR112	HVR114	HVR116	HVR118	HVR120	UNIT
Maximum Repetitive Peak Reverse Voltage	VRRM	1200	1400	1600	1800	2000	V
Maximum RMS Voltage	VRMS	840	980	1120	1260	1400	V
Maximum DC Blocking Voltage	VDC	1200	1400	1600	1800	2000	V
Maximum Average Forward Current Ta = 75°C	IF(AV)	1.0					A
Maximum Peak Forward Surge Current 8.3ms Single half sine wave Superimposed on rated load (JEDEC Method)	IFSM	30					A
Maximum Peak Forward Voltage at IF = 1.0 A	VF	2.2					V
Maximum DC Reverse Current Ta = 25°C	IR	5.0					μA
at Rated DC Blocking Voltage Ta = 100°C	IR(H)	100					μA
Typical Junction Capacitance (Note 1)	Cj	36					pF
Typical Thermal Resistance (Note 2)	RθJA	26					°C/W
Junction Temperature Range	TJ	- 40 to + 150					°C
Storage Temperature Range	TSTG	- 40 to + 150					°C

Notes :

(1) Measured at 1.0 MHz and applied reverse voltage of 4.0Vdc

(2) Thermal resistance from Junction to Ambient at 0.375" (9.5mm) Lead Lengths, P.C. Board Mounted.



RATING AND CHARACTERISTIC CURVES (HVR112 - HVR120)

FIG.1 - DERATING CURVE FOR OUTPUT RECTIFIED CURRENT

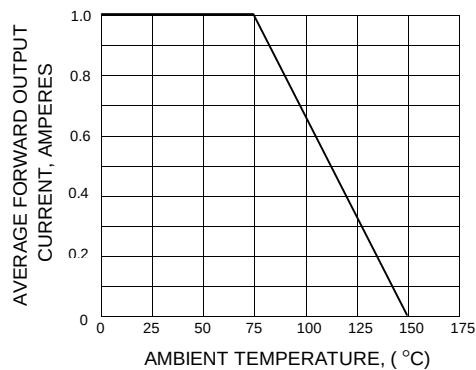


FIG.2 - MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

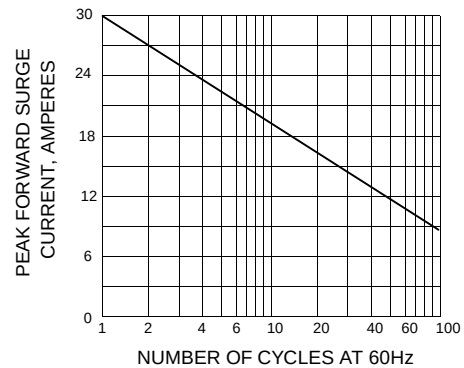


FIG.3 - TYPICAL FORWARD CHARACTERISTICS

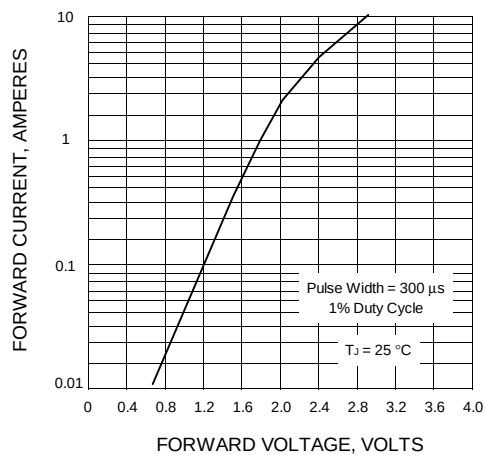


FIG.4 - TYPICAL REVERSE CHARACTERISTICS

