

RBV2500D - RBV2510D

SILICON BRIDGE RECTIFIERS

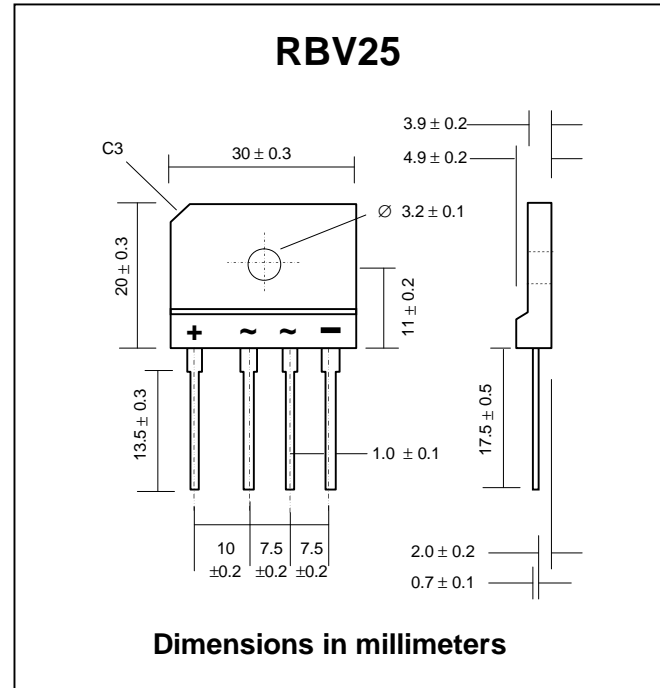
PRV : 50 - 1000 Volts
Io : 25 Amperes

FEATURES :

- * High current capability
- * High surge current capability
- * High reliability
- * Low reverse current
- * Low forward voltage drop
- * High case dielectric strength of 2000 Vdc
- * Ideal for printed circuit board
- * Very good heat dissipation
- * **Pb / RoHS Free**

MECHANICAL DATA :

- * Case : Reliable low cost construction utilizing molded plastic technique
- * Epoxy : UL94V-O rate flame retardant
- * Terminals : Plated lead solderable per MIL-STD-202, Method 208 guaranteed
- * Polarity : Polarity symbols marked on case
- * Mounting position : Any
- * Weight : 8.17 grams (Approximaly)



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	RBV 2500D	RBV 2501D	RBV 2502D	RBV 2504D	RBV 2506D	RBV 2508D	RBV 2510D	UNIT	
Maximum Recurrent Peak Reverse Voltage	VRRM	50	100	200	400	600	800	1000	V	
Maximum RMS Voltage	VRMS	35	70	140	280	420	560	700	V	
Maximum DC Blocking Voltage	VDC	50	100	200	400	600	800	1000	V	
Maximum Average Forward Current Tc = 55°C	IF(AV)	25								A
Peak Forward Surge Current Single half sine wave Superimposed on rated load (JEDEC Method)	IFSM	400								A
Current Squared Time at t < 8.3 ms.	I ² t	375								A ² S
Maximum Forward Voltage per Diode at IF = 25 A	VF	1.1								V
Maximum DC Reverse Current Ta = 25 °C at Rated DC Blocking Voltage Ta = 100 °C	IR	10								µA
	IR(H)	200								µA
Typical Thermal Resistance (Note 1)	RθJC	1.2								°C/W
Operating Junction Temperature Range	TJ	- 40 to + 150								°C
Storage Temperature Range	TSTG	- 40 to + 150								°C

Notes :

1. Thermal Resistance from junction to case with units mounted on a 5" x 6" x 4.9" (12.8cm.x 15.2cm.x 12.4cm.) Al.-Finned Plate

RATING AND CHARACTERISTIC CURVES (RBV2500D - RBV2510D)

FIG.1 - DERATING CURVE FOR OUTPUT RECTIFIED CURRENT

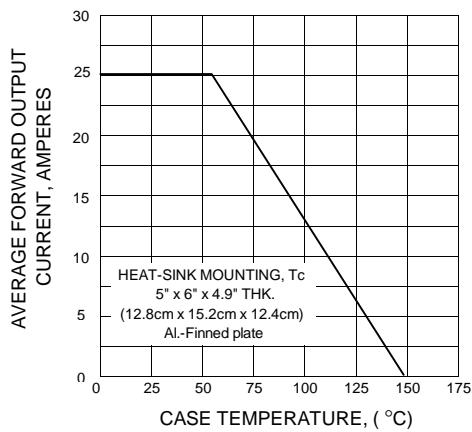


FIG.2 - MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

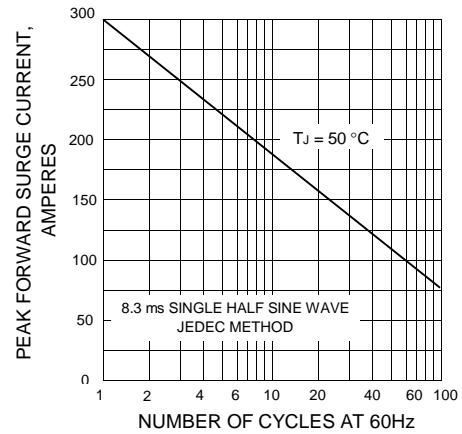


FIG.3 - TYPICAL FORWARD CHARACTERISTICS PER DIODE

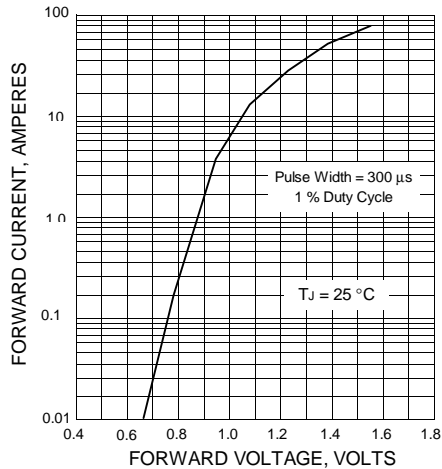


FIG.4 - TYPICAL REVERSE CHARACTERISTICS PER DIODE

