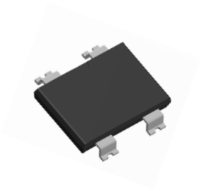
VOLTAGE RANGE
200 to 1000 Volts
CURRENT
6.0 Ampere

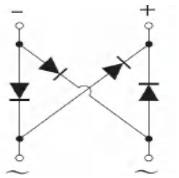
FEATURES

- Surface mount bridge, small package;
- Ideal for printed circuit boards;
- Glass passivated chip junction;
- High forward current capability up to 5.0A;
- High surge current capability;
- High heat dissipation capability;
- Low profile package;
- Low forward voltage drop;
- Plastic package has Underwrites Laboratory Flammability Classification 94V-0;

MECHANICAL DATA

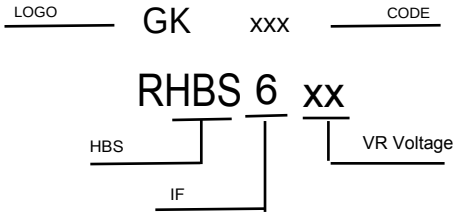
- Case: HBS;
  Epoxy meets UL-94V-0 Flammability rating;
- Terminals:Matte tin plated leads, solderable per J-STD-002 and JESD22-B102;
- High temperature soldering guaranteed:
  Solder Reflow 260℃,10seconds;
- Polarity: As marked on body;
- Marking: Type number;





Internal Schematic





MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

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

Parameter	Symbols	RHBS602	RHBS604	RHBS606	RHBS608	RHBS610	Units
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	200	400	600	800	1000	V
Maximum RMS voltage	V_{RMS}	140	280	420	560	700	V
Maximum DC Blocking Voltage	V_{DC}	200	400	600	800	1000	V
Average Rectified Output Current	I_O	6.0					A
Peak Forward Surge Current 8.3 ms Single Half Sine Wave Superimposed on Rated Load (JEDEC Method)	I_{FSM}	170					A
I^2t Rating for Fusing	I^2t	120					A^2S
Maximum Forward Voltage at 1.0 A	V_F	0.95 (max.)					V
Maximum Forward Voltage at 6.0 A	V_F	1.3					V
Maximum DC Reverse Current @T_A=25 °C at Rated DC Blocking Voltage @T_A=125 °C	I_R	0.16 100					μA
Maxumum reverse recovery time (IF=0.5A,IR=1.0A,Irr=0.25A)	Trr	150		250	500		nS
Typical Junction Capacitance (Note1)	C_j	46					pF
Typical Thermal Resistance (Note2)	$R_{\theta JA}$ $R_{\theta JC}$ $R_{\theta JL}$	72.0 14.0 12.0					°C/W
Operating and Storage Temperature Range	T_j, T_{stg}	-55 ~ +150					°C

Note: 1. Measured at 1MHz and applied reverse voltage of 4 V D.C.
2. Mounted on glass epoxy PC board with 4×1.5"×1.5" (3.81×3.81 cm) copper pad.

RATING AND CHARACTERISTIC CURVES

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

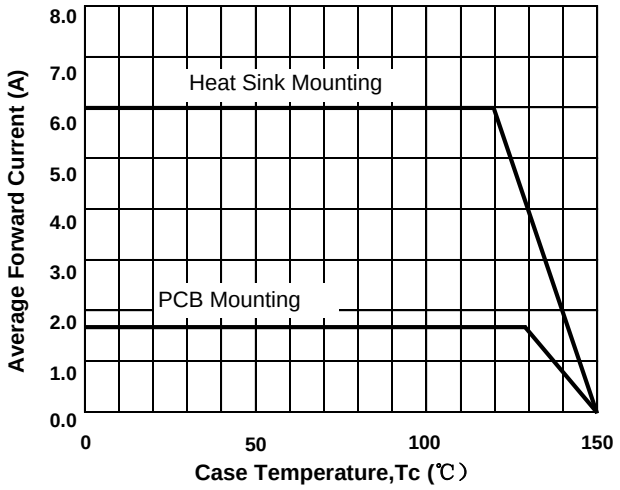


FIG.2-TYPICAL FORWARD CHARACTERISTICS PER DIODE

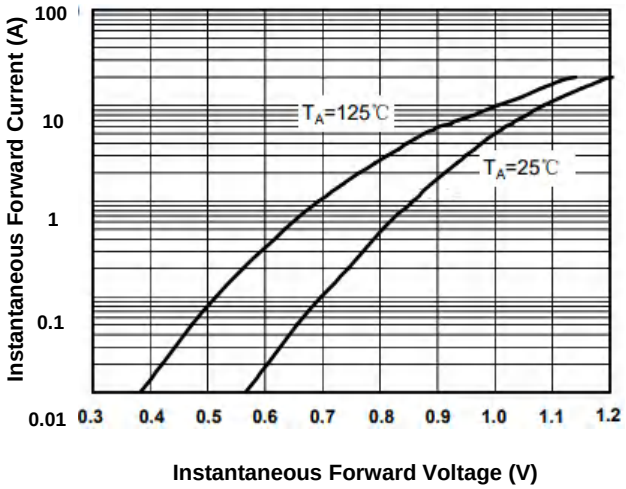


FIG.3 - TYPICAL REVERSE CHARACTERISTICS

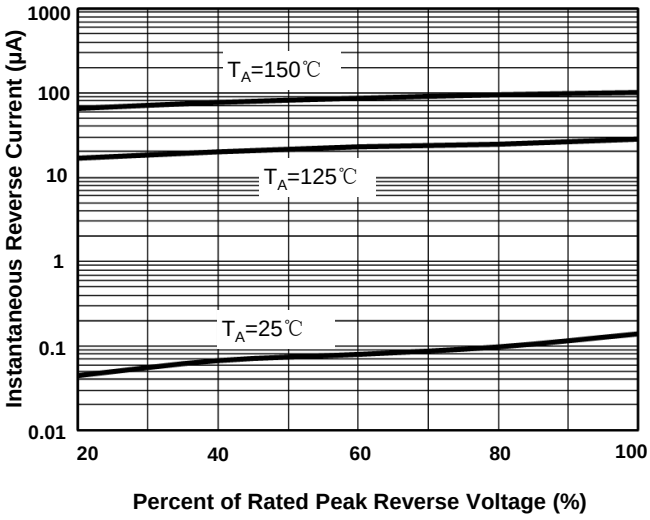


FIG.4-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT PER DIODE

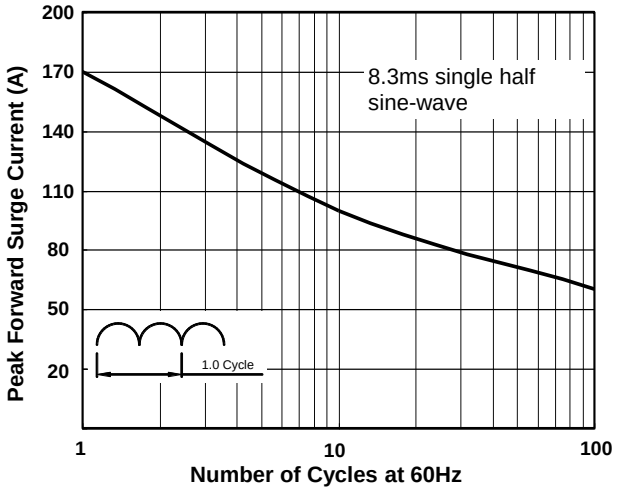
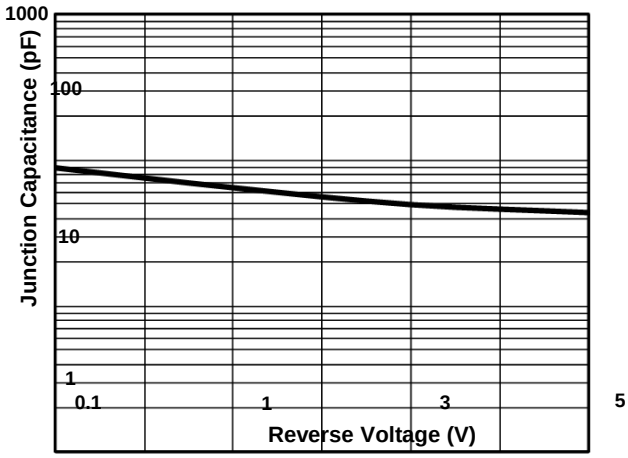


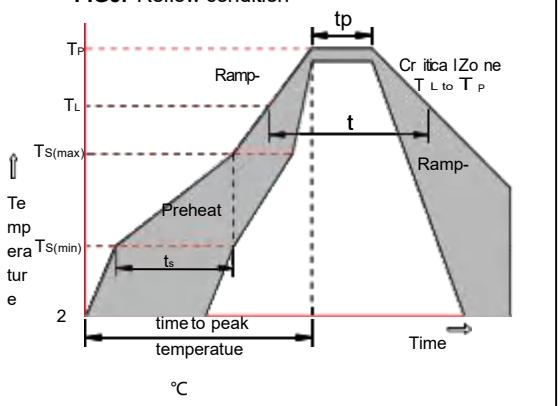
FIG.5 Typical Junction Capacitance per Diode



Soldering parameters

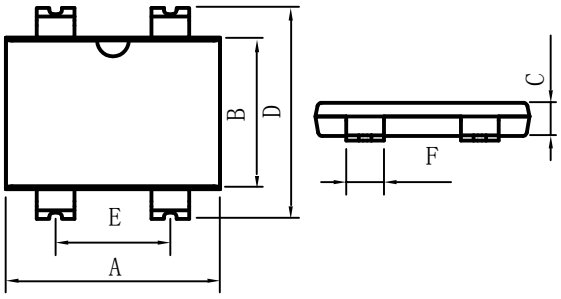
Reflow Condition		Pb-Free assembly (see as bellow)
Pre Heat	-Temperature Min ($T_{s(min)}$)	+150℃
	-Temperature Max($T_{s(max)}$)	+200℃
	-Time (Min to Max) (ts)	60-180 secs.
Average ramp up rate (Liquid us Temp (T_L) to peak)		3℃/sec. Max
$T_{s(max)}$ to T_L - Ramp-up Rate		3℃/sec. Max
Reflow	-Temperature(T_L)(Liquid us)	+217℃
	-Temperature(t_L)	60-150 secs.
Peak Temp (T_p)		+260(+0/-5)℃
Time within 5℃ of actual Peak Temp (t_p)		30 secs. Max
Ramp-down Rate		6℃/sec. Max
Time 25℃ to Peak Temp (T_P)		8 min. Max
Do not exceed		+260℃

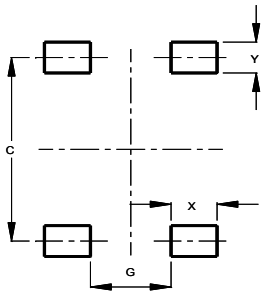
FIG5: Reflow condition



Package Dimensions & Suggested Pad Layout

HBS



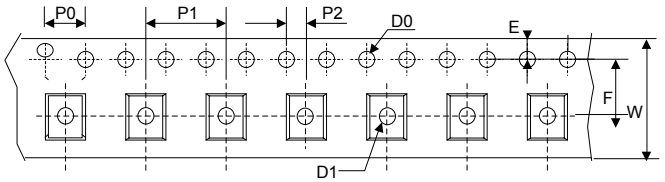


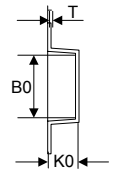
HBS				
DIM	INCHES		MM	
	MIN	MAX	MIN	MAX
A	0.39	0.41	10.0	10.4
B	0.28	0.30	7.0	7.5
C	0.06	0.06	1.45	1.65
D	0.38	0.40	9.7	10.2
E	0.19	0.22	4.9	5.6
F	0.07	0.07	1.7	1.9

Dimensions	Value (in mm)
C	8.92
G	3.50
X	2.00
Y	1.50

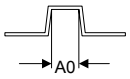
Tape & rell specification

Tape



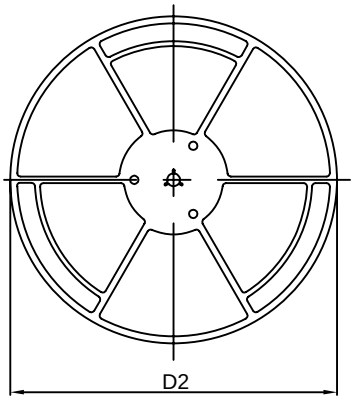


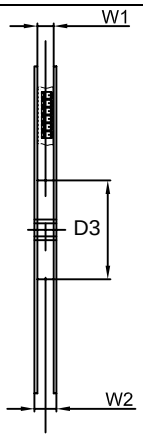
SECTION : B-B



SECTION : A-A

13” Reel







Symbol	Dimension (mm)
P0	4.00±0.20
P1	12.00±0.20
P2	2.00±0.20
D0	1.55±0.15
D1	1.55±0.20
E	1.75±0.20
F	11.50±0.20
W	24.00±0.20
A0	11.40±0.20
B0	11.20±0.20
K0	2.20±0.20
T	0.30±0.10
D2	330.0±5.0
D3	100.0±4.0
W1	24.0±5.0
W2	27.0±5.0
I	13.0±2.0

Quantity: 2500PCS