



/ Revised record

A	2021-4-2	all	W01		

/ Descriptions

50~1000V

15A GBJ

Glass Passivated Bridge Rectifiers, Reverse Voltage:50~1000V,Forward Current:15A,GBJ package.

/ Features

PCB

UL

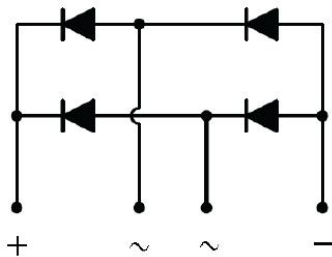
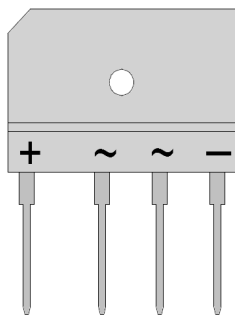
94V-0

Ideal for printed circuit board, Case material molded plastic, The plastic material has U/L flammability classification 94V-0, Halogen free product.

/ Applications

一般用途.

General purpose.

/ Equivalent Circuit**/ Pinning**

1 2 3 4

PIN1 DC+ PIN2 AC PIN3 AC PIN4 DC-

/ h_{FE} Classifications & Marking

See Marking Instructions



/ Absolute Maximum Ratings(Ta=25)

参数 Parameter	符号 Symbol	数值 Rating							单位 Unit
		GBJ 15005	GBJ 1501	GBJ 1502	GBJ 1504	GBJ 1506	GBJ 1508	GBJ 1510	
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	50	100	200	400	600	800	1000	V
Maximum RMS Voltage	V_{RMS}	35	70	140	280	420	560	700	V
Maximum DC Blocking Voltage	V_{DC}	50	100	200	400	600	800	1000	V
Maximum Average Forward Rectified Current (with heatsink Note 2)	$I_{F(AV)}$	15							A
Peak Forward Surge Current 8.3ms Single Half Sine-Wave Super Imposed on Rated Load (JEDEC Method)	I_{FSM}	200							A
I^2t Rating for Fusing ($t < 8.3ms$)	I^2t	166							A ² s
Typical Junction Capacitance Per Element (Note1)	C_J	66							pF
Typical Thermal Resistance (Note2)	$R_{\theta Jc}$	2.3							°C/W
Operating Temperature Range	T_j	-55 to +150							°C
Storage Temperature Range	T_{stg}	-55 to +150							°C

NOTE:

1. Measured at 1.0MHz and applied reverse voltage of 4.0V DC.
2. Device mounted on 150mm*150mm*1.6mm Cu Plate Heatsink.

/ Electrical Characteristics(Ta=25)

参数 Parameter	符号 Symbol	测试条件 Test Conditions	数值 Rating	单位 Unit
Maximum Forward Voltage	V_F	$I_F = 7.5A$	1.0	V
Maximum DC Reverse Current at Rated DC Blocking Voltage	I_R	$T_a = 25^\circ C$	5.0	μA
		$T_a = 125^\circ C$	500	

/ Electrical Characteristic Curve

FIG.1-FORWARD CURRENT DERATING CURVE

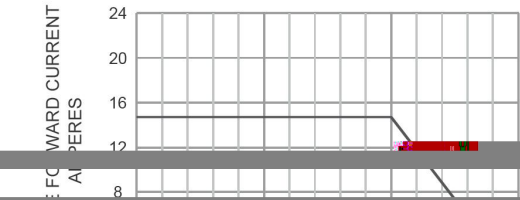
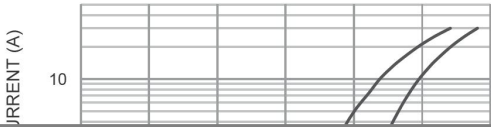
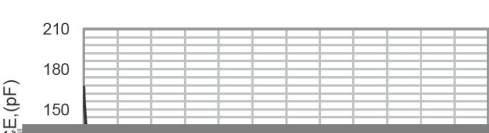
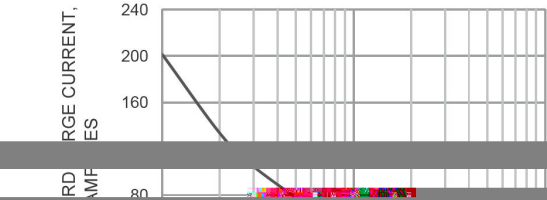


FIG.2-MAXIMUM FOWARD SURGE CURRENT



Tj=25°C

0.1

1

10

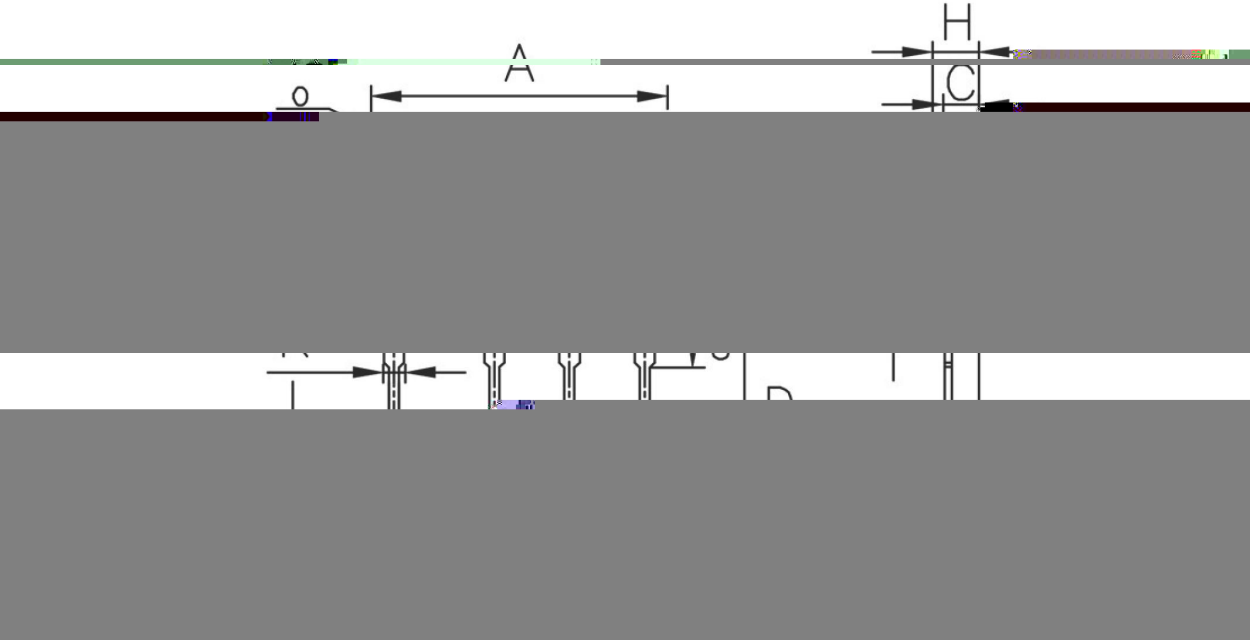
GE CURRE

1

0.1

/ Package Dimensions

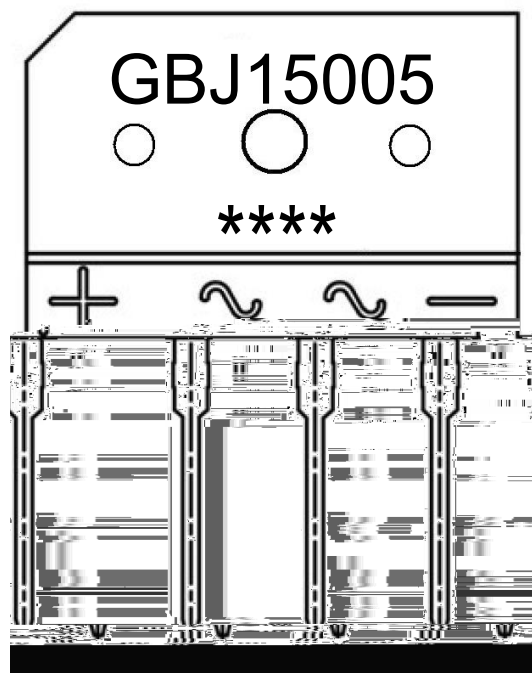
GBJ Package Outline Dimensions



GBJ mechanical data															
UNIT	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O



/ Marking Instructions

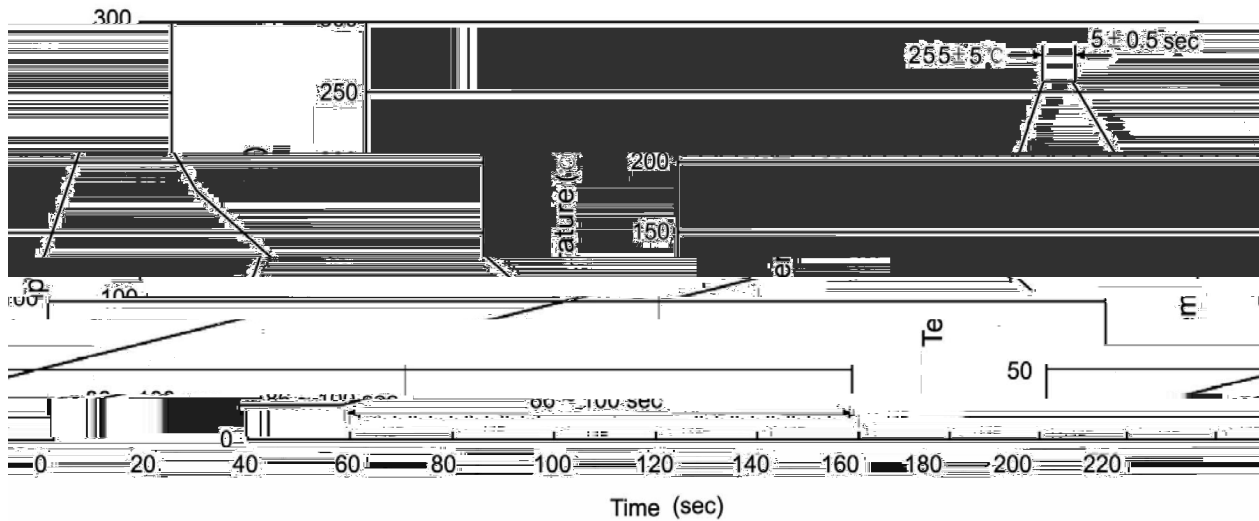


GBJ15005

Note:

GBJ15005: Product Type.
****: Lot No. Code, code change with Lot No.

() / Temperature Profile for Dip Soldering(Pb-Free)



Note:

- | | | | | | |
|---|-------|-----|-----------|--------|--|
| 1 | 25 | 150 | 60 | 90sec; | 1.Preheating:25~150°C, Time:60~90sec. |
| 2 | 255±5 | | 5±0.5sec; | | 2.Peak Temp.:255±5°C, Duration:5±0.5sec. |
| 3 | | 2 | 10°C/sec. | | 3. Cooling Speed: 2~10°C/sec. |

/ Resistance to Soldering Heat Test Conditions

270±5°C 10±1 sec. Temp.:270±5°C Time:10±1 sec

/ Packaging SPEC.

/ BULK

Package Type	Units			Dimension (unit mm ³)	
	Units/Inner Box 只/盒	Inner Boxes/Outer Box 盒/箱	Units/Outer Box 只/箱	Inner Box	Outer Box
GBJ	200	10	2000	306 X 108 X 42	322 X 246 X 252

/ TUBE

Package Type	Units					Dimension (unit mm ³)		
	Units/Tube 只/套管	Tubes/Inner Box 套管/盒	Units/Inner Box 只/盒	Inner Boxes/Outer Box 盒/箱	Units/Outer Box 只/箱	Tube	Inner Box	Outer Box
GBJ	15	50	750	2	1500	473 X 42.5 X 6.8	490X 201 X 104	505 X 225 X 235

/ Notices