

Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from, Europe, America and south Asia, supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts, Customers Priority, Honest Operation, and Considerate Service", our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip, ALPS, ROHM, Xilinx, Pulse, ON, Everlight and Freescale. Main products comprise IC, Modules, Potentiometer, IC Socket, Relay, Connector. Our parts cover such applications as commercial, industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



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## 2A, 50V - 800V Glass Passivated Single-Phase Bridge Rectifiers

#### **FEATURES**

- Ideal for printed circuit board
- High case dielectric strength
- High surge current capability
- UL Recognized File # E-326243
- Compliant to RoHS Directive 2011/65/EU and in accordance to WEEE 2002/96/EC
- Halogen-free according to IEC 61249-2-21







#### **MECHANICAL DATA**

Case: GBL

Molding compound, UL flammability classification rating 94V-0

Part no. with suffix "H" means AEC-Q101 qualified

Packing code with suffix "G" means green compound (halogen-free)

Terminal: Matte tin plated leads, solderable per JESD22-B102

Meet JESD 201 class 2 whisker test

**Polarity:** As marked **Weight:** 2 g (approximately)

H	•	<b>—</b>	
+	$\downarrow$	<del> </del>	-

**GBL** 

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS (T <sub>A</sub> =25°C unless otherwise noted)								
PARAMETER	SYMBOL	D2SB	D2SB	D2SB	D2SB	D2SB	D2SB	UNIT
PANAMETEN		05	10	20	40	60	80	
Maximum repetitive peak reverse voltage	$V_{RRM}$	50	100	200	400	600	800	V
Maximum RMS voltage	$V_{RMS}$	35	70	140	280	420	560	V
Maximum DC blocking voltage	$V_{DC}$	50	100	200	400	600	800	V
Maximum average forward rectified current	I <sub>F(AV)</sub>	2						Α
Peak forward surge current, 8.3 ms single half sinewave superimposed on rated load	I <sub>FSM</sub>	80					Α	
Rating of fusing ( t<8.3ms)	l <sup>2</sup> t	26						A <sup>2</sup> s
Maximum instantaneous forward voltage (Note 1) $I_F$ = 2 A	V <sub>F</sub>	1.1					V	
Maximum reverse current @ rated V <sub>R</sub>	1	10						μΑ
T <sub>J</sub> =125°C	I <sub>R</sub>	500						
Typical thermal resistance	$R_{\theta JL}$	10					°C/W	
i ypicai tileimai resistance	$R_{\theta JA}$	47						
Operating junction temperature range	$T_J$	- 55 to +150					°C	
Storage temperature range	T <sub>STG</sub>	- 55 to +150				°C		

Note 1: Pulse test with PW=300µs, 1% duty cycle



ORDERING INFORMATION						
PART NO.	PART NO. SUFFIX	PACKING CODE	PACKING CODE SUFFIX <sup>(*)</sup>	PACKAGE	PACKING	
D2SBxx (Note 1)	Н	C2		GBL	25 / Tube	
		X0	G	GBL	25 / Tube / Forming	
		D2		GBL	25 / Tube	

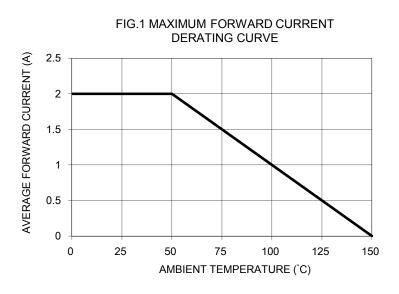
Note 1: "xx" defines voltage from 50V (D2SB05) to 800V (D2SB80)

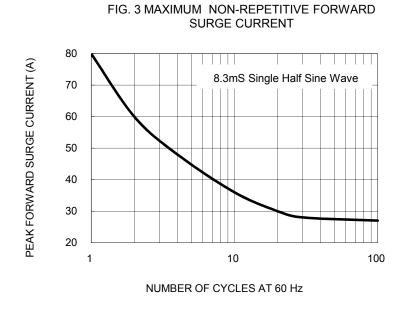
<sup>\*:</sup> Optional available

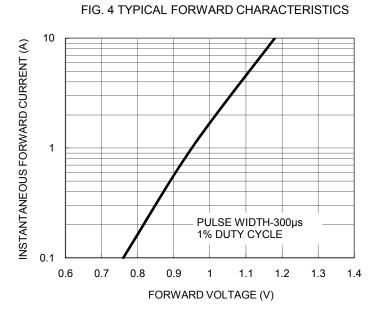
EXAMPLE							
PREFERRED P/N	PART NO. PACKING COL		PACKING CODE	PACKING CODE SUFFIX	DESCRIPTION		
D2SB80HC2G	D2SB80	Н	C2	G	AEC-Q101 qualified Green compound		

### **RATINGS AND CHARACTERISTICS CURVES**

(T<sub>A</sub>=25°C unless otherwise noted)

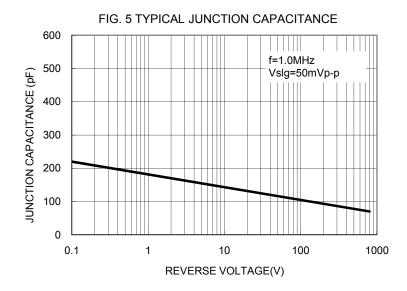




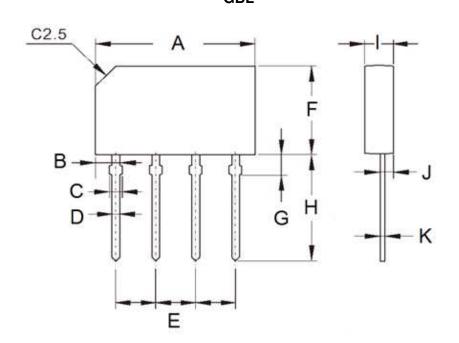


Document Number: DS\_D1408052





# PACKAGE OUTLINE DIMENSIONS GBL



DIM.	Unit	(mm)	Unit (inch)		
	Min	Max	Min	Max	
Α	19.70	20.30	0.776	0.799	
В	2.30	2.70	0.091	0.106	
С	1.30	2.00	0.051	0.079	
D	0.90	1.10	0.035	0.043	
Е	4.80	5.20	0.189	0.205	
F	10.70	11.30	0.421	0.445	
G	2.30	2.70	0.091	0.106	
Н	13.00	14.00	0.512	0.551	
I	3.30	3.70	0.130	0.146	
J	0.80	1.20	0.031	0.047	
K	0.40	0.60	0.016	0.024	

### **MARKING DIAGRAM**



P/N = Specific Device Code G = Green Compound

YWW = Date Code F = Factory Code





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Document Number: DS\_D1408052 Version: J15