

Bridge Rectifiers

Features

- Glass passivated junction
- Ideal for printed circuit board application
- High surge current capability
- Meets MSL level1, per J-STD-020, LF maximum peak of 260°C

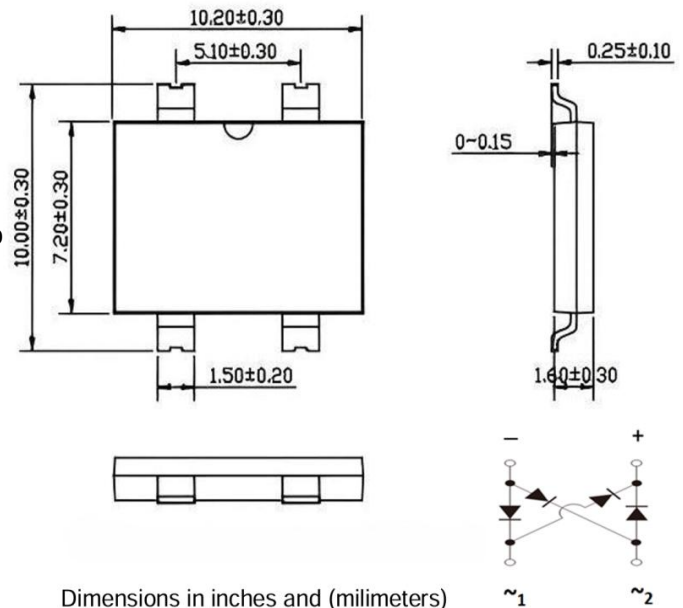
Typical Applications

General purpose use in AC/DC bridge full wave rectification for SMPS, lighting ballast, adapter, battery charger, home appliances, office equipment, and telecommunication applications.

Mechanical Data

- Package: HBS
Molding compound meets UL 94 V-0 flammability rating, RoHS-compliant, Halogen-free
- Terminals: Tin plated leads, solderable per J-STD-002 and JESD22-B102
- Polarity: As marked on body

Package : HBS



Dimensions in inches and (millimeters)

Maximum Ratings (Ta=25°C Unless otherwise specified)

Parameter		Symbol	HBS808L		unit
Maximum repetitive peak reverse voltage		V _{RRM}	800		V
Maximum RMS bridge input voltage		V _{RMS}	565		V
Maximum DC blocking voltage		V _{DC}	800		V
Average rectified output current @60HZ sine wave, R-load, Tc=80℃		I _O	8.0		A
Instantaneous forward voltage drop per diode	I _{FM} =1.0A	V _F	0.81 Typ.	0.83 Max.	V
	I _{FM} =4.0A		0.89 Typ.	0.91 Max.	
	I _{FM} =8.0A		0.93 Typ.	0.97 Max.	
Forward Surge Current (Non-repetitive) @60Hz Half-sine wave,1 cycle, Tj=25℃		I _{FSM}	200		A
Forward Surge Current (Non-repetitive) @1ms square wave,1 cycle, Tj=25℃			400		
Maximum DC reverse current at ratde TA=25℃		I _R	5		μA
DC blocking voltage per element TA=125℃			100		
Rating for fusing(t<8.3ms)		I ² t	166.0		A ² sec
Thermal resistance	Between Junction and Ambient	R _{eJ-A}	55		℃/w
	Between Junction and Lead	R _{eJ-L}	10		
	Between Junction and Case	R _{eJ-C}	6		
Operating junction and stroage temperature range		T _J ,	-55to+150		℃
		T _{STG}			

■ Characteristics (Typical)

FIG1: I_o-T_c Curve

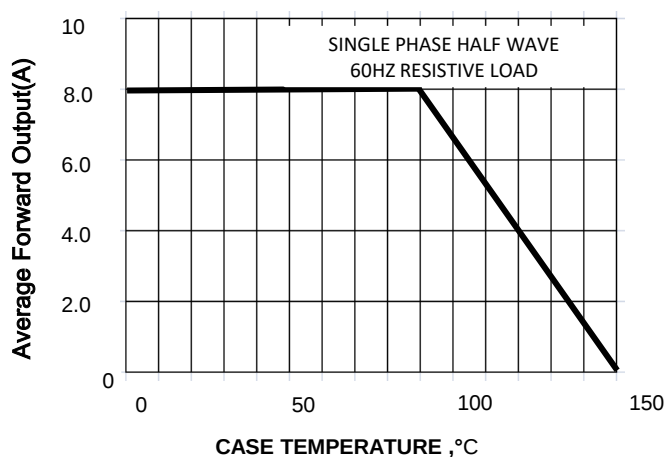


FIG2: Surge Forward Current Capability

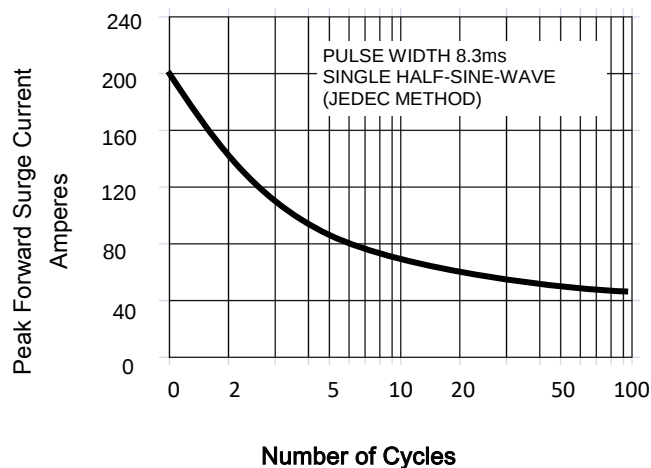


FIG3: Typical Reverse Characteristics

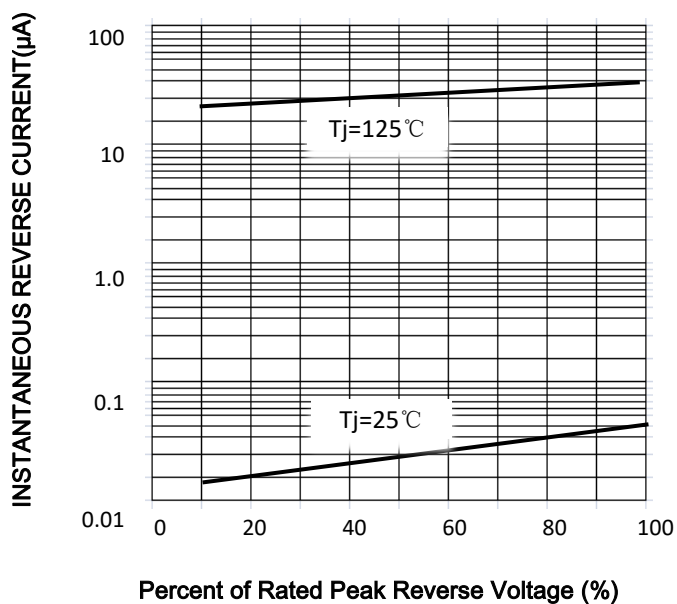
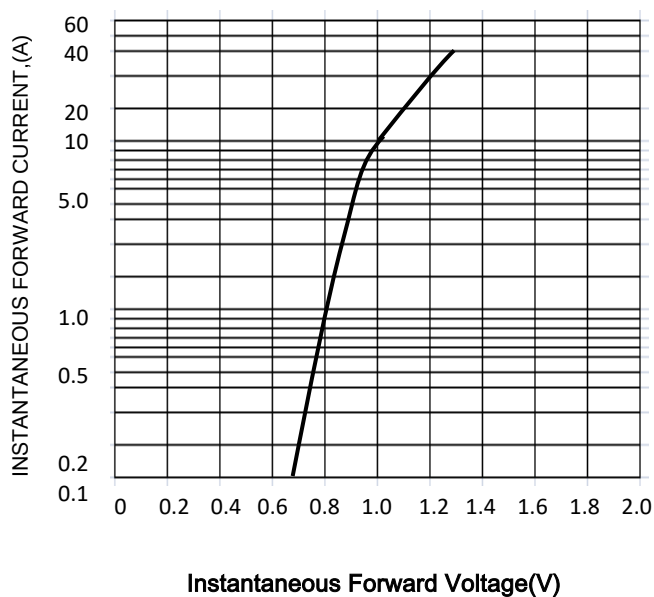


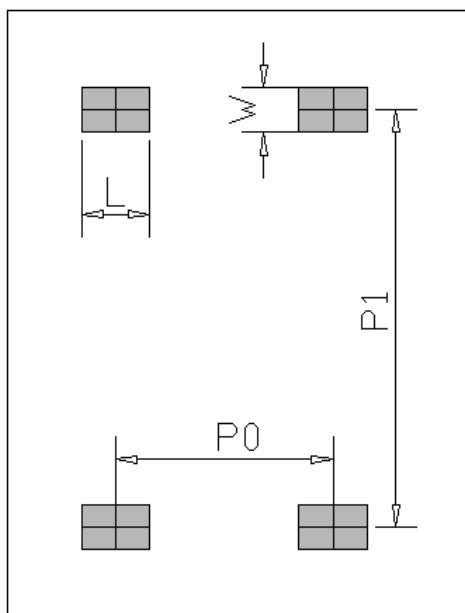
FIG4: Typical Forward Voltage



■ Ordering Information(Example)

PREFREN P/N	UNIT WEIGHT(g)	MINIMUM PACKAGE(pcs)	INNER BOX QUANTITY(pcs)	OUTER CARTON QUANTITY(pcs)	DELIVERY MODE
HBS808L	Approximate 0.38	2500	5000	20000	13"Reel

Suggested pad layout



Unit:mm	
DIM	MIN
P0	5.00
P1	9.25
L	1.50
W	1.00

Dimensions in millimeters