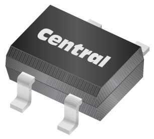
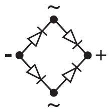
CBRHD-01

SURFACE MOUNT
HIGH DENSITY
0.8 AMP
SILICON BRIDGE RECTIFIER

HD BRIDGE





HD DIP CASE

- This series is UL listed: file number E130224

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DESCRIPTION:

The CENTRAL SEMICONDUCTOR CBRHD-01 is a silicon full wave bridge rectifier mounted in a durable epoxy surface mount molded case, utilizing glass passivated chips.

MARKING CODE: CBD1

FEATURES:

- Efficient use of board space: requires only 42mm^2 of board space vs. 120mm^2 of board space needed for industry standard 1.0 Amp surface mount bridge rectifier.
- 50% higher density (Amps/mm^2) than the industry standard 1.0 Amp surface mount bridge rectifier.
- Glass passivated chips for high reliability.

MAXIMUM RATINGS: (T_A=25°C unless otherwise noted)	**SYMBOL**		**UNITS**
Peak Repetitive Reverse Voltage	V_{RRM}	100	V
DC Blocking Voltage	V_R	100	V
RMS Reverse Voltage	$V_{R(RMS)}$	70	V
Average Forward Current (T_A=40°C) (Note1)	I_O	0.5	A
Average Forward Current (T_A=40°C) (Note 2)	I_O	0.8	A
Peak Forward Surge Current	I_{FSM}	30	A
Operating and Storage Junction Temperature	T_J, T_{stg}	-65 to +150	°C
Thermal Resistance (Note 3)	Θ_{JA}	85	°C/W

ELECTRICAL CHARACTERISTICS PER DIODE: (T_A=25°C unless otherwise noted)

SYMBOL	**TEST CONDITIONS**	**TYP**	**MAX**	**UNITS**
I_R	V_R= 100V		5.0	µA
I_R	V_R= 100V, T_A=125°C		500	µA
V_F	I_F=400mA		1.0	V
C_J	V_R=4.0V, f=1.0MHz	9.0		pF

Notes: (1) Mounted on Glass-Epoxy PCB.
(2) Mounted on Ceramic PCB.
(3) Mounted on PCB with 0.5” x 0.5” copper pads.

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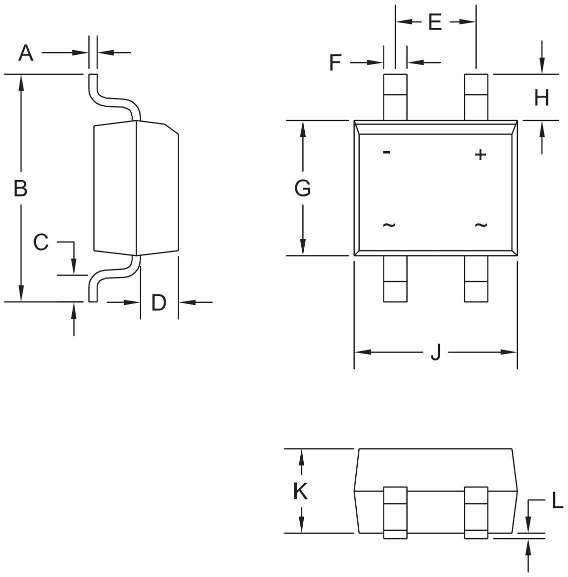
HD DIP CASE - MECHANICAL OUTLINE



R2

DIMENSIONS				
	INCHES		MILLIMETERS	
SYMBOL	MIN	MAX	MIN	MAX
A	0.006	0.014	0.15	0.35
B	-	0.275	-	7.00
C	0.027	0.043	0.70	1.10
D	0.035	0.051	0.90	1.30
E	0.090	0.106	2.30	2.70
F	0.019	0.031	0.50	0.80
G	0.150	0.165	3.80	4.20
H	0.051	0.067	1.30	1.70
J	0.177	0.193	4.50	4.90
K	0.090	0.106	2.30	2.70
L	0.000	0.008	0.00	0.20

HD DIP (REV: R2)

MARKING CODE: CBD1

R2 (4-January 2010)

OUTSTANDING SUPPORT AND SUPERIOR SERVICES

PRODUCT SUPPORT

Central's operations team provides the highest level of support to insure product is delivered on-time.

- Supply management (Customer portals)
- Inventory bonding
- Consolidated shipping options
- Custom bar coding for shipments
- Custom product packing

DESIGNER SUPPORT/SERVICES

Central's applications engineering team is ready to discuss your design challenges. Just ask.

- Free quick ship samples (2nd day air)
- Online technical data and parametric search
- SPICE models
- Custom electrical curves
- Environmental regulation compliance
- Customer specific screening
- Up-screening capabilities
- Special wafer diffusions
- PbSn plating options
- Package details
- Application notes
- Application and design sample kits
- Custom product and package development

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