

# HRB0103B

Silicon Schottky Barrier Diode  
for Low Voltage High Speed Switching , Rectifying

# HITACHI

ADE-208-491(Z)

Rev 0

Apr. 1997

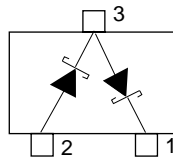
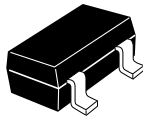
## Features

- Low forward voltage drop and suitable for high efficiency forward current.
- CMPAK package is suitable for high density surface mounting and high speed assembly.

## Ordering Information

Type No.	Laser Mark	Package Code
HRB0103B	E2	CMPAK

## Outline



(Top View)

- 1 Cathode
- 2 Anode
- 3 Cathode  
Anode

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# HRB0103B

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## Absolute Maximum Ratings (Ta = 25°C) \*1

Item	Symbol	Value	Unit
Repetitive peak reverse voltage	$V_{RRM}$	30	V
Average rectified current	$I_o^{*2}$	100	mA
Non-Repetitive peak forward surge current	$I_{FSM}^{*3}$	3	A
Junction temperature	Tj	125	°C
Storage temperature	Tstg	-55 to +150	°C

Note: 1. Per one device

Note: 2. See Fig.5, Two device total

Note: 3. 10msec sine wave 1 pulse

## Electrical Characteristics (Ta = 25°C)

Item	Symbol	Min	Typ	Max	Unit	Test Condition
Forward voltage	$V_F$	—	—	0.44	V	$I_F = 100\text{ mA}$
Reverse current	$I_R$	—	—	50	$\mu\text{A}$	$V_R = 30\text{V}$

Main Characteristic

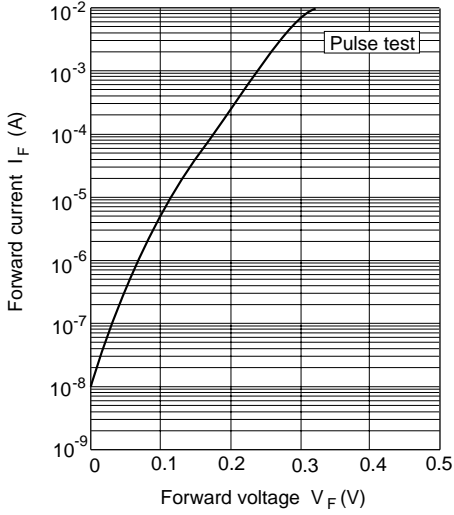


Fig.1 Forward current Vs. Forward voltage

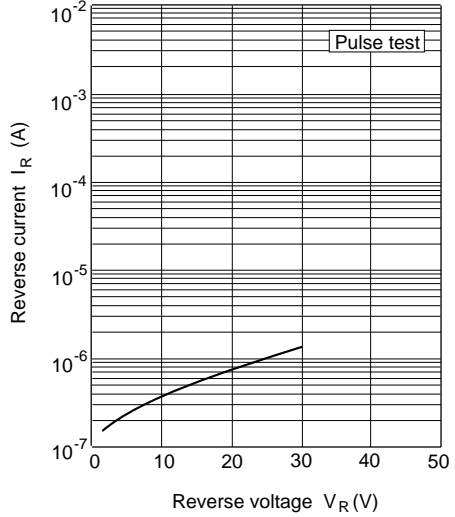


Fig.2 Reverse current Vs. Reverse voltage

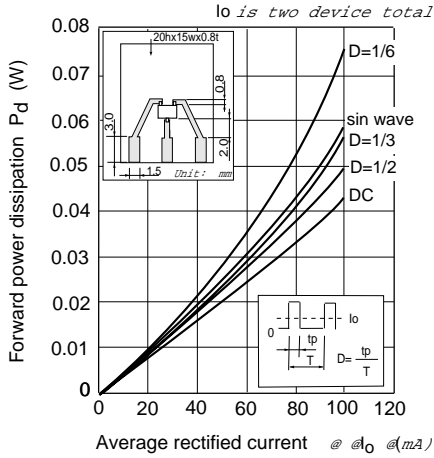


Fig3. Forward power dissipation Vs. Average rectified current

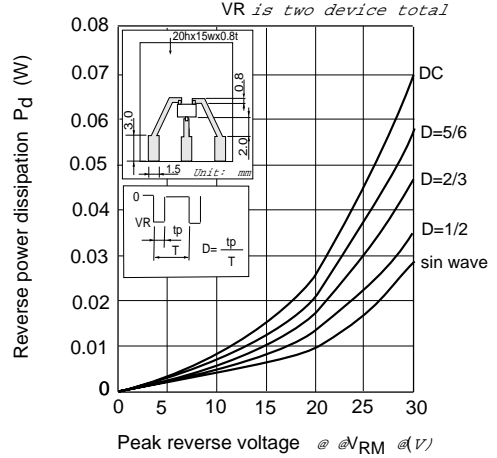


Fig4. Reverse power dissipation Vs. Peak reverse voltage

## Main Characteristic

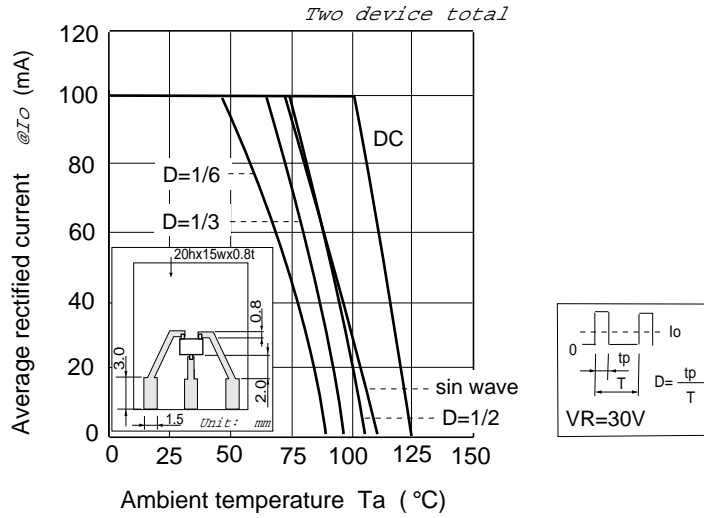
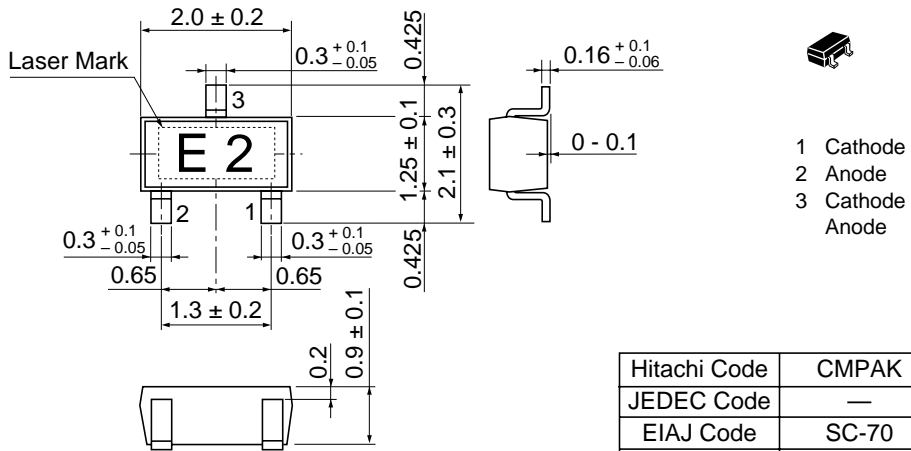


Fig.5 Average rectified current Vs. Ambient temperature

Package Dimensions

Unit : mm



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## Hitachi, Ltd.

Semiconductor & Integrated Circuits.  
Nippon Bldg., 2-6-2, Ohte-machi, Chiyoda-ku, Tokyo 100-0004, Japan  
Tel: Tokyo (03) 3270-2111 Fax: (03) 3270-5109

URL      North America      : <http://semiconductor.hitachi.com/>  
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## For further information write to:

Hitachi Semiconductor  
(America) Inc.  
179 East Tasman Drive,  
San Jose, CA 95134  
Tel: <1> (408) 433-1990  
Fax: <1> (408) 433-0223

Hitachi Europe GmbH  
Electronic components Group  
Dornacher Straße 3  
D-85622 Feldkirchen, Munich  
Germany  
Tel: <49> (89) 9 9180-0  
Fax: <49> (89) 9 29 30 00

Hitachi Europe Ltd.  
Electronic Components Group.  
Whitebrook Park  
Lower Cookham Road  
Maidenhead  
Berkshire SL6 8YA, United Kingdom  
Tel: <44> (1628) 585000  
Fax: <44> (1628) 778322

Hitachi Asia Pte. Ltd.  
16 Collyer Quay #20-00  
Hitachi Tower  
Singapore 049318  
Tel: 535-2100  
Fax: 535-1533

Hitachi Asia Ltd.  
Taipei Branch Office  
3F, Hung Kuo Building, No.167,  
Tun-Hwa North Road, Taipei (105)  
Tel: <886> (2) 2718-3666  
Fax: <886> (2) 2718-8180

Hitachi Asia (Hong Kong) Ltd.  
Group III (Electronic Components)  
7/F., North Tower, World Finance Centre,  
Harbour City, Canton Road, Tsim Sha Tsui,  
Kowloon, Hong Kong  
Tel: <852> (2) 735 9218  
Fax: <852> (2) 730 0281  
Telex: 40815 HITEC HX

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