

# SMD Schottky Barrier Rectifier

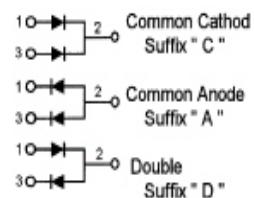
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## CDBD1530 Thru CDBD1560

**Reverse Voltage: 20 - 60 Volts**  
**Forward Current: 15.0 Amp**

### Features

Low forward voltage  
Low Switching noise  
High surge capacity  
Lower power loss & high efficiency  
Similar size to instrial TO-220 package  
Plastic package has Underwriters Lab.  
flammability classification 94V-0  
Guarentee reverse avalanche  
Guard-ring for transient protection

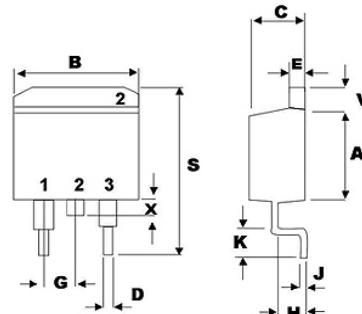


### Mechanical data

Case: JEDEC DO-263AB molded plastic  
Terminals: solderable per MIL-STD-750,  
method 2026

Approx. Weight: 2.24 gram

TO-263AB (D2-PAK)



Unit: millimeter

	A	B	C	D	E	G	H	J	K	S	V	X
MIN	8.12	9.90	4.23	0.51	1.27	2.54	2.03	0.30	2.29	14.60	1.57	----
Max	8.92	10.30	4.83	0.89	1.53	BSC	2.79	0.50	2.90	15.88	1.83	1.40

### Maximum Ratings and Electrical Characteristics

Parameter	Symbol	CDBD1530	CDBD1540	CDBD1545	CDBD1550	CDBD1560	Unit
Max.Repetitive Peak Reverse Voltage	V <sub>RRM</sub>	30	40	45	50	60	V
Max. DC Blocking Voltage	V <sub>DC</sub>	30	40	45	50	60	V
Max. RMS Voltage	V <sub>RMS</sub>	21	28	32	35	42	V
Peak Surge Forward Current 8.3ms single halfsine-wave superimposed on rateload ( JEDEC method )	I <sub>FSM</sub>			150			A
Max. Average Forward Current	I <sub>o</sub>			15			A
Max. Forward Current at 7.5A T <sub>j</sub> =25°C T <sub>j</sub> =100°C	V <sub>F</sub>		0.55 0.48		0.65 0.57		V
Max. DC Reverse Current at Rated DC Blocking Voltage T <sub>a</sub> =25°C T <sub>a</sub> =100°C	I <sub>R</sub>			1.0 50			mA
Typical Thermal Resistance (Note 1)	R <sub>θJC</sub>			30			°C/W
Operating Junction temperature	T <sub>j</sub>			-50 to +125			°C
Storage Temperature	T <sub>STG</sub>			-65 to +150			°C

Note 1: Thermal resistance from junction to Case.

## Rating and Characteristic Curves (CDBD1630 Thru CDBD1660)

Fig. 1 - Reverse characteristics

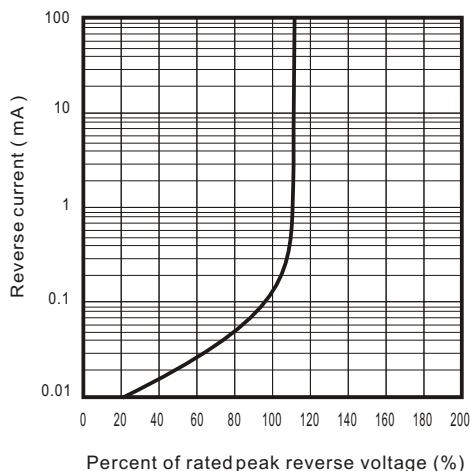


Fig.2 - Forward characteristics

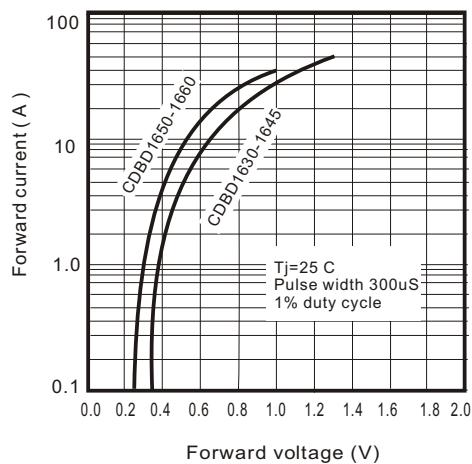


Fig. 3 - Junction capacitance

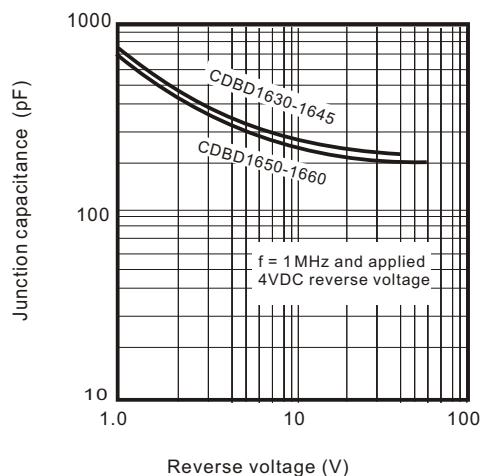


Fig. 4 - Current derating curve

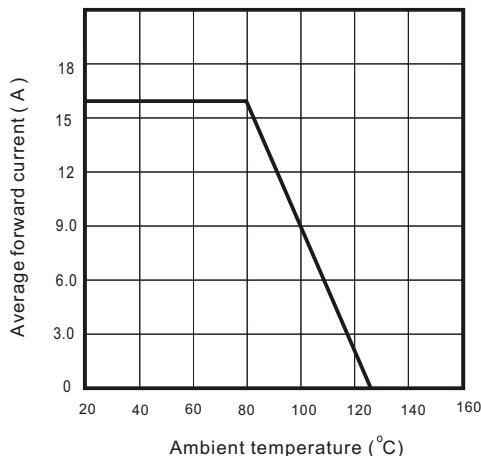


Fig. 5 - Non repetitive forward surge current

