

# SB1020CT – SB10100CT

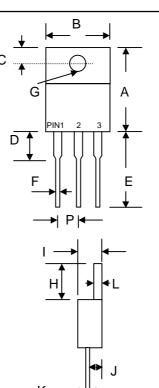
# **10A DUAL SCHOTTKY BARRIER RECTIFIER**

### Features

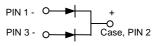
- Schottky Barrier Chip
- Guard Ring for Transient Protection
- Low Forward Voltage Drop
- Low Reverse Leakage Current
- High Surge Current Capability
- Plastic Material has UL Flammability Classification 94V-O

#### **Mechanical Data**

- Case: TO-220, Molded Plastic
- Terminals: Plated Leads Solderable per MIL-STD-202, Method 208
- Polarity: See Diagram
- Weight: 2.24 grams (approx.)
- Mounting Position: Any
- Mounting Torque: 11.5 cm-kg (10 in-lbs) Max.
- Lead Free: For RoHS / Lead Free Version, Add "-LF" Suffix to Part Number, See Page 4



TO-220					
Dim	Min	Max			
Α	13.90	15.90			
В	9.80	10.70			
С	2.54	3.43			
D	3.56	4.56			
Е	12.70	14.73			
F	0.51	0.96			
G	3.55 Ø	4.09 Ø			
Н	5.75	6.85			
I	4.16	5.00			
J	2.03	2.92			
к	0.30	0.65			
L	1.14	1.40			
Р	2.29	2.79			
All Dimensions in mm					



# Maximum Ratings and Electrical Characteristics @TA=25°C unless otherwise specified

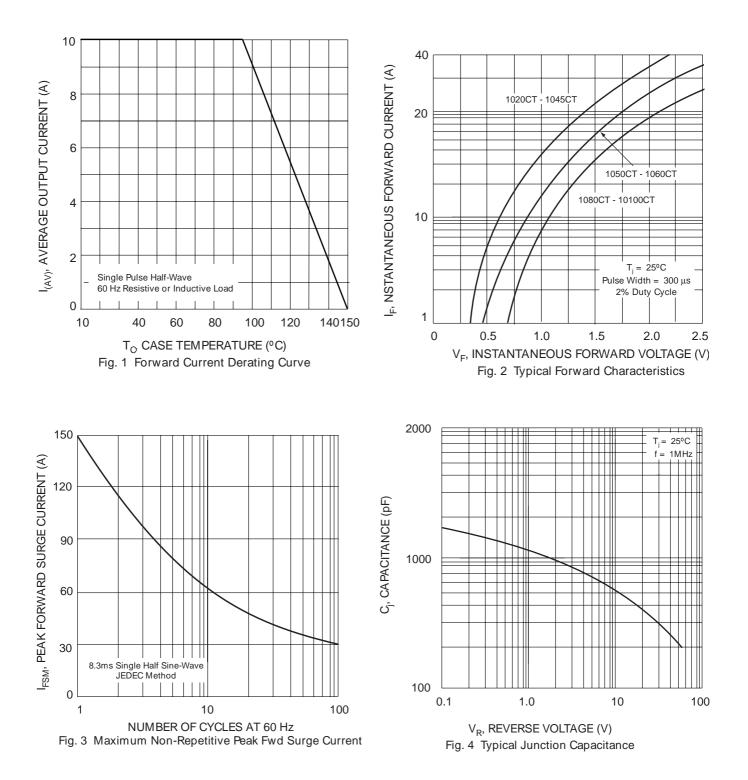
Single Phase, half wave, 60Hz, resistive or inductive load. For capacitive load, derate current by 20%.

Characteristic	Symbol	SB 1020CT	SB 1030CT	SB 1040CT	SB 1045CT	SB 1050CT	SB 1060CT	SB 1080CT	SB 10100CT	Unit
Peak Repetitive Reverse Voltage Working Peak Reverse Voltage DC Blocking Voltage	Vrrm Vrwm Vr	20	30	40	45	50	60	80	100	V
RMS Reverse Voltage	VR(RMS)	14	21	28	32	35	42	56	70	V
Average Rectified Output Current @T <sub>c</sub> = 95°C	lo	10						А		
Non-Repetitive Peak Forward Surge Current 8.3ms Single half sine-wave superimposed on rated load (JEDEC Method)	IFSM	150						A		
Forward Voltage $@I_F = 5.0A$	Vfm	0.55 0.75 0.85				85	V			
Peak Reverse Current $@T_A = 25^{\circ}C$ At Rated DC Blocking Voltage $@T_A = 100^{\circ}C$	<b>I</b> RM	0.5 50			mA					
Typical Junction Capacitance (Note 1)	Cj	700						pF		
Operating and Storage Temperature Range	Тј, Тѕтс	-65 to +150						°C		

Note: 1. Measured at 1.0 MHz and applied reverse voltage of 4.0V D.C.

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# MARKING INFORMATION



WTE	= Manufacturer's Logo			
SB10xxCT	= Device Number			
xx	= 20, 30, 40, 45, 50, 60, 80 or 100			
Polarity	= As Marked on Body			

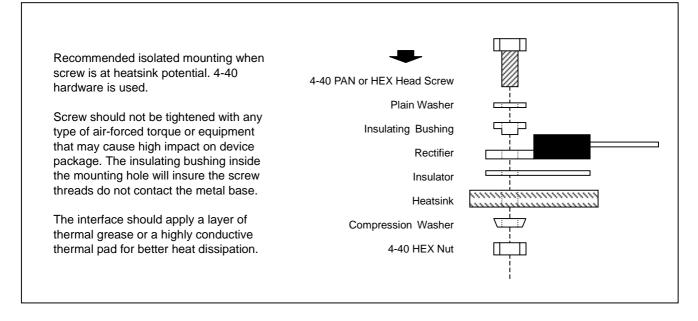
#### PACKAGING INFORMATION

#### BULK

Tube Size	Quantity	Inner Box Size	Quantity	Carton Size	Quantity	Approx. Gross Weight
L x W x H (mm)	(PCS)	L x W x H (mm)	(PCS)	L x W x H (mm)	(PCS)	(KG)
525 x 31 x 6	50	555 x 145 x 95	2,000	572 x 306 x 218	8,000	19.0

Note: 1. Anti-static tube, water clear color.

# **RECOMMENDED SCREW MOUNTING ARRANGEMENT**



#### **ORDERING INFORMATION**

Product No.	Package Type	Shipping Quantity			
SB1020CT	TO-220	50 Units/Tube			
SB1030CT	TO-220	50 Units/Tube			
SB1040CT	TO-220	50 Units/Tube			
SB1045CT	TO-220	50 Units/Tube			
SB1050CT	TO-220	50 Units/Tube			
SB1060CT	TO-220	50 Units/Tube			
SB1080CT	TO-220	50 Units/Tube			
SB10100CT	TO-220	50 Units/Tube			

1. Shipping quantity given is for minimum packing quantity only. For minimum

order quantity, please consult the Sales Department. To order RoHS / Lead Free version (with Lead Free finish), add "-LF" suffix to part number above. For example, SB1020CT-LF. 2.

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