



SB2045LFCT

DUAL HIGH-VOLTAGE SCHOTTKY RECTIFIER

VOLTAGE 45 Volts **CURRENT** 20 Amperes

ITO-220AB

Unit: inch (mm)

FEATURES

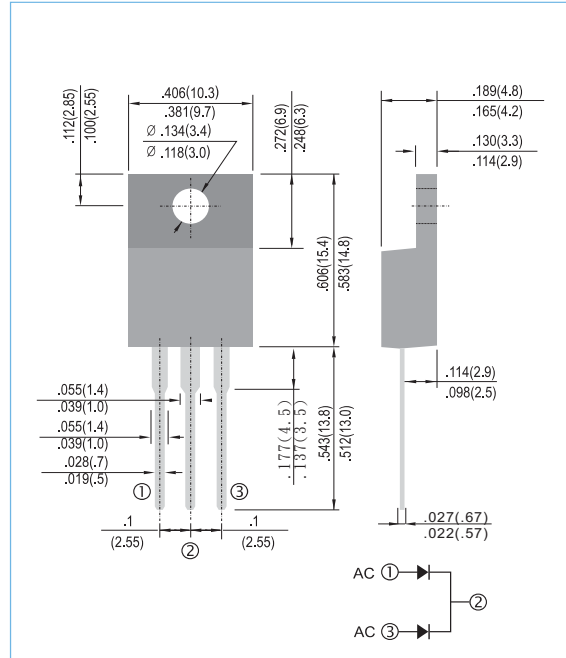
- Low forward voltage drop, low power losses
- High efficiency operation
- Lead free in comply with EU RoHS 2002/95/EC directives

MECHANICAL DATA

Case : ITO-220AB, Plastic

Terminals : Solderable per MIL-STD-750, Method 2026

Weight: 0.055 ounces, 1.5615 grams



MAXIMUM RATINGS($T_A=25^{\circ}\text{C}$ unless otherwise noted)

PARAMETER	SYMBOL	VALUE	UNIT
Maximum repetitive peak reverse voltage	V_{RRM}	45	V
Maximum average forward rectified current	$I_{F(AV)}$	20 10	A
Peak forward surge current 8.3ms single half sine-wave superimposed on rated load per diode	I_{FSM}	145	A
Typical thermal resistance	$R_{\theta JC}$	4.5	$^{\circ}\text{C} / \text{W}$
Operating junction	T_J	-55 to + 125	$^{\circ}\text{C}$
Storage temperature range	T_{STG}	-55 to + 150	$^{\circ}\text{C}$

ELECTRICAL CHARACTERISTICS($T_A=25^{\circ}\text{C}$ unless otherwise noted)

PARAMETER	SYMBOL	TEST CONDITIONS	MIN.	TYP.	MAX.	UNIT
Breakdown voltage	V_{BR}	$I_R=1\text{mA}$	50	-	-	V
Instantaneous forward voltage per diode ⁽¹⁾	V_F	$I_F=5\text{A}$ $I_F=10\text{A}$ $T_J=25^{\circ}\text{C}$	-	0.42 0.46	0.46 0.52	V
Reverse current per diode ⁽²⁾	I_R	$V_R=45\text{V}$ $T_J=25^{\circ}\text{C}$ $T_J=100^{\circ}\text{C}$	-	100	500 100	μA mA

Note.1.Pulse test : 300 μs pulse width, 1% duty cycle

2.Pulse test : pulse width \leq 40ms



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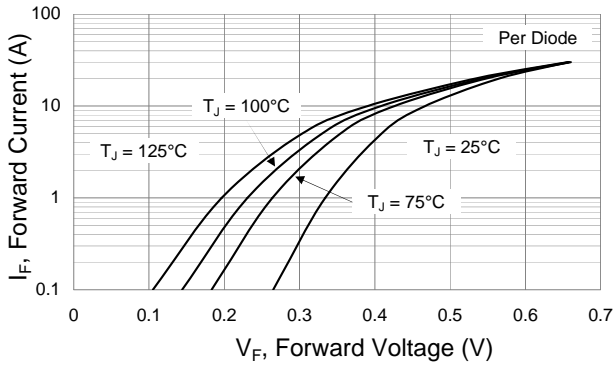


Fig.1 Typical Forward Characteristics

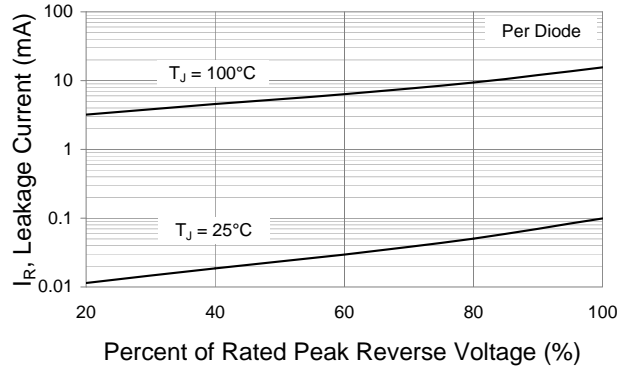


Fig.2 Typical Reverse Characteristics

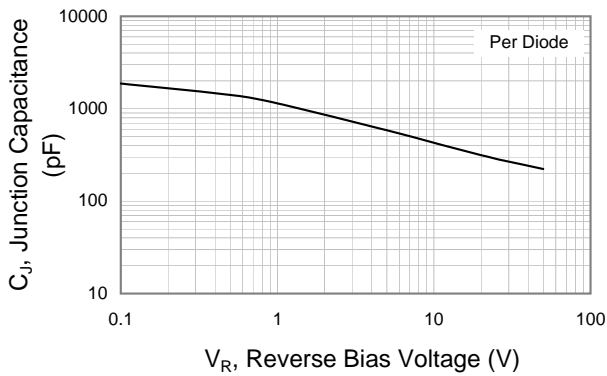


Fig.3 Typical Junction Capacitance

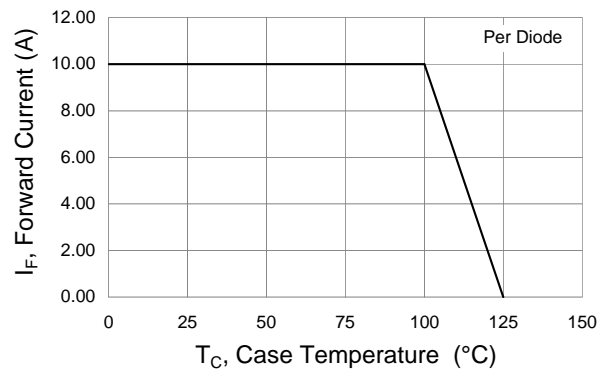


Fig.4 Forward Current Derating Curve



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Part No_packing code_Version

SB2045LFCT_T0_00001

SB2045LFCT_T0_10001

For example :

RB500V-40 **R2** **00001**

Part No.

Serial number

Version code means HF

Packing size code means 13"

Packing type means T/R

Packing Code XX				Version Code XXXXX		
Packing type	1 st Code	Packing size code	2 nd Code	HF or RoHS	1 st Code	2 nd ~5 th Code
Tape and Ammunition Box (T/B)	A	N/A	0	HF	0	serial number
Tape and Reel (T/R)	R	7"	1	RoHS	1	serial number
Bulk Packing (B/P)	B	13"	2			
Tube Packing (T/P)	T	26mm	X			
Tape and Reel (Right Oriented) (TRR)	S	52mm	Y			
Tape and Reel (Left Oriented) (TRL)	L	PANASERT T/B CATHODE UP (PBCU)	U			
FORMING	F	PANASERT T/B CATHODE DOWN (PBCD)	D			



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