

SB3100

3.0A SCHOTTKY BARRIER RECTIFIER

DESCRIPTION

The UTC **SB3100** is a 3.0A schottky barrier rectifier, it uses UTC's advanced technology to provide the customers with high surge capability, high efficiency, high current capability and low forward voltage drop, etc.

The UTC $\ensuremath{\text{SB3100}}$ is suitable for free wheeling and polarity protection, etc.



- * High surge capability
- * High efficiency
- * High current capability
- * Low power loss
- * Low forward voltage drop

SYMBOL

ORDERING INFORMATION

Ordering Number		Packago	Pin Assignment		Dooking	
Lead Free	Halogen Free	Package	1	2	Packing	
SB3100L-Z21D-B	SB3100G-Z21D-B	DO-201AD	K	А	Tape Box	
Note: Pin Assignment: A: Anode						

SB3100L-Z21D-B		
[[1)Pack	ing Type	(1) B: Tape Box
(2)Pack	age Type	(2) Z21D: DO-201AD
(3)Gree	n Package	(3) L: Lead Free, G: Halogen Free and Lead Free

MARKING



Cathode Band for uni-directional Only

L: Lead Free G: Halogen Free Date Code

DIODE

DO-201AD

2

■ **ABSOLUTE MAXIMUM RATINGS** (T_A=25°C, unless otherwise specified)

PARAMETER		SYMBOL	RATINGS	UNIT	
Repetitive Peak Reverse Voltage		V _{RRM}	100	V	
Working Peak Reverse Voltage		V _{RWM}	100	V	
DC Blocking Voltage		V _R	100	V	
RMS Reverse Voltage		V _{R(RMS)}	70	V	
Average Rectified Output Current (Note 2)	T _C =80°C	Ι _Ο	3.0	А	
Non-Repetitive Peak Forward Surge Current 8.3ms Single half sine-wave superimposed on rated load (JEDEC Method)		I _{FSM}	80	A	
Junction Temperature Range		TJ	-65~+150	°C	
Storage Temperature Range		T _{STG}	-65~+150	°C	

Note: Absolute maximum ratings are those values beyond which the device could be permanently damaged. Absolute maximum ratings are stress ratings only and functional device operation is not implied.

THERMAL CHARACTERISTICS

PARAMETER	SYMBOL	RATINGS	UNIT
Junction to Ambient	θ _{JA}	20	°C/W

■ ELECTRICAL CHARACTERISTICS (T_A=25°C, unless otherwise specified)

PARAMETER	SYMBOL	TEST CONDITIONS	MIN	TYP	MAX	UNIT
Forward Voltage	VF	I _F =3.0A			0.85	V
Peak Reverse Current at Rated DC Blocking		T _C =25°C			0.6	mA
Voltage	I _R	T _C =100°C			20	mA
Typical Junction Capacitance (Note 2)	Cj			250		pF

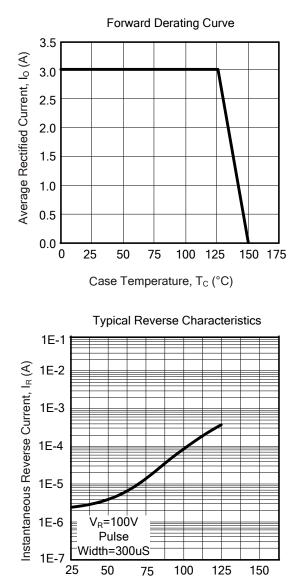
Notes: 1. Measured at ambient temperature at a distance of 9.5mm from case.

2. Measured at 1.0 MHz and applied reverse voltage of 4.0V DC.

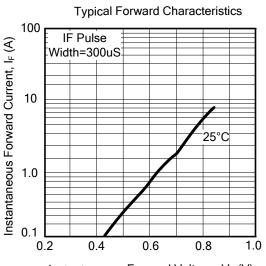


SB3100

TYPICAL CHARACTERISTICS



Case Temperature, T_C (°C)



Instantaneous Forward Voltage, V_F (V)

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