# XBS206S17R-G



ETR1613-002a

# Schottky Barrier Diode, 2A, 60V Type

## **■**FEATURES

Forward Voltage : V<sub>F</sub>=0.615V (TYP.)

Forward Current :  $I_{F(AVE)}=2A$ Repetitive Peak Reverse Voltage :  $V_{RM}=60V$ 

# **■**APPLICATIONS

- Rectification
- Protection against reverse connection of battery

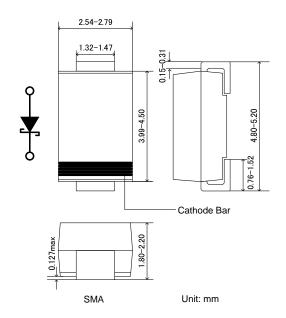
#### ■ ABSOLUTE MAXIMUM RATINGS

Ta=25°C

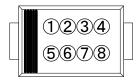
PARAMETER	SYMBOL	RATINGS	UNIT	
Repetitive Peak Reverse Voltage	VRM	60	V	
Reverse Voltage (DC)	VR	60	V	
Forward Current (Average)	IF(AVE)	2	Α	
Non Continuous			۸	
Forward Surge Current <sup>*1</sup>	IFSM	45	Α	
Junction Temperature	Tj	125	လ	
Storage Temperature Range	Tstg	-55~+150	°C	

<sup>\*1:</sup> Non continuous high amplitude 60Hz half-sine wave.

# ■ PACKAGING INFORMATION



#### ■MARKING RULE



①23456: 206S17(Product Number)

(8) : Assembly Lot Number

# **■**PRODUCT NAME

PRODUCT NAME	DEVICE ORIENTATION		
XBS206S17R-G	SMA (Halogen & Antimony free)		
XBS206S17R	SMA		

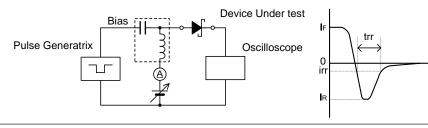
<sup>\*</sup> The "-G" suffix indicates that the products are Halogen and Antimony free as well as being fully RoHS compliant.

## **■**ELECTRICAL CHARACTERISTICS

Ta=25°C

PARAMETER SYMBO	CVMDOL	TEST CONDITIONS		LIMITS	UNIT	
	STIVIBUL	TEST CONDITIONS	MIN.	TYP.	MAX.	UNIT
Forward Voltage VF1 VF2	VF1	I <sub>F</sub> =200 μ A	-	0.15	-	V
	VF2	I <sub>F</sub> =2A	-	0.615	0.665	V
Reverse Current IR1 IR2	l <sub>R1</sub>	V <sub>R</sub> =30V	-	2.5	-	μΑ
	V <sub>R</sub> =60V	-	10	300	μΑ	
Inter-Terminal Capacity	Ct	V <sub>R</sub> =1V , f=1MHz	-	120	-	pF
Reverse Recovery Time*2	trr	I <sub>F</sub> =I <sub>R</sub> =10mA , irr=1mA	-	35	-	ns

<sup>\*2 :</sup> trr measurement circuit

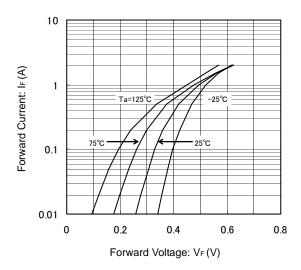


<sup>\*</sup> The device orientation is fixed in its embossed tape pocket.

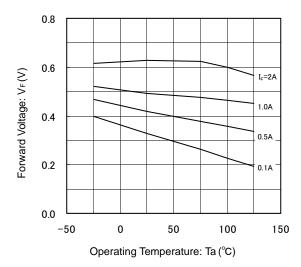
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# **■**TYPICAL PERFORMANCE CHARACTERISTICS

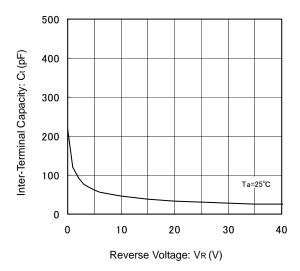
(1) Forward Current vs. Forward Voltage



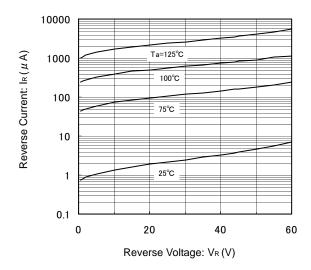
(3) Forward Voltage vs. Operating Temperature



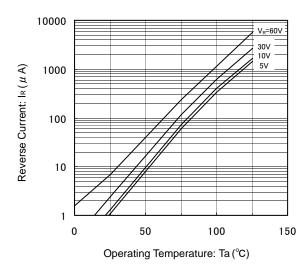
(5) Inter-Terminal Capacity vs. Reverse Voltage



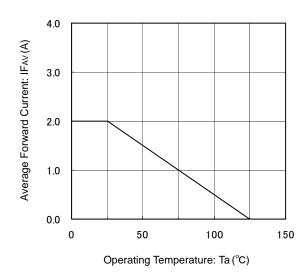
(2) Reverse Current vs. Reverse Voltage



(4) Reverse Current vs. Operating Temperature



(6) Average Forward Current vs. Operating Temperature



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