THE DATASHEET OF

XBS104S13R-G

XBS104S13R-G

ETR1608-003

Schottky Barrier Diode, 1A, 40V Type

■FEATURES

Forward Voltage : V_F=0.49V (TYP.)

Forward Current : $I_{F(AV)}$=1A

Repetitive Peak Reverse Voltage : V_{RM}=40V

Environmentally Friendly : EU RoHS Compliant, Pb Free

■APPLICATIONS

●Rectification

●Protection against reverse connection of battery

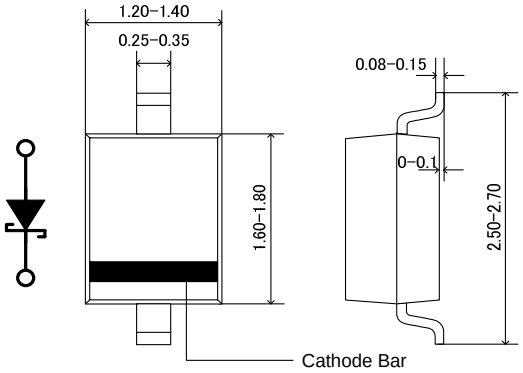
■ABSOLUTE MAXIMUM RATINGS

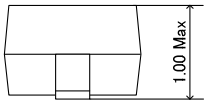
Ta=25℃

PARAMETER	SYMBOL	RATINGS	UNIT
Repetitive Peak Reverse Voltage	V_{RM}	40	V
Reverse Voltage (DC)	V_R	40	V
Forward Current (Average)	$I_{F(AV)}$	1	A
Non Continuous Forward Surge Current *1	I_{FSM}	10	A
Junction Temperature	Tj	125	℃
Storage Temperature Range	Tstg	-55～+150	℃

*1：Non continuous high amplitude 60Hz half-sine wave.

■PACKAGING INFORMATION

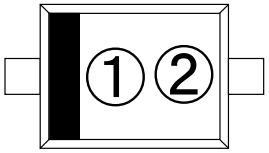




Unit : mm

SOD-323A

■MARKING RULE



①: 1 (Product Number)
②: Assembly Lot Number

■PRODUCT NAME

PRODUCT NAME	DEVICE ORIENTATION
XBS104S13R-G	SOD-323A (Halogen & Antimony free)
XBS104S13R	SOD-323A

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

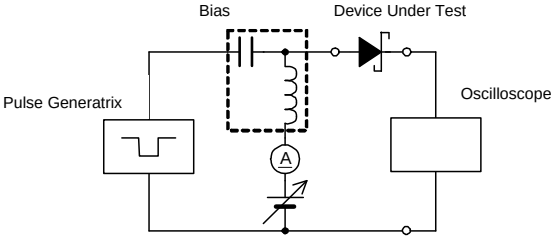
* The device orientation is fixed in its embossed tape pocket.

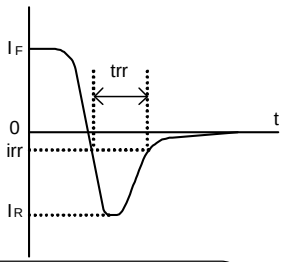
■ELECTRICAL CHARACTERISTICS

Ta=25℃

PARAMETER	SYMBOL	TEST CONDITIONS	LIMITS			UNIT
			MIN.	TYP.	MAX.	
Forward Voltage	V_{F1}	I_F=100mA	-	0.34	-	V
	V_{F2}	I_F=1A	-	0.49	0.54	V
Reverse Current	I_R	V_R=40V	-	4	200	μA
Inter-Terminal Capacity	Ct	V_R=10V , f=1MHz	-	35	-	pF
Reverse Recovery Time *2	trr	I_F=I_R=10mA , irr=1mA , R_L=100Ω	-	25	-	ns

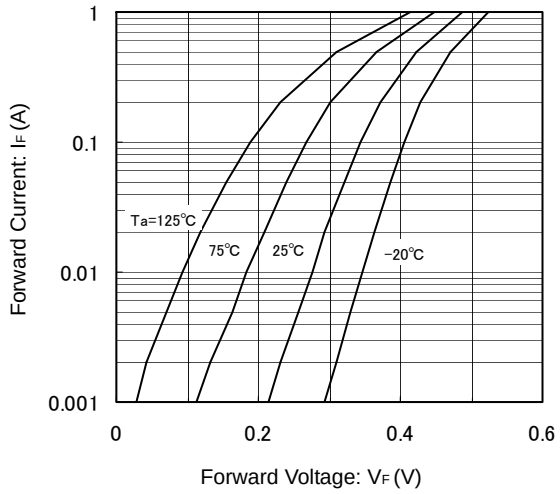
*2：trr measurement circuit



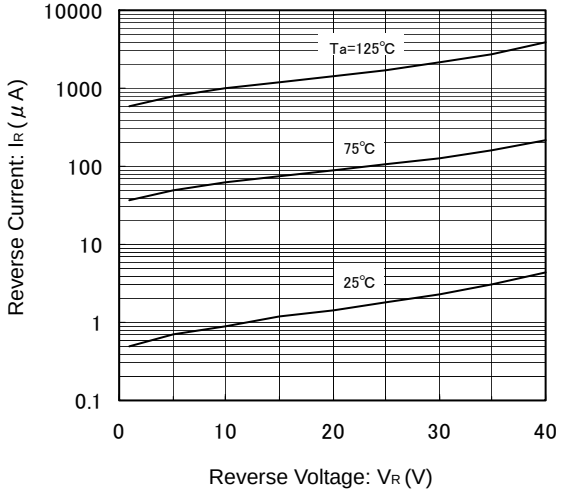


■TYPICAL PERFORMANCE CHARACTERISTICS

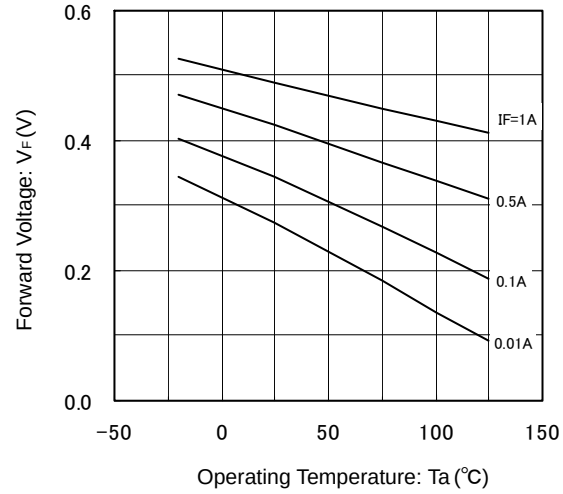
(1) Forward Current vs. Forward Voltage



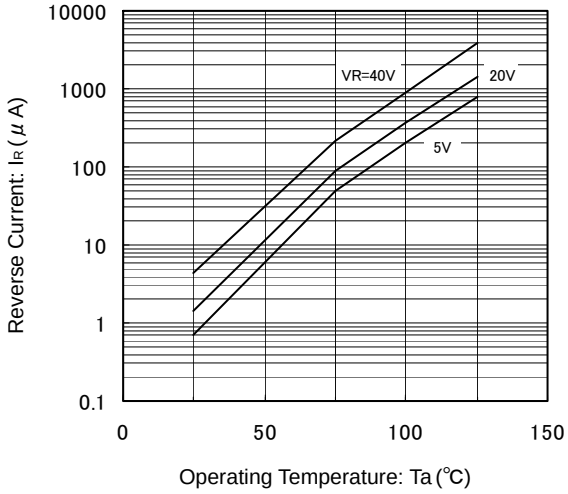
(2) Reverse Current vs. Reverse Voltage



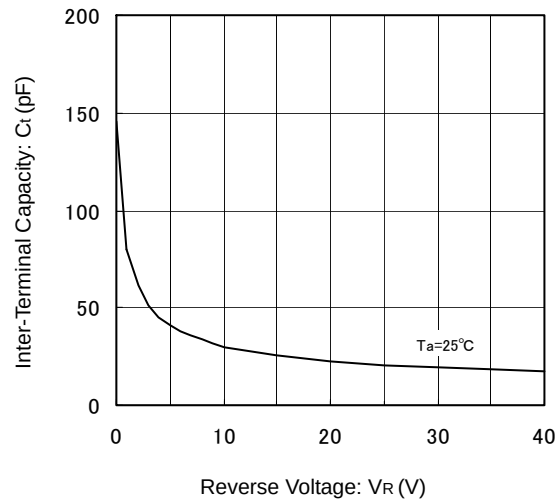
(3) Forward Voltage vs. Operating Temperature



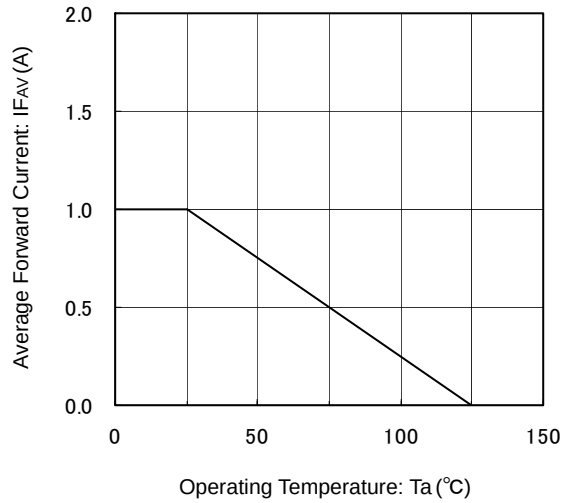
(4) Reverse Current vs. Operating Temperature



(5) Inter-Terminal Capacity vs. Reverse Voltage



(6) Average Forward Current vs. Operating Temperature



1. The products and product specifications contained herein are subject to change without notice to improve performance characteristics. Consult us, or our representatives before use, to confirm that the information in this datasheet is up to date.
2. We assume no responsibility for any infringement of patents, patent rights, or other rights arising from the use of any information and circuitry in this datasheet.
3. Please ensure suitable shipping controls (including fail-safe designs and aging protection) are in force for equipment employing products listed in this datasheet.
4. The products in this datasheet are not developed, designed, or approved for use with such equipment whose failure of malfunction can be reasonably expected to directly endanger the life of, or cause significant injury to, the user.
   (e.g. Atomic energy; aerospace; transport; combustion and associated safety equipment thereof.)
5. Please use the products listed in this datasheet within the specified ranges.
   Should you wish to use the products under conditions exceeding the specifications, please consult us or our representatives.
6. We assume no responsibility for damage or loss due to abnormal use.
7.

TOREX SEMICONDUCTOR LTD.

Looking for pricing, stock, or lifecycle information?

Click below to explore more details on WIN SOURCE:

- View XBS104S13R-G on WIN SOURCE
- Torex Semiconductor Ltd Information

Optimize Your Supply Chain with WIN SOURCE Solutions

- Global Sourcing Solution
- Obsolete Management
- Cost Control Management
- Shortage Management
- Alternative Solution
- Excess Inventory Management