

# XBZ02P0911-G

Zener Diode

ETR39005-002

## FEATURES

**Environmentally Friendly** : EU RoHS Compliant, Pb Free

## PRODUCT NAME

PRODUCT NAME	PACKAGE	ORDER UNIT
XBZ02P0911-G *	SOD-523P	5,000/Reel

\* The "-G" suffix denotes Halogen and Antimony free as well as being fully EU RoHS compliant

## MARKING



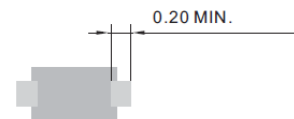
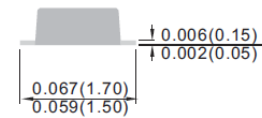
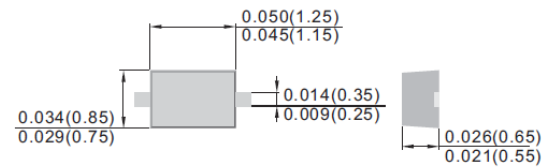
## APPLICATIONS

● Voltage Regulation

## PACKAGING INFORMATION

● SOD-523P

Unit : inch (mm)



## ABSOLUTE MAXIMUM RATINGS

Ta=25°C

PARAMETER	SYMBOL	RATINGS	UNITS
Power Dissipation	Pd	200 <sup>(*)</sup>	mW
Junction Temperature	Tj	150	°C
Storage Temperature	Tstg	-55 to +150	°C

(\*) PCB mounted

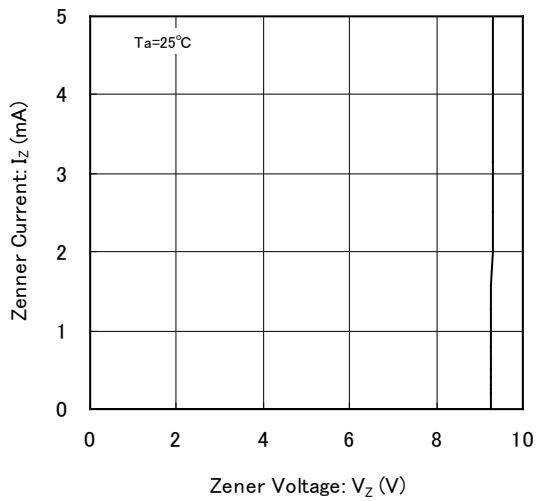
## ELECTRICAL CHARACTERISTICS

Ta=25°C

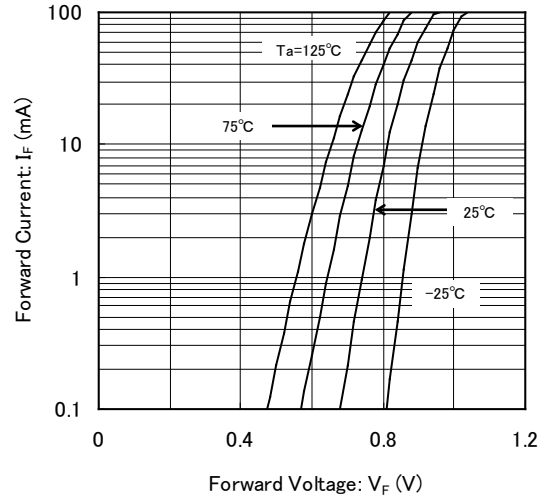
PARAMETER	SYMBOL	TEST CONDITIONS	MIN.	TYP.	MAX.	UNITS
Zener Voltage	V <sub>Z</sub>	I <sub>ZT</sub> =5mA	8.65	9.1	9.56	V
Zener Impedance	Z <sub>ZT1</sub>	I <sub>ZT</sub> =5mA	-	-	15	Ω
	Z <sub>ZT2</sub>	I <sub>ZT</sub> =1mA	-	-	100	Ω
Reverse Current	I <sub>R</sub>	V <sub>R</sub> =6.0V	-	-	0.5	μA

## TYPICAL PERFORMANCE CHARACTERISTICS

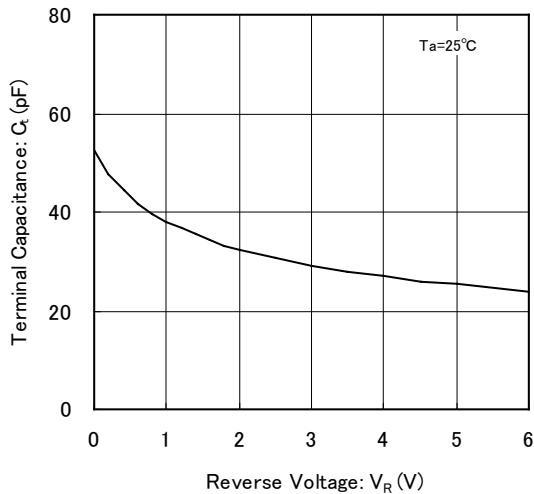
(1) Zener Current vs. Zener Voltage



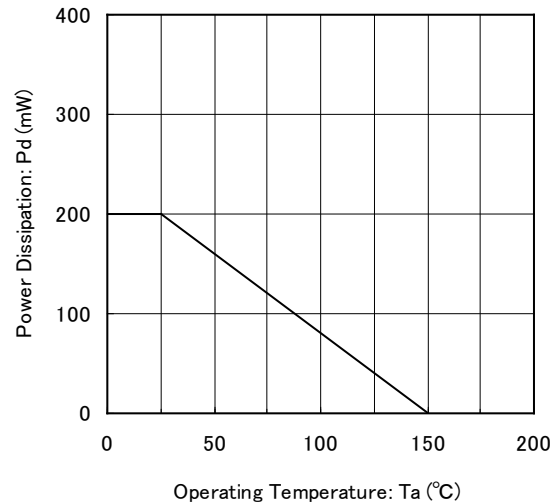
(2) Forward Current vs. Forward Voltage



(3) Terminal Capacitance vs. Reverse Voltage



(4) Power Dissipation vs. Operating Temperature



## NOTES ON USE

1. Please use this IC within the absolute maximum ratings.

Even within the ratings, in case of high load use continuously such as high temperature, high voltage, high current and thermal stress may cause reliability degradation of the IC.

2. Torex places an importance on improving our products and their reliability.

We request that users incorporate fail-safe designs and post-aging protection treatment when using Torex products in their systems.

## ■PACKAGING INFORMATION

For the latest package information go to, [www.torexsemi.com/technical-support/packages](http://www.torexsemi.com/technical-support/packages)

PACKAGE	OUTLINE / LAND PATTERN	THERMAL CHARACTERISTICS
SOD-523P	<a href="#">SOD-523P PKG</a>	

1. The product 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. The information in this datasheet is intended to illustrate the operation and characteristics of our products. We neither make warranties or representations with respect to the accuracy or completeness of the information contained in this datasheet nor grant any license to any intellectual property rights of ours or any third party concerning with the information in this datasheet.
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5. Although we make continuous efforts to improve the quality and reliability of our products; nevertheless Semiconductors are likely to fail with a certain probability. So in order to prevent personal injury and/or property damage resulting from such failure, customers are required to incorporate adequate safety measures in their designs, such as system fail safes, redundancy and fire prevention features.
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7. Please use the product listed in this datasheet within the specified ranges.
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