

# MA2C029

## Silicon epitaxial planar type

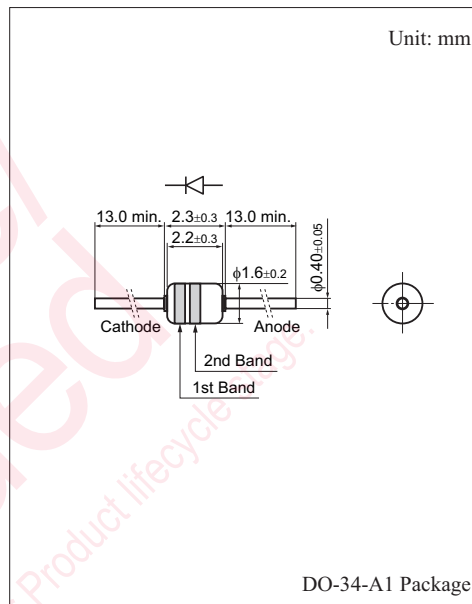
For reduced voltage and temperature compensation

### ■ Features

- High reliability achieved through combination of a planar type chip and glass sealing structure
- Easy mounting because of employing DO-35 (DHD) envelope
- Extremely small reverse current  $I_R$
- Large power dissipation  $P_D$
- Wide forward voltage  $V_F$  range

### ■ Absolute Maximum Ratings $T_a = 25^\circ\text{C}$

Parameter	Symbol	Rating	Unit
Reverse voltage	$V_R$	6	V
Forward current (Average)	$I_{F(AV)}$	50	mA
Power dissipation	$P_D$	150	mW
Junction temperature	$T_j$	150	$^\circ\text{C}$
Storage temperature	$T_{stg}$	-55 to +150	$^\circ\text{C}$



### ■ Electrical Characteristics $T_a = 25^\circ\text{C} \pm 3^\circ\text{C}^{*1}$

Parameter	Symbol	Conditions	Min	Typ	Max	Unit
Forward current	$V_{F1}$	$I_F = 1.5 \text{ mA}$		2 <sup>*2</sup>		V
	$V_{F2}$	$I_F = 50 \text{ mA}$			1.1	
Reverse current	$I_R$	$V_R = 6 \text{ V}$			10	$\mu\text{A}$
Temperature coefficient of forward voltage <sup>*3</sup>	$-\Delta V_F / V_T$	$I_F = 1.5 \text{ mA}$		2.0		mV/ $^\circ\text{C}$

Note) 1. Measuring methods are based on JAPANESE INDUSTRIAL STANDARD JIS C 7031 measuring methods for diodes.

2. \*1: The temperature must be controlled  $25^\circ\text{C}$  for  $V_F$  measurement.  $V_F$  value measured at other temperature must be adjusted to  $V_F (25^\circ\text{C})$

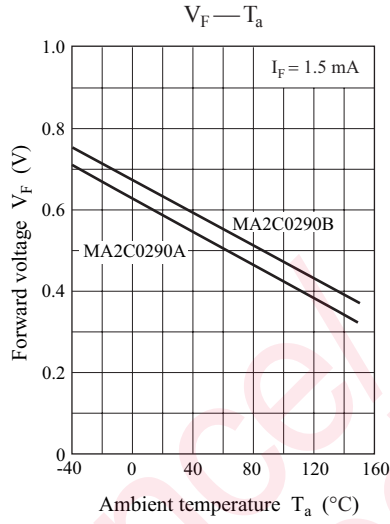
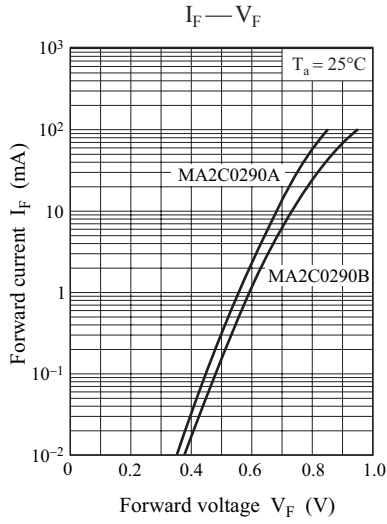
\*2:

Type	$V_F (V)$
MA2C0290A	0.56 to 0.61
MA2C0290A1	0.56 to 0.59
MA2C0290A2	0.58 to 0.61
MA2C0290B	0.59 to 0.64
MA2C0290B1	0.59 to 0.62
MA2C0290B2	0.61 to 0.64

\*3:  $T_j = 25^\circ\text{C}$  to  $150^\circ\text{C}$

### ■ Cathode Indication

Type No.	MA2C0290A	MA2C0290A1	MA2C0290A2	MA2C0290B	MA2C0290B1	MA2C0290B2
1st band color	Red	Red	Red	Blue	Blue	Blue
2nd band color	—	Blue	Yellow	—	Blue	Yellow



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