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With the principle of “Quality Parts,Customers Priority,Honest Operation,and Considerate Service”,our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip,ALPS,ROHM,Xilinx,Pulse,ON,Everlight and Freescale. Main products comprise IC,Modules,Potentiometer,IC Socket,Relay,Connector.Our parts cover such applications as commercial,industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



## Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832

Email & Skype: info@chipsmall.com Web: www.chipsmall.com

Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China



# DY2L5A0C0L1

## Silicon epitaxial planar type

For bidirectional ESD protection and transient voltage suppressor

### ■ Features

- IEC 61000-4-2 (ESD) ±15kV (air and contact)
- Low clamping voltage
- Low capacitance
- Low leak current
- Halogen-free / RoHS compliant  
(EU RoHS / UL-94 V-0 / MSL:Level 1 compliant)

### ■ Marking Symbol: F4

### ■ Packaging

Embossed type (Thermo-compression sealing) : 1 000 pcs / reel (standard)

### ■ Absolute Maximum Ratings Ta = 25 °C

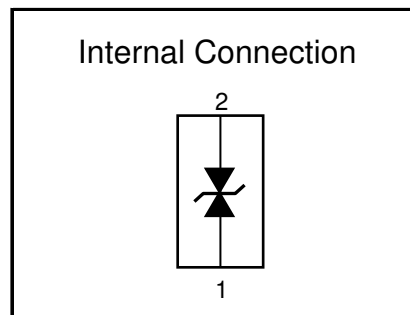
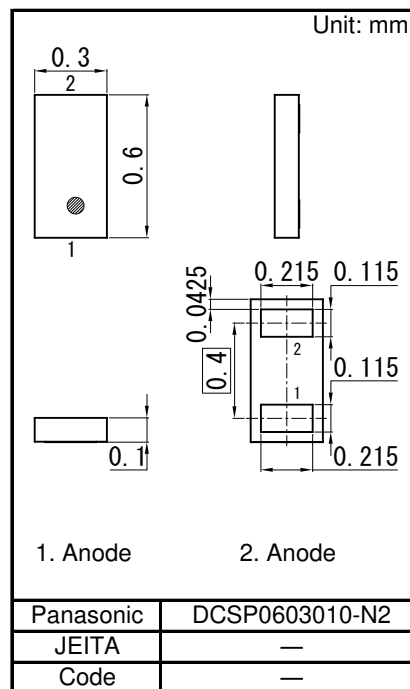
Parameter	Symbol	Rating	Unit
Total power dissipation <sup>*1</sup>	PT	100	mW
Electrostatic discharge <sup>*2</sup>	ESD	±15	kV
Peak pulse power <sup>*3</sup>	Ppp	20	W
Peak pulse current <sup>*3</sup>	Ipp	1.8	A
Junction temperature	Tj	150	°C
Operating ambient temperature	Topr	-40 to +85	°C
Storage temperature	Tstg	-55 to +150	°C

Note: \*1 Mounted on FR4 board. (25.4 mm x 25.4 mm x 1.0 mm)

\*2 Test method:IEC61000-4-2

(C = 150 pF, R = 330 Ω, Contact and Air discharge:10 times)

\*3 Test method:IEC61000-4-5 (tp = 8/20μs, Unrepeated)



### ■ Electrical Characteristics Ta = 25 °C ± 3 °C

Parameter	Symbol	Conditions	Min	Typ	Max	Unit
Reverse stand-off voltage	VRWM	—			5.0	V
Reverse breakdown voltage <sup>*1, *2</sup>	VBR	IR = 5 mA	7.0	7.5	8.0	V
Reverse current	IR	VR = 5 V			50	nA
Clamping voltage <sup>*3</sup>	Vc	Ipp = 1.8 A, tp = 8/20 μs			13	V
Terminal capacitance	Ct	VR = 0 V, f = 1 MHz		6.0		pF

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

2. Absolute frequency of input and output is 5 MHz.

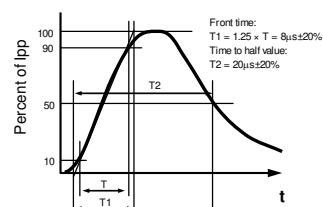
3. \*1 The temperature must be controlled 25°C for VBR measurement.

VBR value measured at other temperature must be adjusted to VBR (25°C).

\*2 VBR guaranteed 20 ms after current flow.

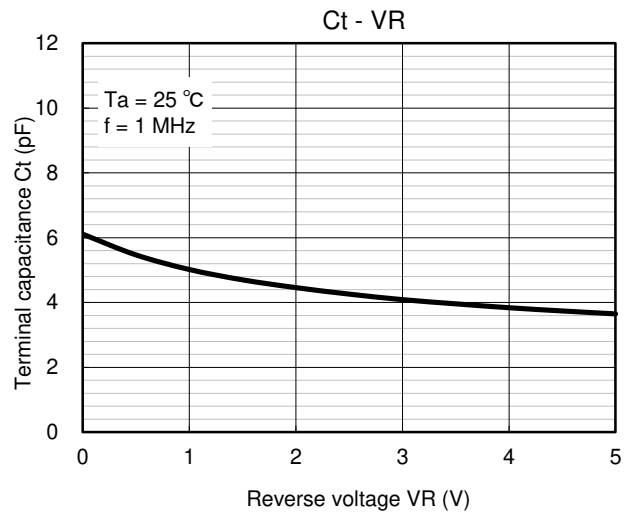
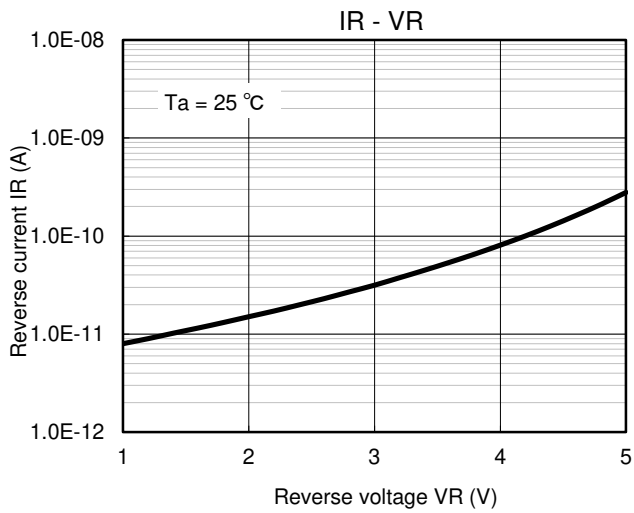
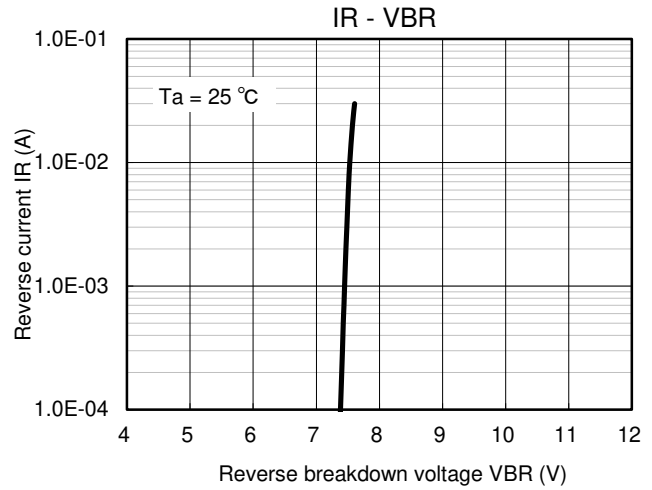
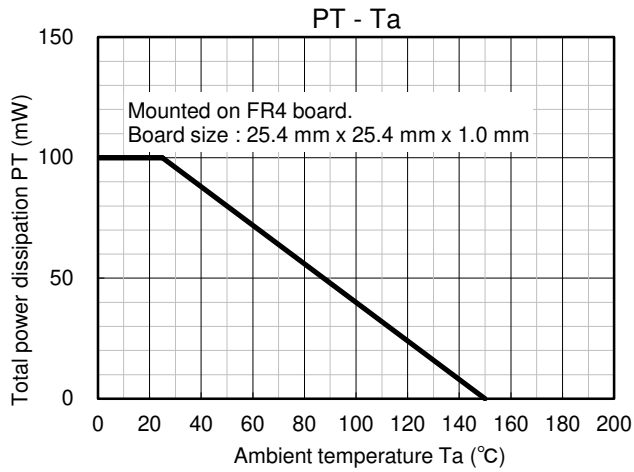
\*3 8μs/20μs Pulse Waveform

8μs/20μs Pulse Waveform





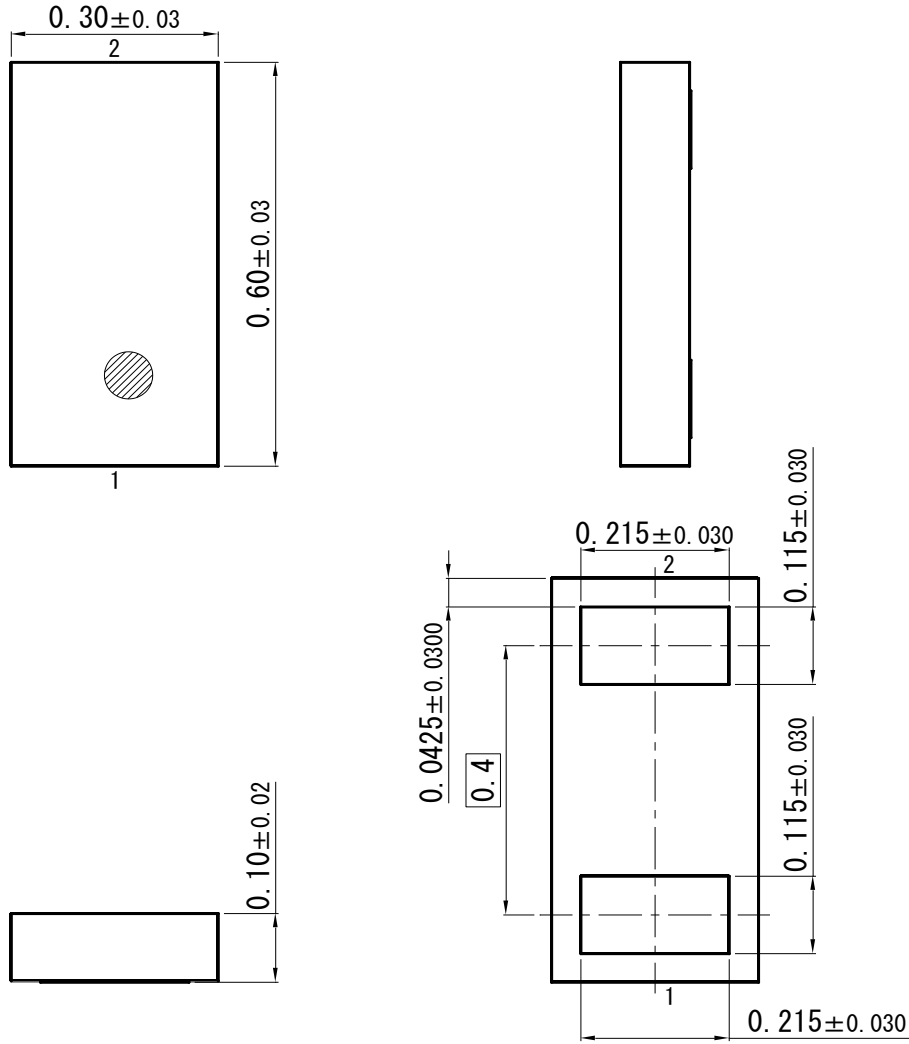
Technical Data (Reference)





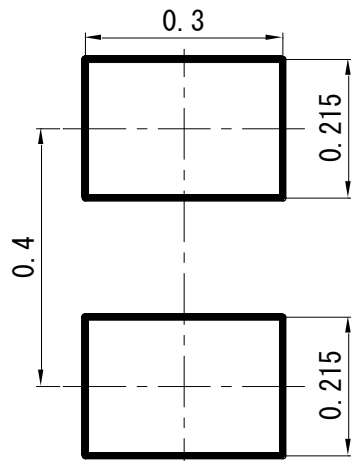
DCSP0603010-N2

Unit: mm



■ Land Pattern (Reference)

Unit: mm





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