

## **Features**

- ESD protection for high speed data lines to IEC61000-4-2 ESD contact discharge 8KV, max 15KV IEC61000-4-2 ESD air discharge 15KV, max 25KV
- Multilayer structure
- Surface mount
- Extremely low capacitance
- Very low leakage current
- Fast response time
- Bi-directional ESD protection
- Lead free solder termination
- The best ESD protection for high frequency, low voltage applications

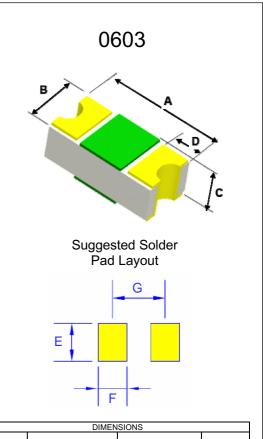
# Application

- High Definition Multi-Media Interface (HDMI)
- Digital Visual Interface (DVI)
- Display Port Interface
- Unified Display Interface (UDI)
- MDDI Ports
- Gigabit Ethernet
- USB2.0 and IEEE1394 interface
- \* Caution: This component is designed for signal line protection only, not intended to be used under bias, not for application with a power line.

# **Environmental Specifications**

- Operation temperature: -40~90°℃
- Moisture Resistance, Steady state: MIL-STD-833, Method 1004.7, 85% RH,85°C,1000hrs
- Thermal Shock: MIL-STD-202, Method 107G, -55℃ to150℃, 30 min cycle, 10 cycles.
- Vibration: MIL-STD-202F, Method 201A, (10 to 55 to 10HZ, 1 min. cycle, 2hrs each in X-Y-Z)
- Chemical Resistance: ASTM D-543, 4hrs @40℃, 3 solutions(H<sub>2</sub>O, detergent solution, deluxer)
- Solder leach resistance and terminal adhesion: Per EIA-576 test

# Multilayer Polymer ESD Suppressor



	DIMENSIONS								
	INCHES		ММ						
DIM	MIN	MAX	MIN	MAX	NOTE				
Α	.057	.069	1.45	1.75					
В	.027	.038	0.70	0.95					
С	.011	.019	0.27	0.47					
D	.008	.020	0.20	0.50					
E	.035	.040	0.90	1.00					
F	.023	.028	0.60	0.70					
G	.051	.056	1.30	1.40					



#### **Electrical Characteristics**

Electrical Characteristics								
Parameter	Symbol	Conditions	Min	Тур	Max	Units		
Continuous operating voltage	V <sub>DC</sub>				24	V		
Trigger voltage	V <sub>T</sub>	IEC61000-4-2 8KV contact discharge		500		V		
Clamping voltage	Vc	EC61000-4-2 8KV contact discharge		36		V		
Leakage current	١L	24V V <sub>DC</sub>		0.20	10	nA		
Capacitance	CP	VR = 0V, f = 1MHz		0.15	0.3	pF		
Operating Temperature			-40		90	°C		
Storage Temperature			-55		150	°C		
ESD pulse withstand	Pulses	EC61000-4-2 8KV contact discharge	2000					

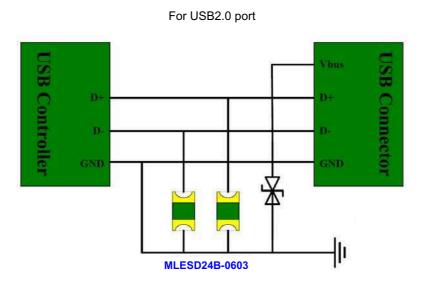
Notes:

1, Trigger and clamping voltage measure per IEC 61000-4-2, 8KV direct discharge method

### Typical MLESD clamping for +8KV pulse per IEC61000-4-2



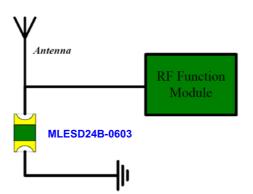




### **Design Recommendations for USB2.0**

## **Design Recommendations for Antenna**

For antenna line





## **Ordering Information**

Device	Packing		
Part Number-TP	Tape&Reel: 5Kpcs/Reel		

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