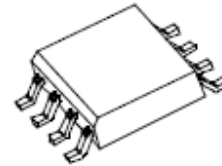


**TVS ARRAY SERIES**

**FEATURES**

- ✓ Protects 3.3, 5, 12, 15, 24 V Components
- ✓ Bidirectional
- ✓ Provides Electrically Isolated Protection
- ✓ 300 W @ 8/20  $\mu$ s
- ✓ Protects 4 Lines
- ✓ SO-8 Packaging
- ✓ LOW CAPACITANCE: 5PF
- ✓ This is a Pb - Free Device
- ✓ All SMC parts are traceable to the wafer lot
- ✓ Additional testing can be offered upon request

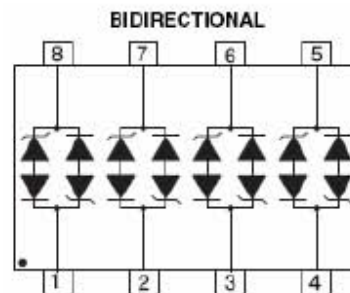
**SO-8**



**DESCRIPTION**

The SMDAXLCC series of TVS array have been designed to provide bidirectional protection for sensitive electronics from damage due to voltage transients caused by electrostatic discharge (ESD), electrical fast transients (EFT), lightning and other voltage-induced transient events. The device can be used to protect combinations of four bidirectional lines.

**SCHEMATIC & PIN CONFIGURATION**



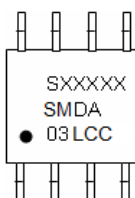
**APPLICATION**

- ✓ RS-232 & RS-422 Data Lines
- ✓ Microprocessor Based Equipment
- ✓ Notebooks, Desktops, & Servers
- ✓ LAN/WAN Equipment
- ✓ Serial and Parallel Port
- ✓ Peripherals

**MECHANICAL CHARACTERISTICS**

- ✓ SO-8 Surface Mount Package
- ✓ Approximate Weight: 0.1 grams
- ✓ PIN #1 Indicator: DOT on top of package
- ✓ Packaging: Tubes or Tape & Reel per EIA Standard 481

**MARKING DIAGRAM**



Where XXXXX is YYWWL

SMDA03LCC = Part Name  
S = S  
YY = Year  
WW = Week  
L = Lot Number

**Cautions:** Molding resin  
Epoxy resin UL:94V-0

**Ordering Information:**

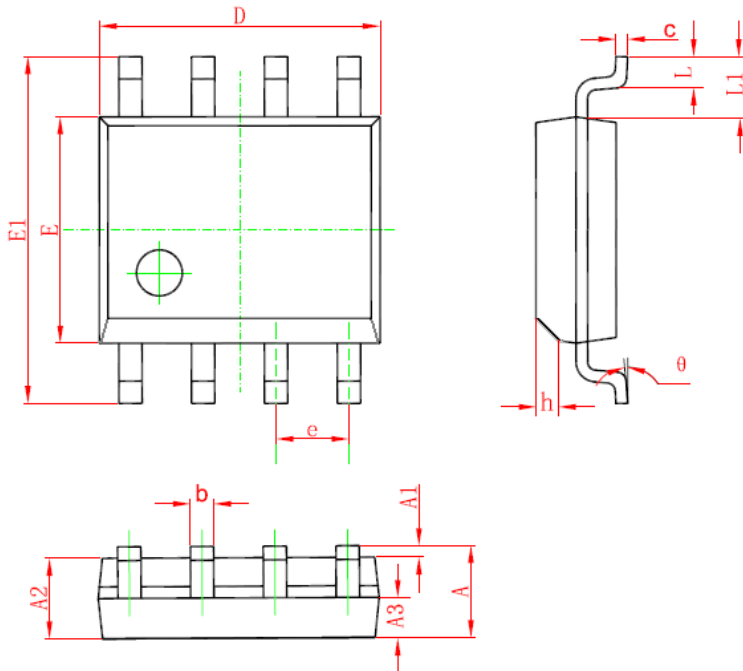
Device	Package	Shipping
SMDA03LCC THRU SMDA24LCC	SO-8 (Pb-Free)	2500pcs / reel

For information on tape and reel specifications, including part orientation and tape sizes, please refer to our Tape and Reel Packaging Specification.

**ABSOLUTE MAXIMUM RATINGS**

Symbol	Parameter	Value	Unit
P	Peak Pulse Power, 8/20 $\mu$ s Waveshape	300	W
T <sub>J</sub>	Operating Temperature	-55 to +125	°C
T <sub>STG</sub>	Storage Temperature	-55 to +150	°C
T <sub>L</sub>	Lead Soldering Temperature	260 (10 Sec.)	°C

**PACKAGE OUTLINES & DEMENSIONS**



SYMBOL	MILLMETER		
	MIN.	TYP.	MAX.
A	-	-	1.75
A1	0.10	-	0.225
A2	1.30	1.40	1.50
A3	0.60	0.65	0.70
b	0.39	-	0.48
c	0.21	-	0.26
D	4.70	4.90	5.10
E	3.70	3.90	4.10
E1	5.80	6.00	6.20
e	1.27BSC		
h	0.25	-	0.50
L	0.50	-	0.80
L1	1.05BSC		
θ1	0	-	8°

**SO-8**

ELECTRICAL CHARACTERISTICS @ 25 °C						
Part Number	Stand-off Voltage $V_{vm}$ (v) Max	Breakdown Voltage $V_{BR}$ @1mA (V) Min	Clamping Voltage $V_c$ @ 1 A (V) Max	Leakage Current $I_R$ @ $V_{vm}$ ( $\mu$ A) Max	Capacitance (f = 1MHz) C @ 0V (pF) Max	Temperature Coefficient of $V_{BR}$ a( $V_{BR}$ ) mV/°C Max
SMDA03LCC	3.3	4	7	200	15	-5
SMDA05LCC	5.0	6	9.8	20	15	1
SMDA12LCC	12.0	13.3	19	1	15	8
SMDA15LCC	15.0	16.7	24	1	15	11
SMDA24LCC	24.0	26.7	43	1	15	28

TYPICAL CHARACTERISTICS

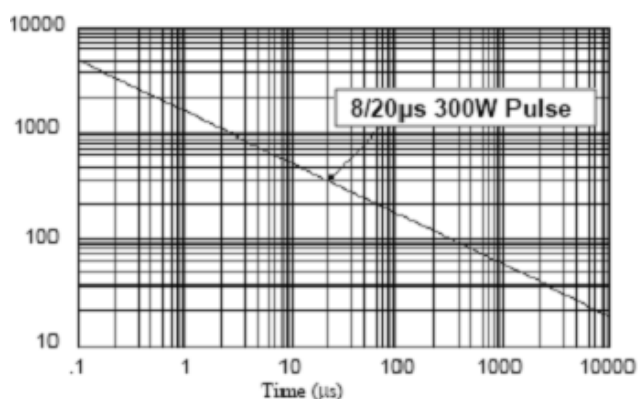


Figure 1. Peak Pulse Power Vs Pulse Time ( $\mu$ s)

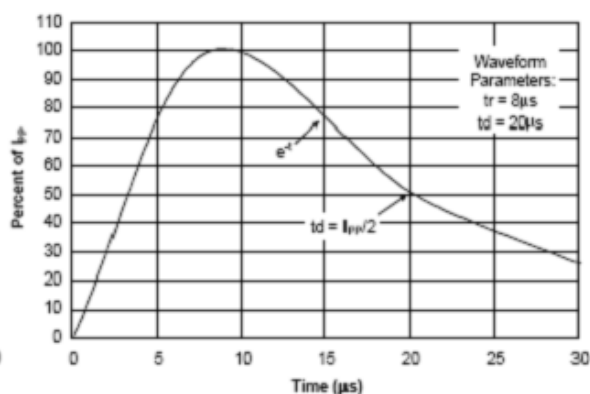


Figure 2. Pulse Wave Form

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