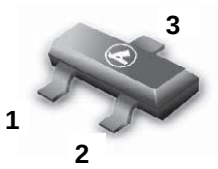
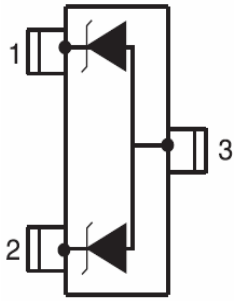
Dual Transient Voltage Suppressors Array for ESD Protection

LGSOT05CLT1G

The LGSOT05CLT1G is a dual monolithic voltage suppressor designed to protect components which are connected to data and transmission lines against ESD . It clamps the voltage just above the logic level supply for positive transients , and to a diode drop below ground for negative transients . It can also work as bidirectional suppressor by connecting only pin1 and 2.



SOT-23



●APPLICATIONS

1)Computers、Printers
2)Communication systems

●FEATURES

1)2 Unidirectional Transil functions
2)Low leakage current: I_R max< 20 μA at V_{RM}
3)300W peak pulse power(8/20μs)
4)Transient protection for data lines as per
IEC61000-4-2(ESD) 15kV(air) 8kV(contact)
IEC61000-4-5(Lightning) see I_{PPM} below
5)We declare that the material of product compliant with RoHS requirements and Halogen Free.

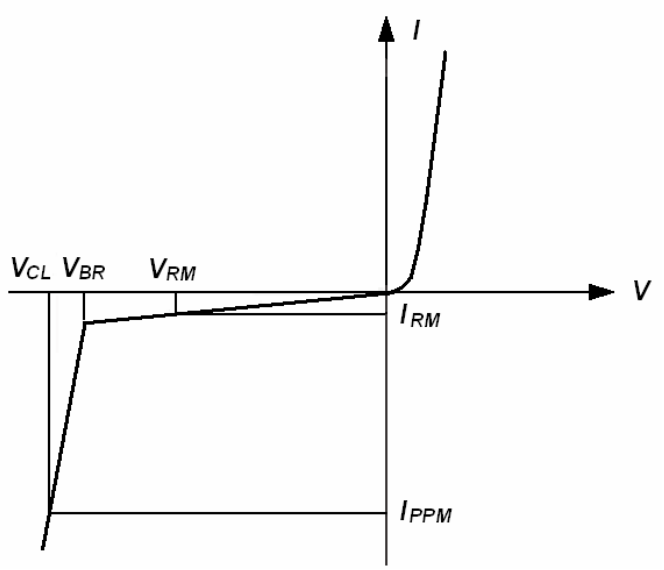
●DEVICE MARKING AND RESISTOR VALUES

Device	Marking	Shipping
LGSOT05CLT1G	05C	3000/Tape&Reel
LGSOT05CLT3G	05C	10000/Tape&Reel

●ABSOLUTE RATINGS(Ta = 25℃)

Parameter	Symbol	Limits	Unit
IEC 61000−4−2 (ESD) Contact		±8	kV
Air		±15	
Peak Pulse Power (tp = 8/20us)	P_{PP}	300	W
Maximum Junction Temperature	T_J	150	℃
Storage temperature	Tstg	−55～+150	℃
Operating Temperature Range	T_{OP}	−40～+125	℃
Lead Solder Temperature − Maximum (10 Second Duration)	T_L	260	℃

LGSOT05CLT1G



Electrical Parameter

Symbol	Parameter
V_{RM}	Stand-off voltage
V_{BR}	Breakdown voltage
V_{CL}	Clamping voltage
I_{RM}	Leakage current
I_{PPM}	Peak pulse current

●ELECTRICAL CHARACTERISTICS (Ta= 25℃)

Device	VRWM (V)	IR (u A) @VRWM	VBR (V) @ IT (Note 1)	IT	VC (V) @Ipp = 1 A	VC (V) @Ipp = 5A	IPP(A) @tp=8/20μs	C (pF)
	Max	Max	Min	mA	Max	Max	Max	Max
LGSOT05CLT1G	5	5	6	1	9.8	12.5	17	220

1. VBR is measured with a pluse test current IT at an ambient temperature of 25℃.

LGSOT05CLT1G

ELRCTIRCAL CHARACTERISTICS CURVES

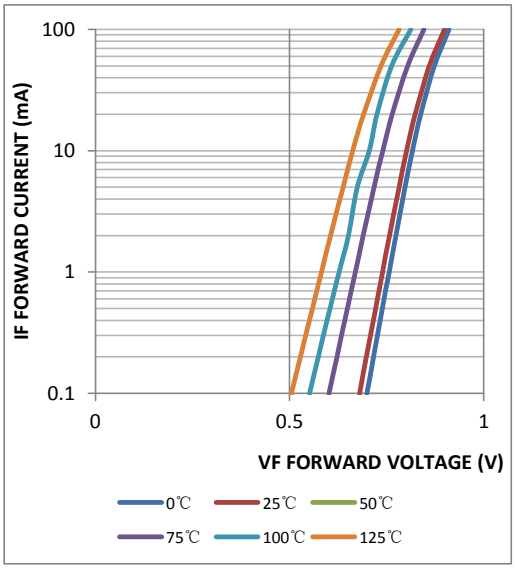


Fig 1. Forward character

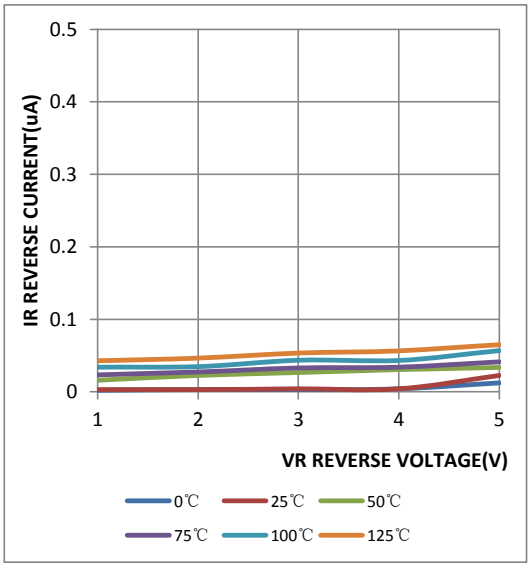


Fig 2. Reverese character

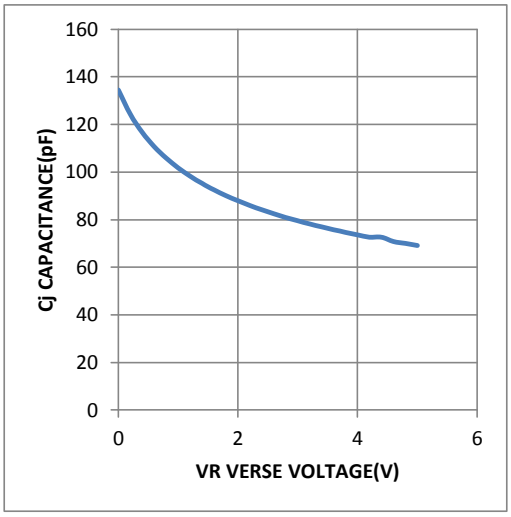
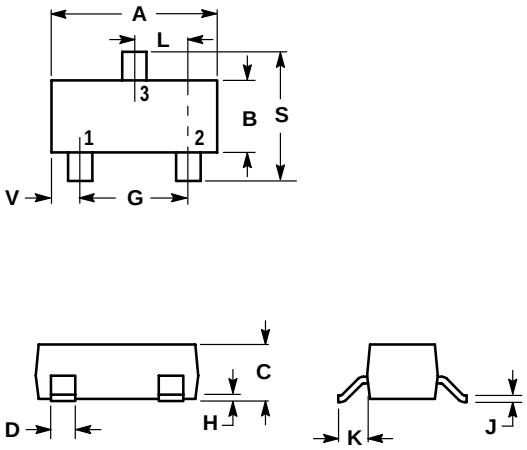


Fig 3. Capacitance character

LGSOT05CLT1G

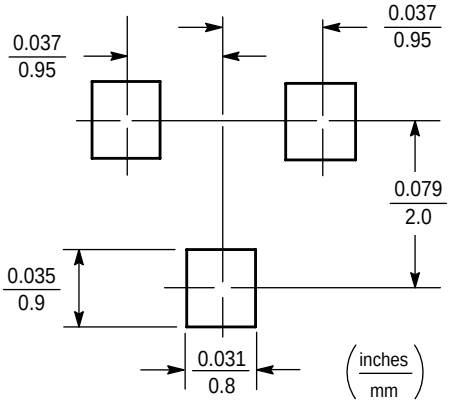
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NOTES:

1. DIMENSIONING AND TOLERANCING PER ANSI Y14.5M,1982
2. CONTROLLING DIMENSION: INCH.

DIM	INCHES		MILLIMETERS	
	MIN	MAX	MIN	MAX
A	0.1102	0.1197	2.80	3.04
B	0.0472	0.0551	1.20	1.40
C	0.0350	0.0440	0.89	1.11
D	0.0150	0.0200	0.37	0.50
G	0.0701	0.0807	1.78	2.04
H	0.0005	0.0040	0.013	0.100
J	0.0034	0.0070	0.085	0.177
K	0.0140	0.0285	0.35	0.69
L	0.0350	0.0401	0.89	1.02
S	0.0830	0.1039	2.10	2.64
V	0.0177	0.0236	0.45	0.60



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LRC:

L1SS184LT1G LM3Z18VT1G LMBR1100ET1G LMBT4403LT1G LMBTA92LT1G LMSZ5245BT1G SZAF5.1A LM5Z7V5T1G LMSZ5248BT1G LR78M05D LUDZS5.6BT1G SZA12A LDTC123JET1G LM3Z5V6T1G LMBT4401LT1G LTL431APTLT1G S-LMSZ5265BT1G L2N7002KWT1G L9014QLT1G LESD5Z5.0T1G LMBTA13LT1G P6KE150A LMBR0520T1G LMSZ5243BT1G S-L1N4148WT1G L2N7002FLT1G LM5Z3V3T1G SM2100AF LMSZ5252BT1G S-LUDZS3.3BT1G