



**Micro Commercial Components** 

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# ESDLC5V0T5

## **Features**

- Halogen free available upon request by adding suffix "-HF"
- For sensitive ESD protection
- Excellent clamping capability
- Low leakage
- Working voltage: 5V
- For space saving application
- Fast response ,response time less than 1ns.
- Epoxy meets UL 94 V-0 flammability rating
- Moisture Sensitivity Level 1

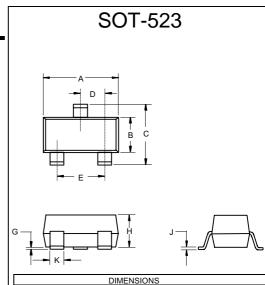
# **Maximum Ratings**

• Operating Junction &StorageTemperature: -55°C to +150°C

Parameter		Symbol	Limits	unit
IEC61000-4-2(ESD)	Air Contact		±15 ±8	KV
Peak Power Dissipation@8/20us		Ppk	125	W

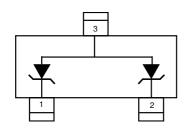
# ESD Protection Devices

5 Volts



DIMENSIONS					
	INCHES		MM		
DIM	MIN	MAX	MIN	MAX	NOTE
Α	.059	.067	1.50	1.70	
В	.030	.033	0.75	0.85	
O	.057	.069	1.45	1.75	
D	.020 Nominal		0.50Nominal		
Е	.035	.043	0.90	1.10	
G	.000	.004	.000	.100	
Η	.028	.031	.70	0.80	
J	.004	.008	.100	.200	
K	010	014	25	35	

# **Pin Configuration**





## Electrical characteristics per line@25 ( unless otherwise specified)

Parameter	Symbol	Conditions	Min.	Тур.	Max.	Units
Reverse Stand-off Voltage	$V_{RWM}$				5	V
Reverse Breakdown Voltage	$V_{BR}$	I <sub>t</sub> = 1mA	5.6			V
Reverse Leakage Current	I <sub>R</sub>	V <sub>RWM</sub> = 5V			1	μA
Clamping Voltage	Vc	I <sub>PP</sub> = 1A, t <sub>P</sub> = 8/20μs pin1 to pin2			13.5	V
Clamping Voltage	Vc	$I_{PP}$ = 5A, $t_P$ = 8/20 $\mu$ s pin1or pin2 to pin3			20.0	٧
Clamping Voltage	V <sub>C</sub>	$I_{PP}$ = 5A, $t_P$ = 8/20 $\mu$ s pin1to pin2			23.0	V
Junction Capacitance	C <sub>j</sub>	V <sub>R</sub> =0V, f = 1MHz Pin1 to Pin2		1.4	2	pF
Junction Capacitance	Cj	V <sub>R</sub> =0V f = 1MHz pin1or pin2 to pin3		2.8	3.5	pF

## **Typical Characteristics**

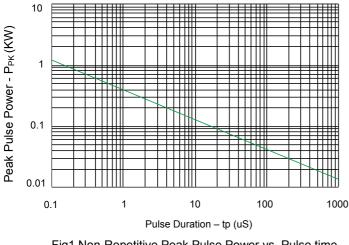


Fig1.Non-Repetitive Peak Pulse Power vs. Pulse time

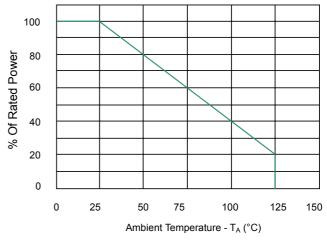


Fig2. Power Derating Curve

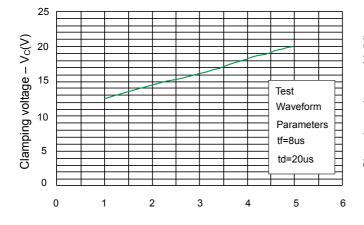


Fig 3.Clamping Voltage vs. peak Pulse Current (Pin 1 to Pin 2)

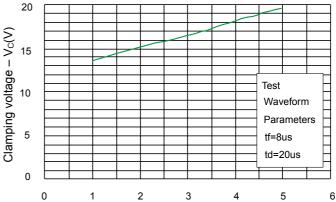


Fig.4 Clamping Voltage vs. peak Pulse Current (Pin 1 or Pin 2 to Pin 3)



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### Ordering Information:

Device	Packing	
Part Number-TP	Tape&Reel: 3Kpcs/Reel	

Note: Adding "-HF" suffix for halogen free, eg. Part Number-TP-HF

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