



# 安徽富信半导体科技有限公司

ANHUI FOSAN SEMICONDUCTOR TECHNOLOGY CO., LTD.

FSLC5D5V1U

## SOD-523 ESD 静电保护二极管

### ■Features 特点

Un-directional ESD Protection 单向静电保护

Low capacitance 低电容



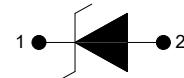
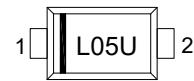
### ■Applications 应用

MP3 Players 播放器

Notebooks 笔记本电脑

Portable Digital Assistants 便携数码助手

Marking 印字: L05U



### ■Internal Schematic Diagram 内部结构

### ■Absolute Maximum Ratings 最大额定值

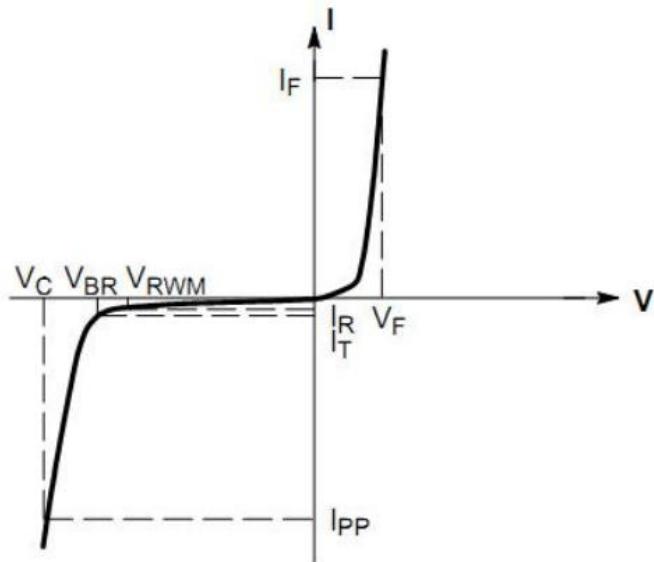
Characteristic 特性参数	Symbol 符号	Rating 额定值	Unit 单位
ESD (IEC61000-4-2 contact discharge) @25°C接触放电	V <sub>ESD</sub>	±10	KV
ESD (IEC61000-4-2 air discharge) @25°C 空气放电	V <sub>ESD</sub>	±15	KV
Peak Pulse Current @25°C峰值脉冲电流	I <sub>PP</sub>	4	A
Peak Pulse Power @25°C峰值脉冲功率	P <sub>PK</sub>	80	W
Lead Temperature 管脚温度	T <sub>L</sub>	260	°C
Lead Solder Time 管脚焊接时间	T <sub>L</sub>	10	S
Operating Temperature 工作温度	T <sub>op</sub>	-40~85	°C
Junction Temperature 结温	T <sub>J</sub>	-55~125	°C
Storage Temperature 储存温度	T <sub>stg</sub>	-55~150	°C

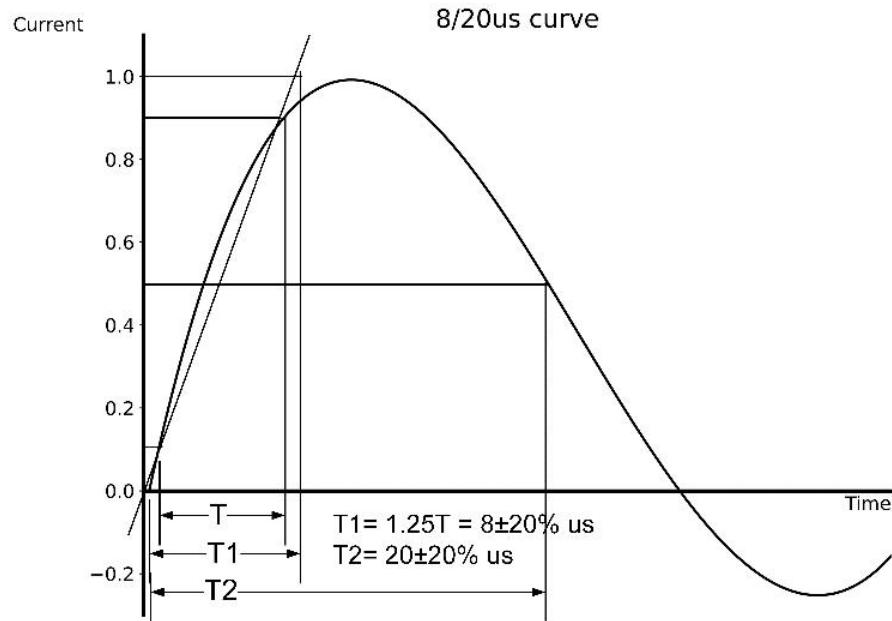
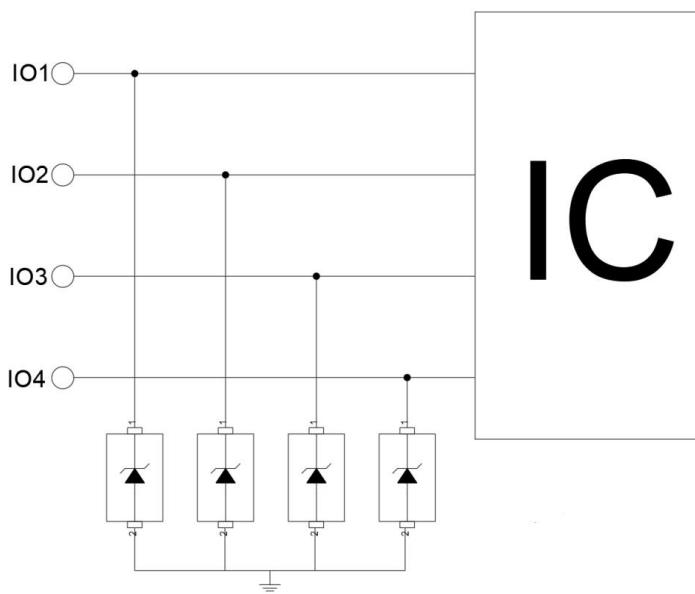
## ■ Electrical Characteristics 电特性

( $T_A=25^\circ\text{C}$  unless otherwise noted 如无特殊说明, 温度为  $25^\circ\text{C}$ )

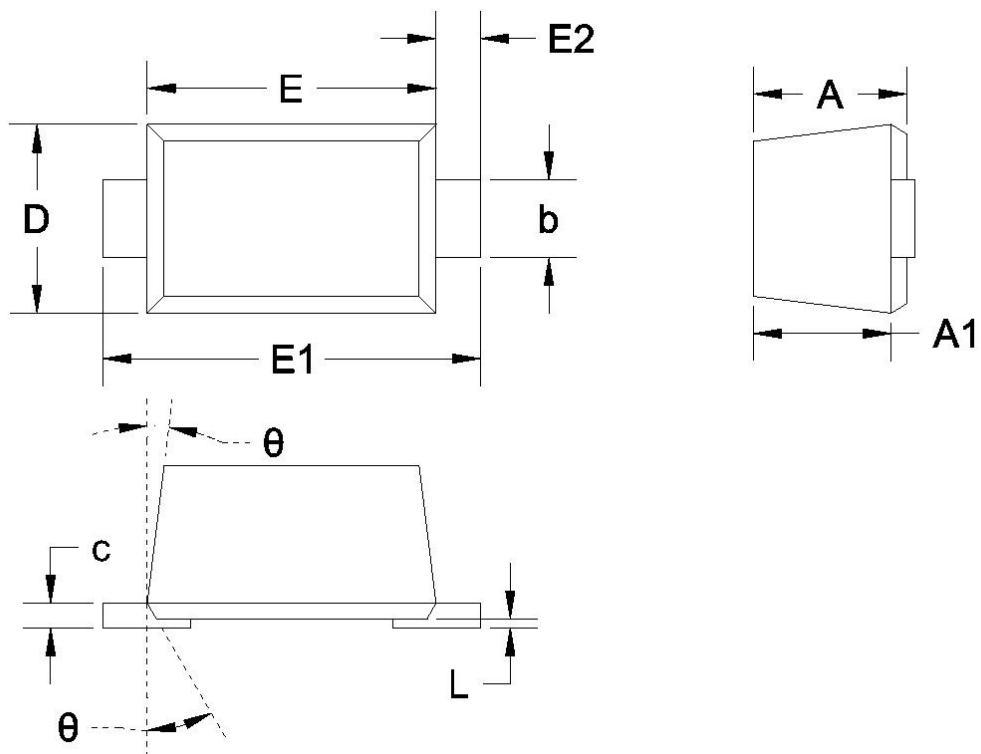
Characteristic Parameters 特性参数	Symbol 符号	Min 最小值	Typ 典型值	Max 最大值	Unit 单位	Condition 条件
Reverse Stand-off Voltage 反向工作电压	$V_{RWM}$			5	V	
Reverse Breakdown Voltage 反向击穿电压	$V_{R(BR)}$	6			V	$I_T=1\text{mA}$
Reverse Leakage Current 反向漏电流	$I_R$			1	$\mu\text{A}$	$V_{RWM}=5\text{V}$
Clamping Voltage 钳位电压	$V_C$		15		V	$I_{PP}=1\text{A}, t_p=8/20\mu\text{s}$
Clamping Voltage 钳位电压	$V_C$		20		V	$I_{PP}=4\text{A}, t_p=8/20\mu\text{s}$
Junction Capacitance 结电容	$C_J$		0.6		pF	$V_R=0\text{V}, f=1\text{MHz}$

$V_{RWM}$	Reverse Working Voltage 反向工作电压
$V_{R(BR)}$	Reverse Breakdown Voltage 反向击穿电压@ $I_T=1\text{mA}$
$I_T$	Test Current 测试电流
$I_R$	Reverse Leakage Current 反向漏电流@ $V_{RWM}$
$V_C$	Clamping Voltage 钳位电压
$I_{PP}$	Reverse Peak Pulse Current 浪涌电流
$C_J$	Junction Capacitance 结电容 $V_{IO}=0\text{V}, V_{P-P} = 30\text{mV}, f = 1\text{MHz}$



**■ Typical Characteristic Curve 典型特性曲线****■ Typical Application 典型应用**

■ Dimension 外形封装尺寸



Unit mm	A	A1	b	c	D	E	E1	E2	L	θ
Max.	0.77	0.70	0.35	0.15	0.85	1.30	1.70	0.20	0.07	7°
Min.	0.51	0.50	0.25	0.08	0.75	1.10	1.50	REF.	0.01	REF.