



Micro Commercial Components



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ESDU5V0M5

5 Volts
ESD Protection
Device

Features

- Halogen free available upon request by adding suffix "-HF"
Lead Free Finish/RoHS Compliant ("P" Suffix designates RoHS Compliant. See ordering information)
Epoxy meets UL 94 V-0 flammability rating
Moisture Sensitivity Level 1
Low reverse claming voltage
Low leakage current
Low capacitance: 0.8pF max.
Low reverse stand-off voltage:5V

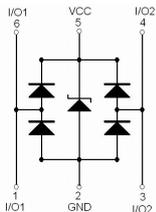
Maximum Ratings

- Operating Junction & Storage Temperature: -55°C to +150°C

Table with 4 columns: Parameter, Symbol, Limits, unit. Rows include IEC61000-4-2ESD Voltage, JESD22-A114-B ESD Voltage, Peak Pulse Power, and Peak Pulse Current.

- (1).Device stressed with ten non-repetitive ESD pulses.
(2).Non-repetitive current pulse 8/20µs exponential decay waveform according to IEC61000-4-5.

PinConfiguration



Marking: U5N2

SOT-563

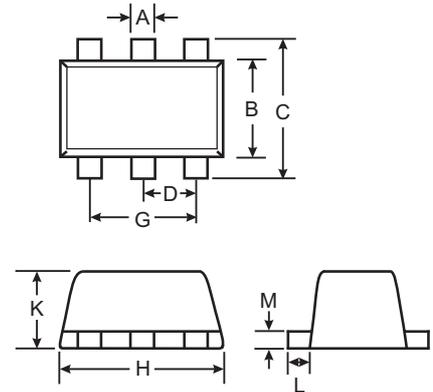
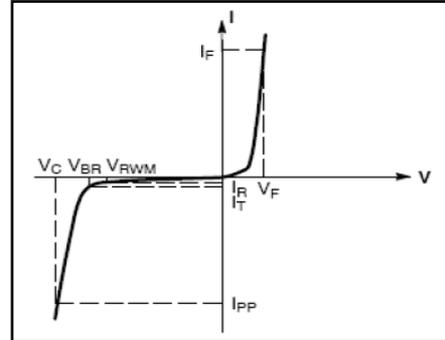


Table with 6 columns: DIM, INCHES (MIN, M), M (MIN, MAX), NOTE. Rows list dimensions A through M.

### ELECTRICAL PARAMETER

Symbol	Parameter
$V_C$	Clamping Voltage @ $I_{PP}$
$I_{PP}$	Peak Pulse Current
$V_{BR}$	Breakdown Voltage @ $I_T$
$I_T$	Test Current
$I_R$	Reverse Leakage Current @ $V_{RWM}$
$V_{RWM}$	Reverse Standoff Voltage
$V_F$	Forward Voltage @ $I_F$
$I_F$	Forward Current



### ELECTRICAL CHARACTERISTICS ( $T_a=25^\circ\text{C}$ unless otherwise specified)

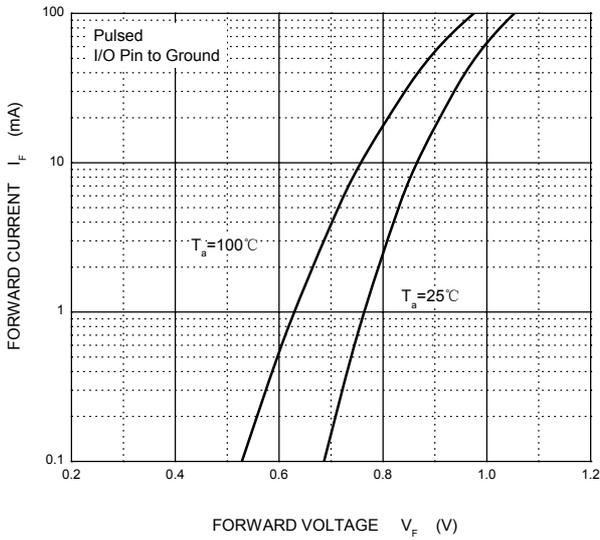
Parameter	Symbol	Test conditions	Min	Typ	Max	Unit
Per channel(I/O to GND unless otherwise specified)						
Reverse stand off voltage	$V_{RWM}^{(1)}$				5	V
Breakdown voltage	$V_{(BR)}$	$I_T=1\text{mA}$	6.0		10	V
		$I_T=1\text{mA}$ $V_{CC}$ to GND	5.0		12	V
Reverse leakage current	$I_R$	$V_{RWM}=5\text{V}$ (I/O to GND & $V_{CC}$ to GND)			1	$\mu\text{A}$
Forward voltage	$V_F$	$I_F=10\text{mA}$ (I/O to GND & $V_{CC}$ to GND)	0.4		1.5	V
Clamping voltage	$V_C^{(2)}$	$I_{PP}=1\text{A}$ (I/O to GND & $V_{CC}$ to GND)			13	V
		$I_{PP}=3.5\text{A}$ (I/O to GND & $V_{CC}$ to GND)			25	V
Junction capacitance	$C_J$	$V_R=0\text{V}, f=1\text{MHz}$			0.8	pF
		$V_R=0\text{V}, f=1\text{MHz}$ , I/O to I/O			0.4	pF

(1).Other voltages available upon request.

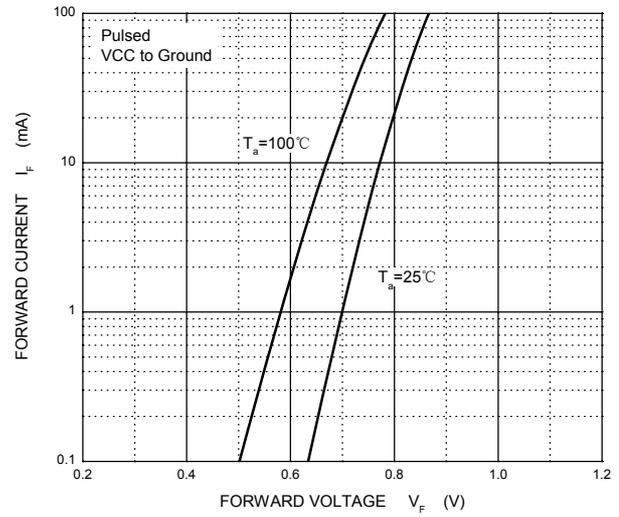
(2).Non-repetitive current pulse 8/20 $\mu\text{s}$  exponential decay waveform according to IEC61000-4-5

**TYPICAL CHARACTERISTICS**

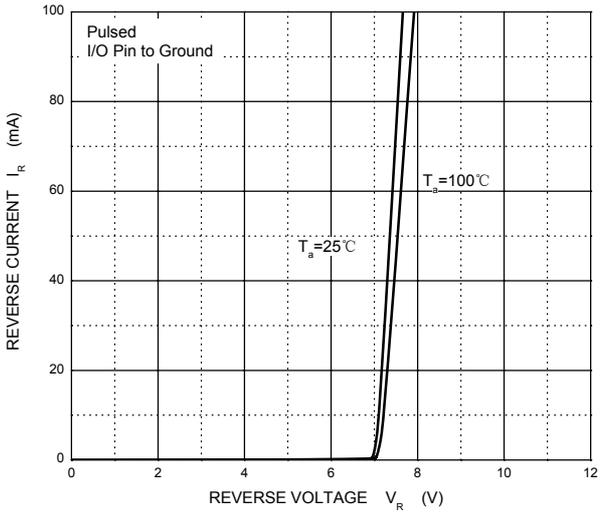
**Forward Characteristics**



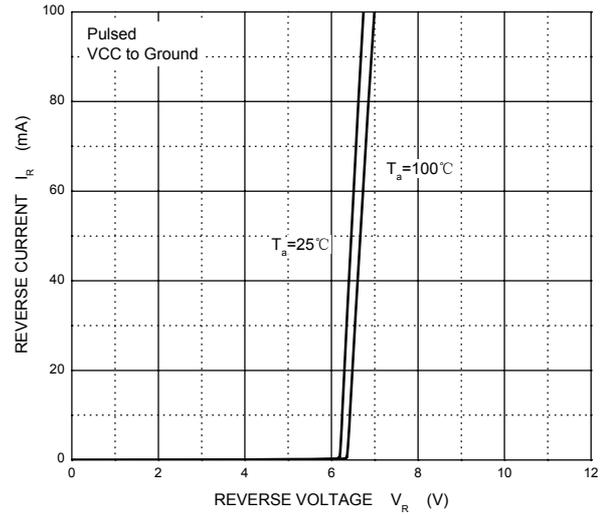
**Forward Characteristics**



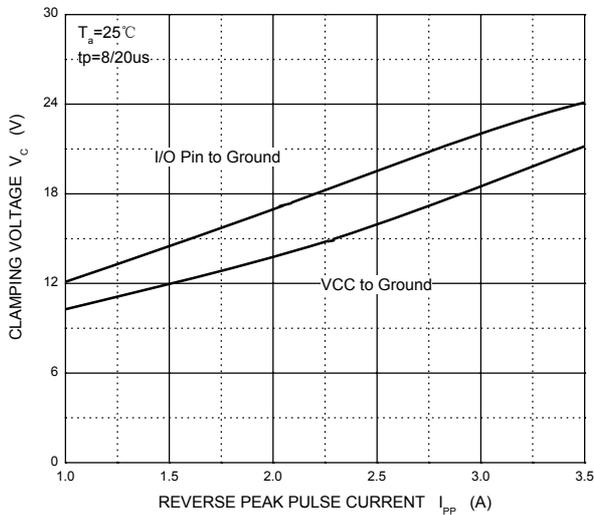
**Reverse Characteristics**



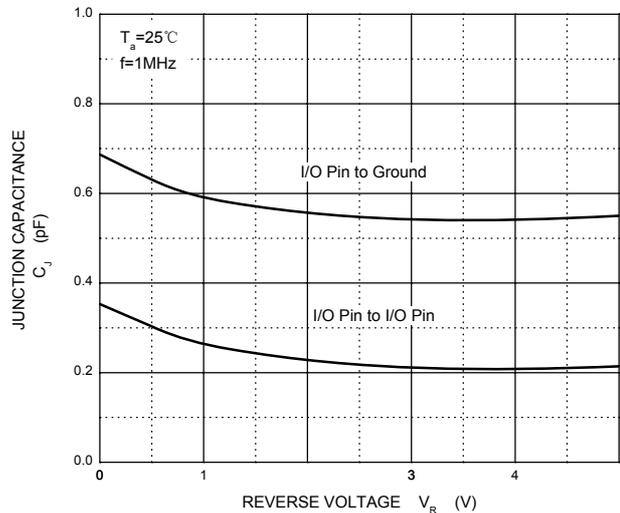
**Reverse Characteristics**



$V_C$  —  $I_{PP}$



**Capacitance Characteristics**





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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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Наши преимущества:

- Оперативные поставки широкого спектра электронных компонентов отечественного и импортного производства напрямую от производителей и с крупнейших мировых складов;
- Поставка более 17-ти миллионов наименований электронных компонентов;
- Поставка сложных, дефицитных, либо снятых с производства позиций;
- Оперативные сроки поставки под заказ (от 5 рабочих дней);
- Экспресс доставка в любую точку России;
- Техническая поддержка проекта, помощь в подборе аналогов, поставка прототипов;
- Система менеджмента качества сертифицирована по Международному стандарту ISO 9001;
- Лицензия ФСБ на осуществление работ с использованием сведений, составляющих государственную тайну;
- Поставка специализированных компонентов (Xilinx, Altera, Analog Devices, Intersil, Interpoint, Microsemi, Aeroflex, Peregrine, Syfer, Eurofarad, Texas Instrument, Miteq, Cobham, E2V, MA-COM, Hittite, Mini-Circuits, General Dynamics и др.);

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- Подбор оптимального решения, техническое обоснование при выборе компонента;
- Подбор аналогов;
- Консультации по применению компонента;
- Поставка образцов и прототипов;
- Техническая поддержка проекта;
- Защита от снятия компонента с производства.



#### Как с нами связаться

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