

## Linear Systems replaces discontinued Siliconix JPAD500

The LSJPAD500 is a low leakage Pico-Amp Diode packaged in TO-92

The LSJPAD500 extremely low-leakage diode provides a superior alternative to conventional diode technology when reverse current (leakage) must be minimized. The LSJPAD500 features a leakage current of  $-500$  pA and is well suited for use in applications such as input protection for operational amplifiers.

### LSJPAD500 Benefits:

- Negligible Circuit Leakage Contribution
- Circuit "Transparent" Except to Shunt High-Frequency Spikes
- Simplicity of Operation

### LSJPAD500 Applications:

- Op Amp Input Protection
- Multiplexer Overvoltage Protection

### FEATURES

DIRECT REPLACEMENT FOR SILICONIX JPAD500

REVERSE BREAKDOWN VOLTAGE	$BV_R \geq -35V$
ULTRALOW LEAKAGE	$\leq 500$ pA
REVERSE CAPACITANCE	$C_{RSS} \leq 2.0pF$

### ABSOLUTE MAXIMUM RATINGS

@ 25°C (unless otherwise noted)

### Maximum Temperatures

Storage Temperature	$-65^\circ C$ to $+150^\circ C$
Operating Junction Temperature	$-55^\circ C$ to $+135^\circ C$

### Maximum Power Dissipation

Continuous Power Dissipation	350mW
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### MAXIMUM CURRENT

Forward Current (Note 1)	10mA
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### LSJPAD500 ELECTRICAL CHARACTERISTICS @ 25°C (unless otherwise noted)

SYMBOL	CHARACTERISTICS	MIN.	TYP.	MAX.	UNITS	CONDITIONS
$BV_R$	Reverse Breakdown Voltage	-35	--	--	V	$I_R = -1\mu A$
$V_F$	Forward Voltage	--	0.8	1.5	V	$I_F = 5mA$
$C_{RSS}$	Total Reverse Capacitance	--	1.5	2	pF	$V_R = -5V, f = 1MHz$
$I_R$	Maximum Reverse Leakage Current	--	--	-500	pA	$V_R = -20V$

### Notes:

1. Absolute maximum ratings are limiting values above which LSJPAD500 serviceability may be impaired.

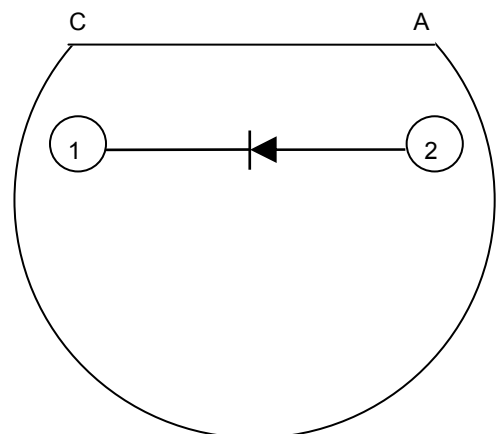
### Available Packages:

LSJPAD500 in TO-92  
LSJPAD500 available as bare die

Please contact Microcross for full package and die dimensions



TO-92 (Bottom View)



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