

**DESCRIPTION**

The SELCxxCI Series are ultra low capacitance transient voltage suppressor arrays, designed to protect applications such as portable electronics and SMART phones. This series is rated at 350 Watts for an 8/20μs waveshape.

The SELCxxCI Series meets IEC 61000-4-2 (ESD) and IEC 61000-4-4 (EFT) requirements. At higher operating frequencies or faster edge rates, insertion loss and signal integrity are a major concern. This series offers a ultra low capacitance and low leakage current in a miniature SOD-323 package.

**FEATURES**

- >350 Watts Peak Pulse Power per Line (tp=8/20μs)
- >Protects one I/O line (bidirectional)
- >Low clamping voltage
- >Working voltages: 3.3V, 5V, 8V, 12V, 15V, 18V,24V
- >Low leakage current

**APPLICATIONS**

- >Cell Phone Handsets and Accessories
- >Microprocessor based equipment
- >Personal Digital Assistants (PDA's)
- >Notebooks, Desktops, and Servers
- >Portable Instrumentation
- >Peripherals
- >USB Interface

**IEC COMPATIBILITY**

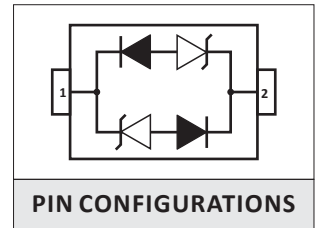
- >IEC61000-4-2 (ESD) ±30kV (air), ±30kV (contact)
- >IEC61000-4-4 (EFT) 40A (5/50ns)

**TYPICAL DEVICE CHARACTERISTICS**

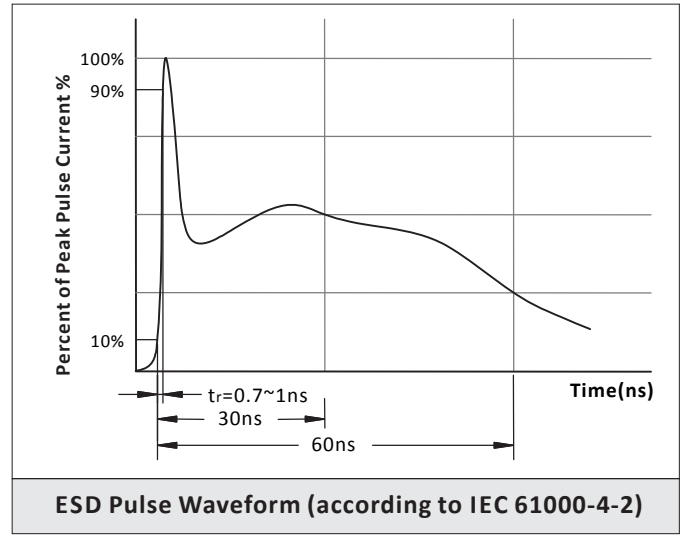
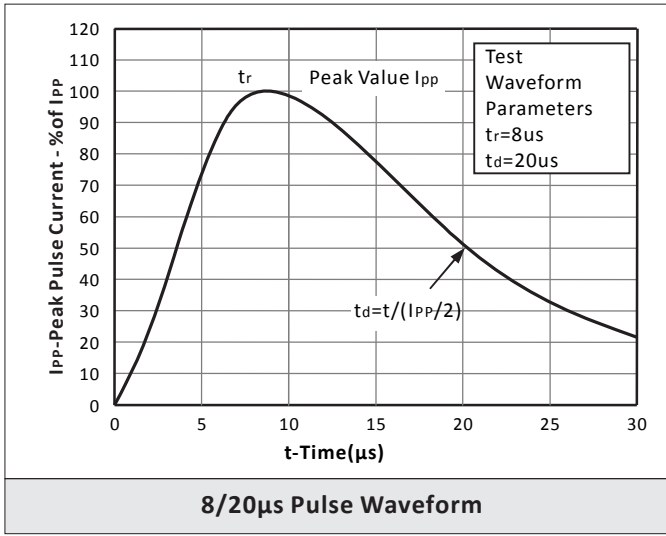
MAXIMUM RATINGS @ 25°C UNLESS OTHERWISE SPECIFIED			
PARAMETER	SYMBOL	VALUE	UNIT
Peak Pulse Power (tp=8/20μs waveform)	PPP	350	Watts
Operating Temperature Range	TJ	-55~125	°C
Storage Temperature Range	TSTG	-55~150	°C

**ELECTRICAL CHARACTERISTICS**

ELECTRICAL CHARACTERISTICS PER LINE @ 25°C UNLESS OTHERWISE SPECIFIED									
PART NUMBER	DEVICE MARKING	VRWM (V) Max.	VB (V) Min.	IT (mA)	Vc @1A Max.	Vc		IR (uA) Max.	CT (pF) Typ.
						Max.	@A		
SEL03CI	CC	3.3	4.0	1	7.5	21.0	15	1	1.0
SEL05CI	AC	5.0	6.0	1	9.8	25.0	14	1	1.0
SEL08CI	BC	8.0	8.5	1	13.4	26.0	12	1	1.0
SEL12CI	DC	12.0	13.3	1	19.0	30.0	7	1	1.0
SEL15CI	EC	15.0	16.7	1	24.0	35.0	6	1	1.0
SEL18CI	FC	18.0	20.0	1	27.0	40.0	5	1	1.0
SEL24CI	HC	24.0	26.7	1	43.0	56.0	3	1	1.0

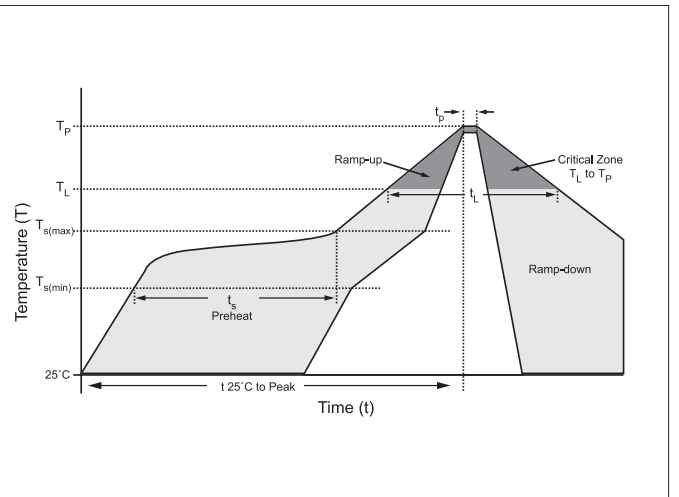


**CHARACTERISTIC CURVES**



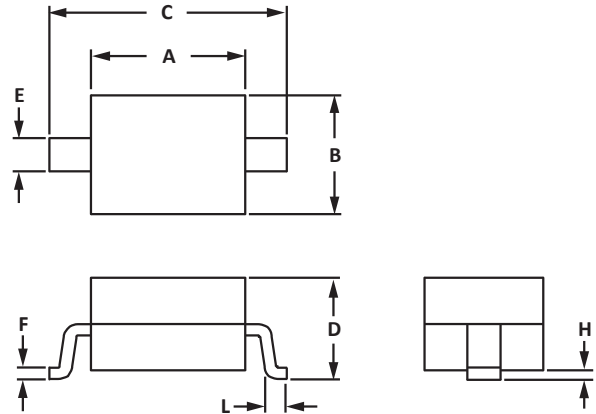
**REFLOW PROFILE**

Reflow Condition		Lead-free assembly
Pre Heat	Temperature Min (Ts(min))	150°C
	Temperature Max (Ts(max))	200°C
	Time (min to max) (ts)	60 – 180 secs
Average ramp up rate (Liquidus Temp (TL) to peak)		3°C/second max
Ts(max)to TL - Ramp-up Rate		3°C/second max
Reflow	Temperature (TL) (Liquidus)	217°C
	Time (min to max) (tl)	60 – 150 seconds
Peak Temperature (Tp)		260°C
Time within 5°C of actual peak Temperature (tp)		20 – 40 seconds
Ramp-down Rate		6°C/second max
Time 25°C to peak Temperature (Tp)		8 minutes Max.
Do not exceed		260°C



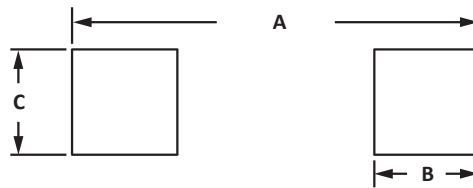
**SOD-323 PACKAGE INFORMATION**

OUTLINEDIMENSIONS				
DIM	MILLIMETERS		INCHES	
	MIN	MAX	MIN	MAX
A	1.60	1.90	0.063	0.075
B	1.15	1.45	0.045	0.057
C	2.39	2.70	0.094	0.106
D	0.80	1.10	0.031	0.043
E	0.25	0.40	0.010	0.016
F	0.10	0.20	0.004	0.008
H	-	0.10	-	0.004
L	0.20	-	0.008	-



**RECOMMENDED PAD LAYOUT DIMENSION**

PAD LAYOUT DIMENSIONS				
DIM	MILLIMETERS		INCHES	
	MIN	MAX	MIN	MAX
A	2.87	3.12	0.113	0.123
B	0.66	0.91	0.026	0.036
C	0.66	0.91	0.026	0.036



**ORDERING INFORMATION**

Part Number	Component Package	QTY/Reel	Reel Size
SEL03CI	SOD-323	3000PCS	7"

## **CONTACT US**

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