

OM SENI

H15VU10B

Bi-directional 15V Ultra Small Capacitance ESD

DFN1006-2L Plastic-Encapsulate ESD Protection Diodes**Features**

- Low leakage current
- DFN1006 surface mount package
- IEC 61000-4-2 (ESD Air): $\pm 15\text{kV}$
- IEC 61000-4-2 (ESD Contact): $\pm 8\text{kV}$
- IEC 61000-4-5 (Lightning 8/20 μs): 2.5A

Applications

- Cellular Handsets and Accessories
- Notebooks and Handhelds, Audio Players, Peripherals
- Personal Digital Assistants, Portable
- Keypads, Side Keys, LCD Displays

Function Diagram

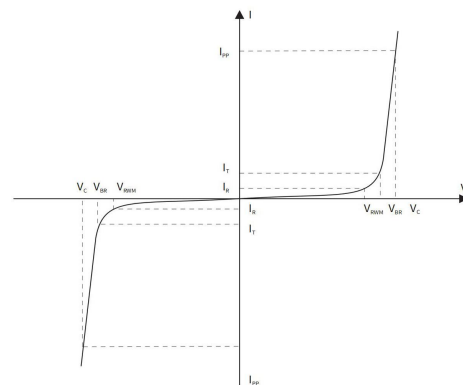
Reverse Working Voltage
15V Max.
Ultra Small capacitance
0.5pF(Max.)

**Maximum Ratings** ($T_a=25^\circ\text{C}$ Unless otherwise specified)

SYMBOL	PARAMETER	CONDITIONS	VALUE	UNIT
V_{ESD}	Electrostatic Discharge Voltage	ESD per IEC 61000-4-2(Air)	± 15	KV
		ESD per IEC 61000-4-2(Contact)	± 8.0	KV
P_{PP}	Peak Pulse Power	$t_p = 8/20 \mu\text{s}$	90	W
I_{PP}	Rated Peak Pulse Current	$t_p = 8/20 \mu\text{s}$	2.5	A
T_J	Operating JunctionTemperature Range	—	-55 to +125	$^\circ\text{C}$
T_{STG}	Operating JunctionTemperature Range	—	-55 to +150	$^\circ\text{C}$

Electrical Parameter

SYMBOL	PARAMETER
V_C	Clamping Voltage @ I_{PP}
V_{BR}	Breakdown Voltage @ I_T
I_{PP}	Peak Pulse Current
I_T	Test Current
I_R	Reverse Leakage Current @ VRWM
V_{RWM}	Peak Reverse Working Voltage
P_{PP}	Peak Pulse Power Dissipation
C_J	Junction Capacitance @ $V_R=0\text{V}, f=1\text{MHz}$
I_F	Forward Current
V_F	Forward Voltage @ I_F

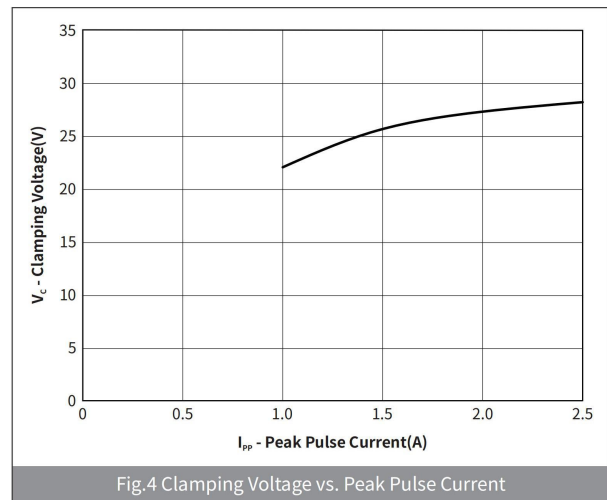
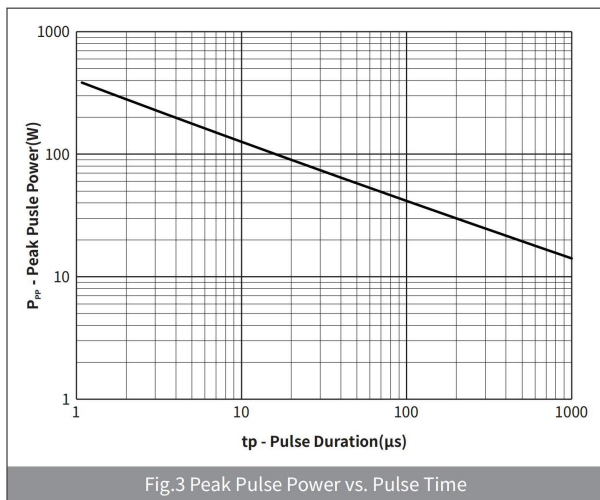
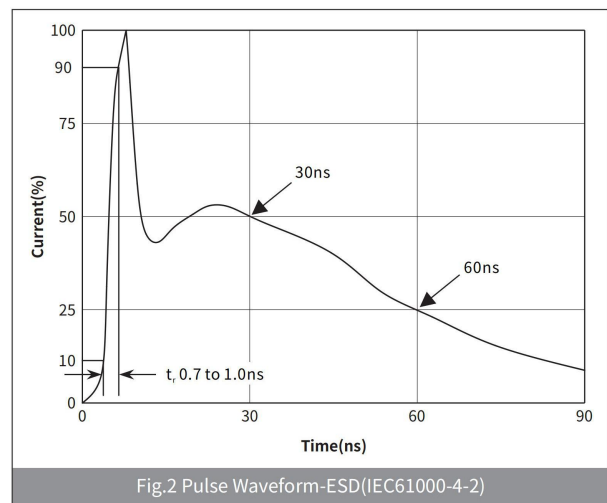
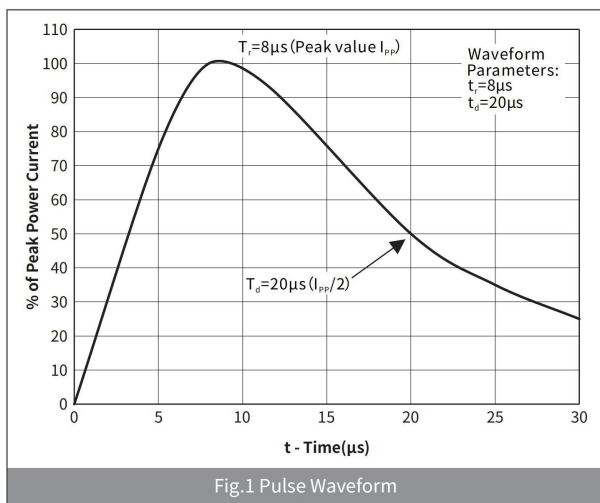


OM SENI

Electrical Characteristics (Ta=25°C Unless otherwise specified)

PARAMETER	SYMBOL	CONDITION	Min	Typ	Max	UNIT
Peak Reverse Working Voltage	V_{RWM}	$T_a=25^\circ\text{C}$	—	—	15	V
Breakdown Voltage	V_{BR}	$I_R=1.0\text{mA}, T_a=25^\circ\text{C}$	16.7	—	21.5	V
Reverse Leakage Current	I_R	$V_R=15\text{V}, T_a=25^\circ\text{C}$	—	—	0.2	μA
Clamping Voltage	V_C	$I_{PP}=1.0\text{A}, t_p=8/20\mu\text{s}$	—	—	26	V
		$I_{PP}=2.5\text{A}, t_p=8/20\mu\text{s}$	—	—	35	
Junction Capacitance	C_J	$V_R=0\text{V}, f=1\text{MHz}$	—	0.3	0.5	pF

Ratings And Characteristics Curves (Ta=25°C Unless otherwise specified)

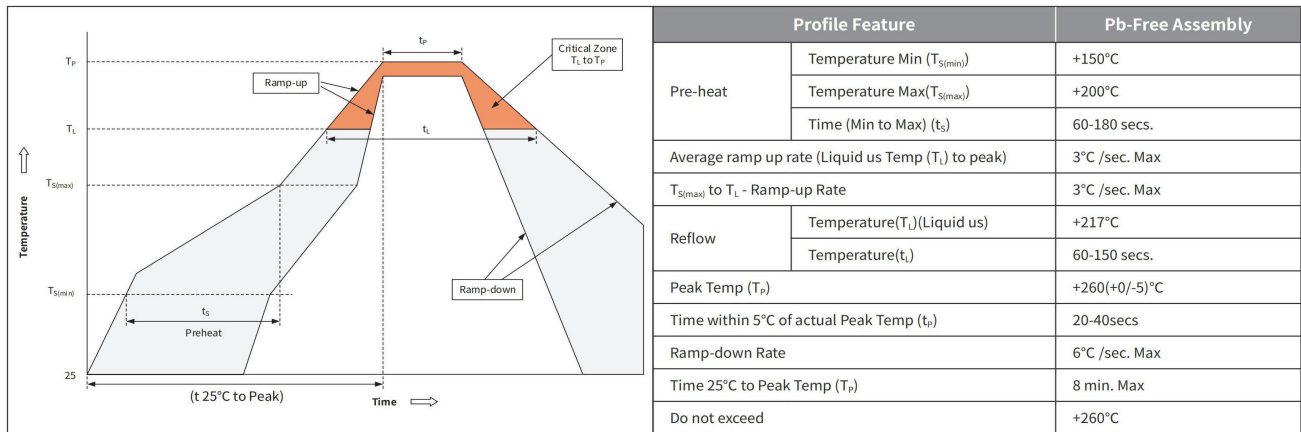


OM SENI

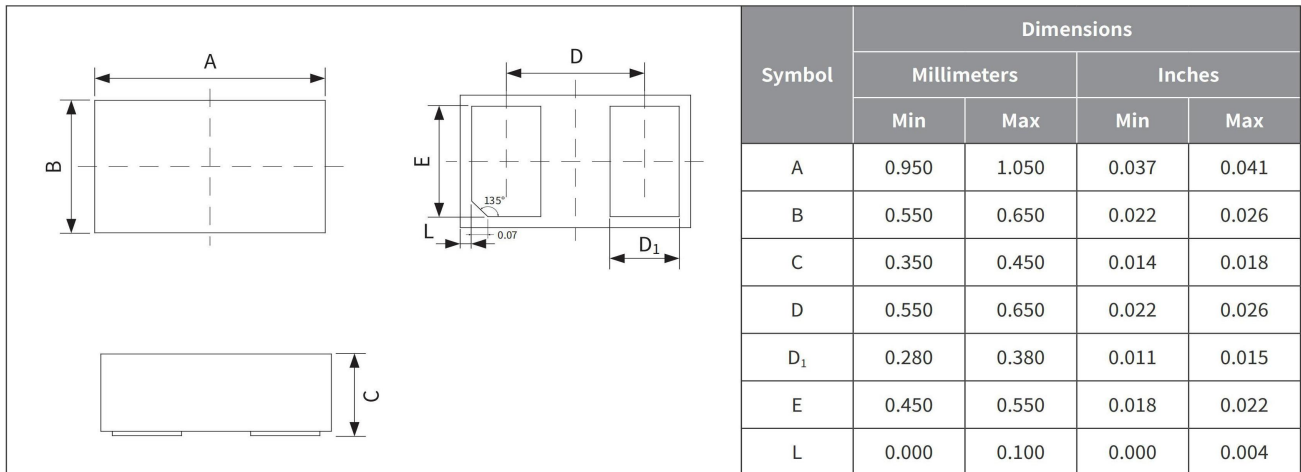
Ordering Information

PREFERRED P/N	PACKAGE	SIZE(mm)	DELIVERY MODE	MPQ(PCS)
	DFN1006-2L	1.00×0.60×0.37	7" REEL	10,000

Recommended Soldering Conditions



Package Outline Dimensions (DFN1006-2L)



Suggested Pad Layout

