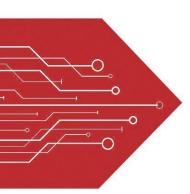
MSKSEMI















ESD

TVS

TSS

MOV

GDT

PLED

Broduct data speet









30W (8/20µs) Peak Pulse Power

Low Capacitance ESD Protection

DFN1006 Package

RoHS Compliant

Matte Tin Lead finish (Pb-Free)

Protect One High Speed Data Line

Meet IEC61000-4-2 Level 4:

Contact Discharge > 8kV

Air Discharge > 15kV

Applications

Communication System

Portable Instrumentation

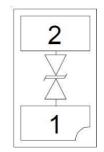
Audio and Video Equipment

Computers and Peripherals

USB 1.1, USB 2.0 Ports

PIN Diagram





Maximum Ratings (Ta = 25°C)

Symbol	Parameter	Value	Unit
РРК	Peak Pulse Power	30	W
IPP	Peak Pulse Current	2	А
VESD (Contact)	Contact ESD Voltage per IEC61000-4-2	8	kV
VESD (Air)	Air ESD Voltage per IEC61000-4-2	15	kV
TJ	Junction Temperature	-55 to +150	°C
TSTG	Storage Temperature	-55 to +150	$^{\circ}$

Electrical Characteristics (Ta = 25° C)

Symbol	Parameter	Conditions	Min	Тур	Max	Unit
VRWM	Reverse Working Peak Voltage				5	V
VBR	Reverse Breakdown Voltage	IT = 1mA	5.5		9.5	V
IR	Reverse Leakage Current	VRWM = 5V			0.1	μA
VC	Clamping Voltage	IPP = 1A (8/20μs)			12	V
VC	Clamping Voltage	IPP = 2A (8/20μs)			15	V
CJ	Capacitance	VR = 0V, f = 1MHz		3.0	3.5	pF

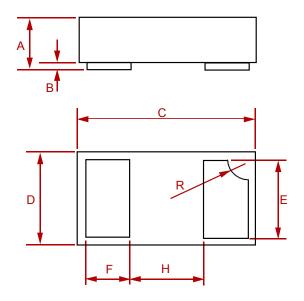






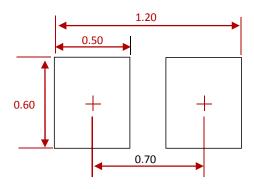


PACKAGE MECHANICAL DATA



Direc	Inches		Millimeters		
Dim	MIN	MAX	MIN	MAX	
Α	0.0125	0.02	0.32	0.52	
В	0.000	0.002	0.00	0.05	
С	0.037	0.043	0.95	1.080	
D	0.022	0.027	0.55	0.680	
E	0.016	0.024	0.40	0.60	
F	0.008	0.012	0.20	0.30	
Н	0.015Typ.		0.40Тур.		
R	0.001	0.005	0.05	0.15	

Suggested Pad Layout



NOTES:

- 1. CONTROLLING DIMENSIONS ARE IN MILLIMETERS (ANGLES IN DEGREES).
- 2. THIS LAND PATTERN IS FOR REFERENCE PURPOSES ONLY. CONSULT YOUR MANUFACTURING GROUP TO ENSURE YOUR COMPANY'S MANUFACTURING GUIDELINES ARE MET.

REEL SPECIFICATION

P/N	PKG	QTY
ESD9B5VL-MS	DFN1006	10000



Semiconductor

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