



Low Capacitance ESD Protection

Voltage

7 V

Features

• IEC61000-4-2(ESD) : ± 30 kV Air, ± 30 kV Contact

• IEC61000-4-4(EFT) : 40 A(5/50 ns)

• IEC61000-4-5(Lightning) : 5 A(8/20 uS)

• Low leakage current, maximum of 1uA at rated voltage

• Ultra low capacitance

• Low clamping voltage

• Lead free in compliance with EU RoHS 2.0

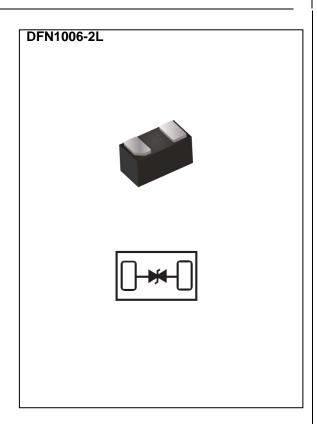
• Green molding compound as per IEC 61249 standard

Mechanical Data

• Case: DFN1006-2L Package

• Terminals : Solderable per MIL-STD-750, Method 2026

• Approx. Weight: 0.0006 grams



Maximum Ratings and Thermal Characteristics (T_A = 25 °C unless otherwise noted)

PARAMETER	SYMBOL	LIMIT	UNITS	
ESD IEC61000-4-2(Air)	V	± 30	1-1/	
ESD IEC61000-4-2(Contact)	V _{ESD}	± 30	kV	
Operating Junction Temperature Range	TJ	-55~150	°C	
Storage Temperature Range	T _{STG}	-55~150	°C	





Electrical Characteristics (T_A = 25 °C unless otherwise noted)

PARAMETER	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNITS	
Reverse Stand-Off Voltage(Note 1)	V _{RWM}	-	-	-	7	V	
Reverse Breakdown Voltage	V_{BR}	I _{BR} = 1 mA	7.5	-	10	V	
Reverse Leakage Current	I _R	V _R = 7 V	-	-	1	uA	
Clamping Voltage	VcL	$I_{PP} = 1 \text{ A}, t_P = 8/20 \text{ us}$	1	-	12	V	
		$I_{PP} = 5 \text{ A}, t_P = 8/20 \text{ us}$	-	-	15		
Off State Junction Capacitance	СЈ	0Vdc Bias f = 1MHz	-	-	15	pF	

NOTES:

1. A transient suppressor is selected according to the working peak reverse voltage(V_{RWM}), which should be equal to or greater than the DC or continuous peak operation voltage level.

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TYPICAL CHARACTERISTIC CURVES

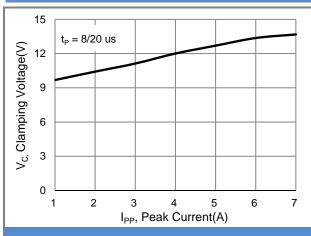
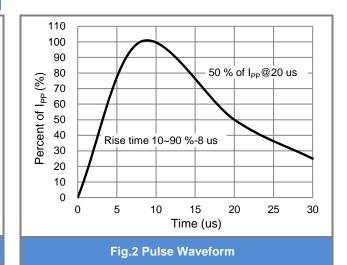


Fig.1 Typical Peak Clamping Voltage



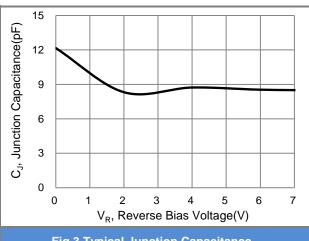


Fig.3 Typical Junction Capacitance

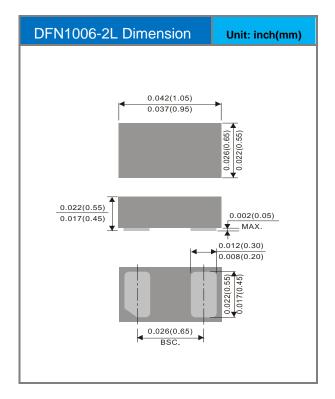


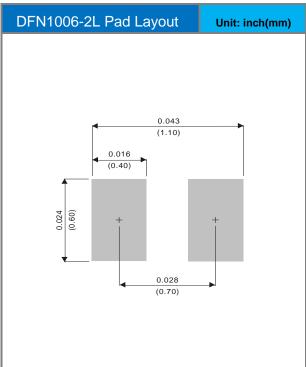


Product and Packing Information

Part No.	Package Type	Packing Type	Marking	Version
PEC3107M1AQ	DFN1006-2L	10K pcs / 7" Reel	K7	Halogen free RoHS compliant

Packaging Information & Mounting Pad Layout









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