

General Description

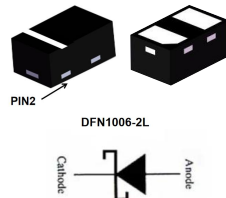
The DSD4148V10 is mainly designed to protect the coil of communication equipment. Low forward voltage drop, low reverse leakage, and high reliability provide best in class protection on designs. Because of its ultra high speed, high reliability and low loss, it is ideal for use in portable device, mobile applications, clamping protection, LCD and Keypad Back lighting.

Specification Features

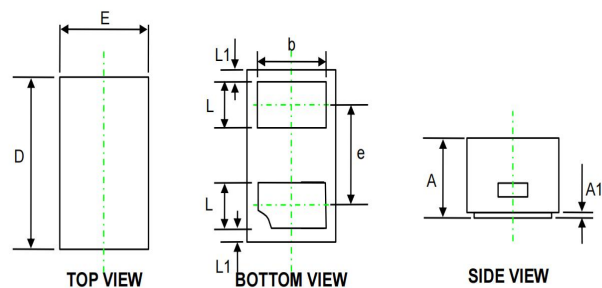
Small Body Outline Dimensions: nom 0.039" x 0.024" (1.0x0.6 mm)
 Low Body Height: nom 0.019" (0.5 mm)
 Low Forward Voltage Drop
 Peak reverse voltage: 80.0 V
 Low reverse leakage
 Fast reverse recovery : 4ns
 High reliability
 Totally Lead-Free & Fully RoHS Compliant

Application

Reverse protection Diode
 Switching Diode
 Clamping protection



DFN1006-2L



Symbol	Dimensions in Millimeters (mm)		
	Min.	Typ.	Max.
A	0.44	0.47	0.50
A1	0.00	0.03	0.05
D	0.95	1.00	1.08
E	0.55	0.60	0.68
b	0.40	0.50	0.60
e	-	0.65	-
L	0.20	0.25	0.30
L1	0.05 REF.		

Dimensions in inches and (millimeters)

Absolute Maximum Ratings($T_J = 25^\circ\text{C}$)

Rating	Symbol	Value	Unit
Peak Reverse Voltage	V_{RM}	80	V
Forward current	I_F	100	mA
Junction Temperature Range	T_J	-55 to +125	$^\circ\text{C}$
Storage Temperature Range	T_{stg}	-50 to +125	$^\circ\text{C}$
Lead Solder Temperature – Maximum (10 Second Duration)	T_L	260	$^\circ\text{C}$

Note : FR-5 = 1.0*0.75*0.062inch (25.4*19.05*1.58mm).

1N4148WL2

Electrical Characteristics($T_J = 25^{\circ}\text{C}$ unless otherwise specified)

Parameter	Symbol	Conditions	Min.	Typ.	Max.	Units
Reverse Voltage	V_R	$I_R = 100\mu\text{A}$	80			V
Reverse Current	I_R	$V_R = 20\text{V}$			0.025	μA
		$V_R = 80\text{V}$			1	
Forward Voltage	V_F	$I_F = 1\text{mA}$		0.59	0.65	V
		$I_F = 10\text{mA}$		0.72	0.8	
		$I_F = 50\text{mA}$		0.82	0.9	
		$I_F = 100\text{mA}$		0.91	1.0	
		$I_F = 150\text{mA}$		0.98	1.2	
Total Capacitance	C_{tot}	$V_R = 0\text{V}, f = 1\text{MHz}$		2	3	pF
Reverse Recovery	t_{rr}	$I_F = I_R = 10\text{mA}, I_{\text{rr}} = 0.1 \cdot I_R$			4	ns