

FEATURES

- RoHS Compliant
- Low Ripple and Noise
- Single and Dual Outputs
- Ultra Miniature SIP: 12 Pin
- Regulated and Non-Regulated Versions Available
- Two Levels of I/O Isolation Available: 500VDC or 3KVDC



DESCRIPTION

When board space is at a premium and voltage conversions require low power the LAN F series miniature converters offer superior performance for an economical price. A multitude of options and operating ranges allow you to custom-tailor these converters to your application requirements. These dc/dc converters provide up to 1.8 watts of power while maintaining specifications over the entire commercial operating temperature range.

SPECIFICATIONS: LAN F Series

All specifications apply @ ±25°C ambient unless otherwise noted

INPUT SPECIFICATIONS

Input Voltage Range	5V nom. input	4.5 – 5.5VDC
	12V nom. input	10.8 – 13.2VDC
	15V nom. input	13.5 – 16.5VDC
	24V nom. input	21.6 – 26.4VDC

Input Filter Pi Network.

OUTPUT SPECIFICATIONS

Output Current	see table
Output Voltage	see table
Voltage Tolerance (nom. Line 100% load)	±5%
Line Regulation	
Regulated	±0.5% max.
Non-Regulated	±1.2%/ % of Vin
Load Regulation	
Regulated	±0.5%
Non-Regulated (load 20% to 100%)	±10%
Ripple/Noise (20 MHz BW)	50mVp-p max.

PROTECTION

Short Circuit Protection	
Regulated Models	Continuous
Non-Regulated Models	short term

GENERAL SPECIFICATIONS

Efficiency	
Regulated	55 to 65% typ.
Non-Regulated	70 to 75% typ.
Switching Frequency	20KHz min.
Isolation Voltage (input to output)	
Standard	500VDC
"H" suffix	3000VDC

ENVIRONMENTAL SPECIFICATIONS

Operating Temperature	-25°C to +71°C
Storage Temperature	-40°C to +100°C
Cooling	Free air convection
MTBF	
Regulated	1,549,371 hrs at 50°C (MIL-HDBK-217F)
Non-Regulated	2,500,000 hrs at 50°C (MIL-HDBK-217F)

PHYSICAL SPECIFICATIONS

Weight	0.3oz (8.3g)
Dimensions	1.25(L) x 0.34(W) x 0.57(H) inches 31.8(L) x 8.6(W) x 14.5(H) mm
Case Material	Non-conductive black plastic

Due to advances in technology, specifications subject to change without notice



Wall Industries, Inc.

Rev. D

LAN F Series
Up to 1.8 Watts
DC/DC Converter
Single and Dual Outputs

OUTPUT VOLTAGE / CURRENT RATING CHART

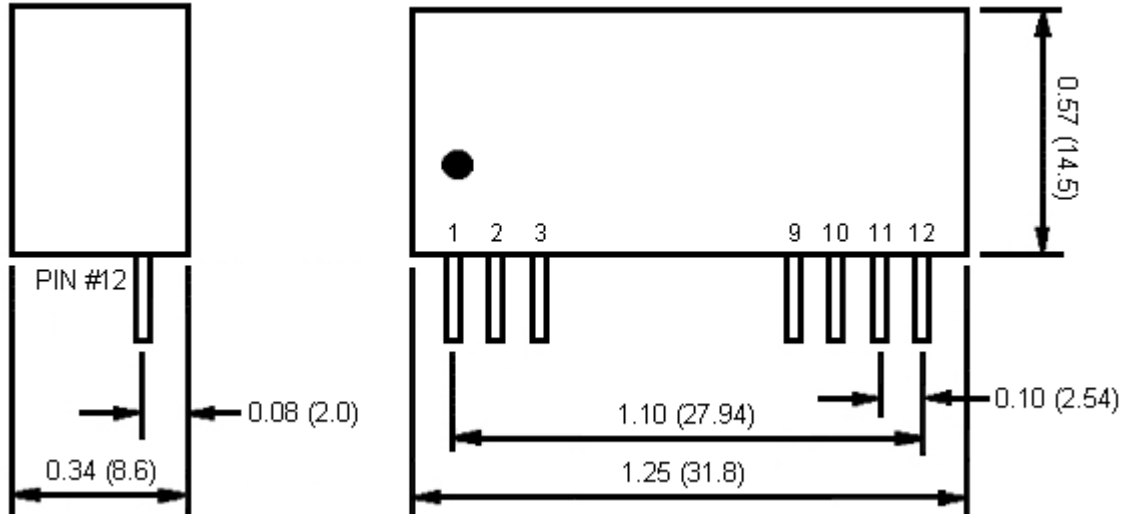
Model (See Note 2)	Input Voltage Range	Output Voltage	Output Current
LANF505N	5 VDC (4.5 – 5.5 VDC)	5 VDC	300 mA
LANF509N		9 VDC	170 mA
LANF512N		12 VDC	125 mA
LAN5515N		15 VDC	100 mA
LANF524N		24 VDC	65 mA
LANF505ND		±5 VDC	100 mA
LANF512ND		±12 VDC	60 mA
LAN5515ND		±15 VDC	50 mA
LANF1205N		12 VDC (10.8 – 13.2 VDC)	5 VDC
LANF1209N	9 VDC		170 mA
LANF1212N	12 VDC		125 mA
LANF1215N	15 VDC		100 mA
LANF1224N	24 VDC		65 mA
LANF1205ND	±5 VDC		100 mA
LANF1212ND	±12 VDC		60 mA
LANF1215ND	±15 VDC		50 mA
LANF1505N	15 VDC (13.5 – 16.5 VDC)		5 VDC
LANF1509N		9 VDC	170 mA
LANF1512N		12 VDC	125 mA
LANF1515N		15 VDC	100 mA
LANF1524N		24 VDC	65 mA
LANF1505ND		±5 VDC	100 mA
LANF1512ND		±12 VDC	60 mA
LANF1515ND		±15 VDC	50 mA
LANF2405N		24 VDC (21.6 – 26.4 VDC)	5 VDC
LANF2409N	9 VDC		170 mA
LANF2412N	12 VDC		125 mA
LANF2415N	15 VDC		100 mA
LANF2424N	24 VDC		65 mA
LANF2405ND	±5 VDC		100 mA
LANF2412ND	±12 VDC		60 mA
LANF2415ND	±15 VDC		50 mA

NOTES

1. All case and pin-to-case dimensions reference only unless otherwise noted.
2. All LANF models can be regulated, substitute “R” for “N” in last digits of part number (Ex: LANF2415R).
3. Add “H” onto the end of LANF part number for 3000VDC isolation (Ex: LANF2415NH).

MECHANICAL DRAWING

Unit: inches (mm)



Pin size (flat pin): 0.5mm wide
0.25mm thick
3.8mm long

PIN CONNECTION		
PIN	SINGLE OUTPUT	DUAL OUTPUT
1	+INPUT	+INPUT
2	NC	-OUTPUT
3	NC	NC
9	NC	NC
10	-OUTPUT	COM
11	+OUTPUT	+OUTPUT
12	-INPUT	-INPUT