

8m122416

3 Dimming Options

Pulse-Width Modulated Controlled

Resistive Controlled

Voltage Controlled

* should be selected to be compatible with LCD and display driver

* value should be low enough to maintain minimum tube current at minimum brightness

* Vmin should be high enough to maintain minimum tube current

Note 1 Input by-pass capacitor (25 uf - 100uf) may be required to reduce reflected ripple.

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8m Class
DC to AC Inverter

8m Package

Specifications and
Applications Information

7/10/00 Preliminary

The ERG 8m122416 (8m Class) low profile dc to ac inverter is specifically designed to power the Optrex DMF51201NC-FW-AA LCD display module to a moderate brightness level from a +12 volt dc source.

This low profile inverter features:

- ✓ Less Than 8 mm in Height
- ✓ LCD Module Specific
- ✓ Display Compatible Output Connector
- ✓ Firm Specifications
- ✓ Application Information
- ✓ Designed, Manufactured and Supported in the USA
- ✓ Custom Input and Output Voltages
- ✓ Flexible System Interface
- ✓ Notebook Display Head Compatible

Pin Descriptions

Input Connector	Output Connector
4 pins are 0.315" [8,00] Long, 0.025" [0,63] Square and are on 0.100" [2,54] Centers.	JST SM02(8.0)B-BHS-1-TB
Con1-1 Vin(+)	Con2-1 ACout
Con1-2 GND	Con2-2 NC
Con1-3 Control	Con2-3 NC
Con1-4 NC	Con2-4 ACout

Package Configuration

8m122416

Absolute Maximum Ratings

Rating	Symbol	Value	Units
Input Voltage Range	Vin	-0.3 to +13.2	Vdc
Operating Temperature	To	-0 to +70	°C
Storage Temperature	Tstg	-40 to +85	°C

Recommended Operating Conditions

Rating	Symbol	Value	Units
Input Voltage	Vin	+6 to 13.2	Vdc

Electrical Characteristics

Unless otherwise noted Vin = 12.00 Volts dc and Ta = 25 °C

Characteristic	Symbol	Min	Typ	Max	Units
Input Current	lin	-	.125	.150	Adc
Operating Frequency	Fo	27	32	37	KHz
Minimum Output Voltage	Vout (min)	1000	-	-	Vrms
Efficiency	η	-	72	-	%
Output Current	lout	-	2.6	-	marms
Output Voltage (When powering a load simulating the referenced display)	Vout	-	415	-	Vrms
Pin3 Input Current Requirement	-	-	3	-	madc

After tube has been allowed to warm-up for 5 minutes
External Disable Circuit shown on page 3.

Specifications subject to change without notice.

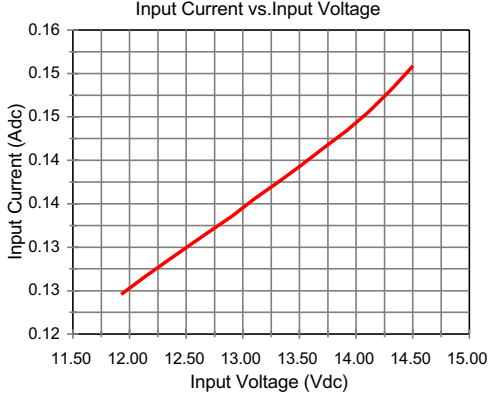
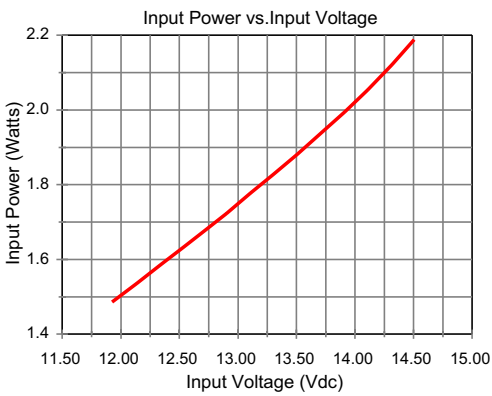
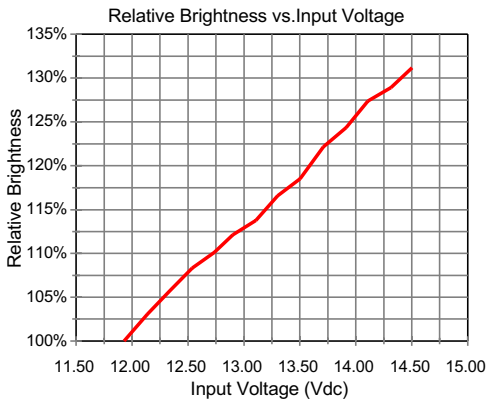
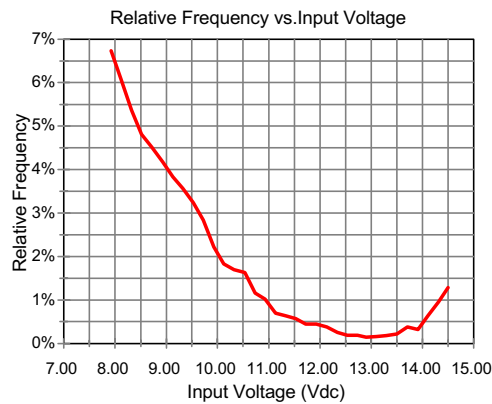


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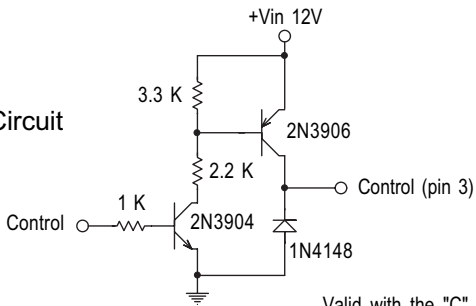
Made in USA

Typical Performance Curves

8m122416



Disable Circuit



Valid with the "C" jumper removed



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