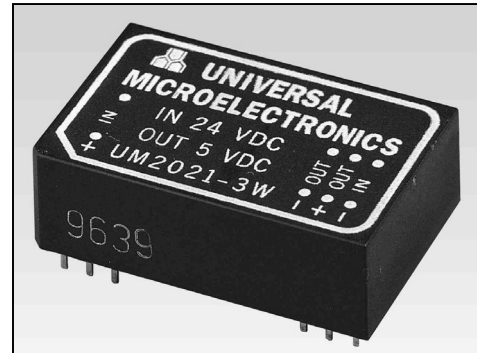


# UM2000-3W SERIES

## 3 Watt DC-DC Converters

- ◆ 24 Pin Dip Package
- ◆ High Efficiency (up to 80%)
- ◆ Regulated Outputs
- ◆ Pi Input Filter
- ◆ 500 VDC Isolation
- ◆ Continuous Short Circuit Protection



### SPECIFICATIONS

All specifications are typical at nominal line, full load and 25°C unless otherwise noted.

### OUTPUT SPECIFICATIONS

Voltage Accuracy .....	±2.0% max.
Voltage Balance (Dual) <sup>1</sup> .....	±2.0% max.
Ripple and Noise, 20MHz BW, 3.3V .....	60mVp-p max.
5V .....	100mVp-p max.
12/15V .....	1% p-p max.
Temperature Coefficient .....	±0.05%/°C
Short Circuit Protection .....	Continuous
Line Regulation <sup>2</sup> .....	±0.5%
Load Regulation <sup>3</sup> .....	±0.5%

### GENERAL SPECIFICATIONS

Efficiency .....	See Table
Isolation Voltage .....	500 VDC min.
Isolation Resistance .....	10 <sup>8</sup> ohms min.
Switching Frequency .....	100 KHz-850KHz (Depending on Loading)
Operating Temperature Range	
Ambient, None Derating .....	-25°C to +71°C
Cooling .....	Free Air Convection
Storage Temperature Range .....	-40°C to +100°C
Dimensions CASE A .....	1.25*0.8*0.4 inches (31.8*20.3*10.2mm)
Case Material	
Standard Models .....	Non-Conductive Black Plastic UL94V-0
Weight .....	15g

### INPUT SPECIFICATIONS

Input Voltage Range, 12V .....	9-18V
24V .....	18-36V
48V .....	36-72V
Input Filter .....	Pi Network

### NOTES:

1. For common output models.
2. Measured from high line to low line.
3. Measured from full load to 10% load.



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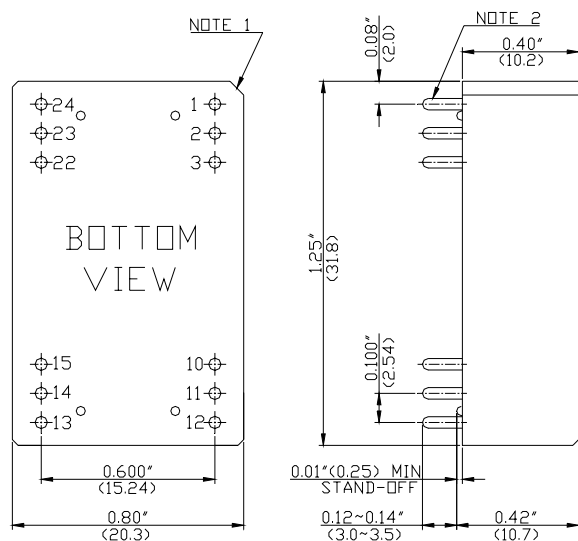
2539 W. 237TH STREET, SUITE A,  
TORRANCE, CA 90505  
TEL: (310) 326-7072 FAX: (310) 326-7058

MODEL NUMBER	INPUT VOLTAGE	OUTPUT VOLTAGE	OUTPUT CURRENT	INPUT CURRENT		CASE	EFFICIENCY
				NO LOAD	FULL LOAD		
UM2011-3W	12 VDC	5 VDC	600 mA	50 mA	343 mA	A	73%
UM2012-3W		12 VDC	250 mA	50 mA	334 mA		75%
UM2013-3W		15 VDC	200 mA	50 mA	334 mA		75%
UM2014C-3W		± 5 VDC	±300 mA	50 mA	343 mA		73%
UM2015C-3W		±12 VDC	±125 mA	70 mA	338 mA		74%
UM2016C-3W		±15 VDC	±100 mA	80 mA	338 mA		74%
UM2017-3W		9 VDC	333 mA	50 mA	333 mA		75%
UM2021-3W	24 VDC	5 VDC	600 mA	30 mA	167 mA	A	75%
UM2022-3W		12 VDC	250 mA	30 mA	161 mA		78%
UM2023-3W		15 VDC	200 mA	30 mA	161 mA		78%
UM2024C-3W		± 5 VDC	±300 mA	35 mA	167 mA		75%
UM2025C-3W		±12 VDC	±125 mA	35 mA	163 mA		77%
UM2026C-3W		±15 VDC	±100 mA	35 mA	163 mA		77%
UM2027-3W		9 VDC	333 mA	30 mA	160 mA		78%
UM2031-3W	48 VDC	5 VDC	600 mA	5 mA	84 mA	A	75%
UM2032-3W		12 VDC	250 mA	10 mA	79 mA		80%
UM2033-3W		15 VDC	200 mA	10 mA	79 mA		80%
UM2034C-3W		± 5 VDC	±300 mA	10 mA	84 mA		75%
UM2035C-3W		±12 VDC	±125 mA	15 mA	81 mA		78%
UM2036C-3W		±15 VDC	±100 mA	15 mA	81 mA		78%
UM2037-3W		9 VDC	333 mA	10 mA	78 mA		80%
UM2039-3W		3.3 VDC	500 mA	5 mA	48 mA		73%

MODEL NUMBER	UM2011-3W UM2021-3W UM2031-3W UM2039-3W	UM2012-3W UM2022-3W UM2032-3W	UM2013-3W UM2023-3W UM2033-3W	UM2014C-3W UM2024C-3W UM2034C-3W	UM2015C-3W UM2025C-3W UM2035C-3W	UM2016C-3W UM2026C-3W UM2036C-3W	UM2017-3W UM2027-3W UM2037-3W
MAXIMUM <sup>1</sup> CAPACITIVE LOAD (uF)	120	47	39	+56 -56	+22 -22	+18 -18	68

NOTE: 1. Maximum capacitive load across the output ports should not be over following indicated values.

CASE A



PIN CONNECTIONS		
Pin	Single Output	Dual Output
1	+V Input	+V Input
2	NC*	-V Output
3	NC*	Common
10	-V Output	Common
11	+V Output	+V Output
12	-V Input	-V Input
13	-V Input	-V Input
14	+V Output	+V Output
15	-V Output	Common
22	NC*	Common
23	NC*	-V Output
24	+V Input	+V Input

\* NC (NO Connection)

All dimensions in inches (mm).

Note 1: Cut-corner marking for Pin No.1

Note 2: Pin size is 0.020±0.005 inches (0.5mm) dia.

Or 0.020\*0.012 inch

Note 3: Tolerance .xx =±0.04"

.xxx=±0.010"



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