

Features:

- Single In Line Package
- Up To 2W Unregulated Output Power
- 100% Burned In
- High Efficiency
- Internal SMD Technology
- Low Cost
- No Heatsink Required
- UL 94V-0 Package Material
- Custom Solutions Available
- RoHS Compliant



Specifications:

Output Specifications

Voltage Setpoint Accuracy	+/-2% max
Temperature Coefficient	+/-0.05%/°C
Ripple & Noise (20MHz BW) ¹	100mVp-p max
Line Regulation ²	+/-1.2% max
Load Regulation ³	+/-8% max
Minimum Load	10% of Full Load
Short Circuit Protection	Momentary
Transient Response ⁴	100uS max

Input Specifications

Input Voltage Range	+/-10% max
Input Filter	Capacitor Typ
Protection	Fuse Recommended

Environmental Specifications

Operating Temperature	-25 °C to +71 °C
Storage Temperature	-55 °C to +125 °C
Humidity	95% max
Cooling	Free-Air Convection

General Specifications

Efficiency	72%-85%
Isolation Voltage ⁵	1500VDC min
Isolation Resistance	109 ohms min
Isolation Capacitance	80pF max
Switching Frequency	100KHz min
MTBF ⁶	>1,700,000 Hours
Weight	2.0g Typ
Case Material	Non-Conductive Plastic
Case Size	14.0mm*7.5mm*10.14mm
Conducted Emissions	EN55022 Class A
Radiated Emissions	EN55022 Class A

All Specifications Typical at Nominal Line, Full Load, and 25 °C Unless Otherwise Noted.

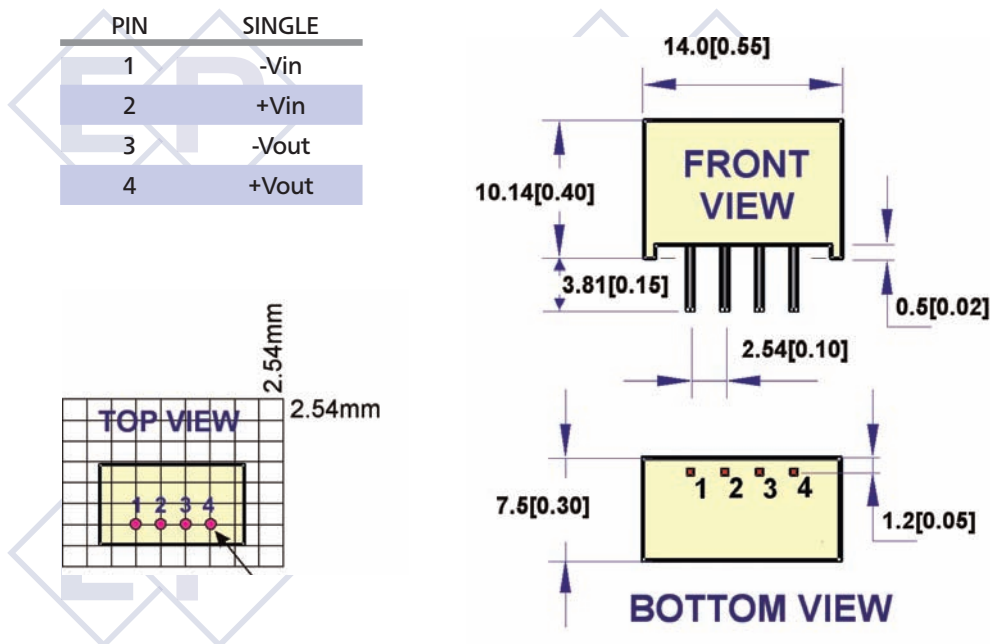
Footnotes: ¹ Measured with 1uF ceramic capacitor connect to the output pins. ² Line Regulation is for a 1.0% change in input Voltage. ³ Load Regulation is for output load current change from 20% to 100%. ⁴ 25% Step Load Change. ⁵ For 10 seconds. ⁶ MIL-HDBK-217F @25°C , Ground Benign.

Selection Guide 2W Output

MODEL NUMBER	INPUT VOLTAGE (VDC)	OUTPUT VOLTAGE (VDC)	OUTPUT CURRENT (mA)	INPUT ¹ CURRENT(mA)		EFF ² (%)	ISOLATION (VDC)
				FULL LOAD	NO LOAD		
EPM-BU-01 2W	5	5	400	520	40	77	1500
EPM-BU-02 2W	5	9	222	506	40	79	1500
EPM-BU-03 2W	5	12	167	500	40	80	1500
EPM-BU-04 2W	5	15	133	488	40	82	1500
EPM-BU-05 2W	12	3.3	400	152	15	72	1500
EPM-BU-11 2W	12	5	400	214	15	78	1500
EPM-BU-12 2W	12	9	222	214	15	78	1500
EPM-BU-13 2W	12	12	167	200	15	83	1500
EPM-BU-14 2W	12	15	133	196	15	85	1500
EPM-BU-21 2W	24	5	400	107	10	78	1500
EPM-BU-22 2W	24	9	222	107	10	78	1500
EPM-BU-23 2W	24	12	167	103	10	81	1500
EPM-BU-24 2W	24	15	133	101	10	83	1000

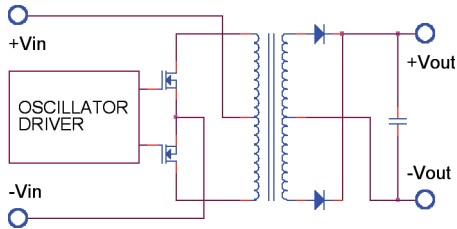
Note: Other input to output voltages may be available. Please contact factory.

Mechanical Dimensions & Recommended Footprint Details



Footnotes: 1 Nominal Input Voltage.
2 Nominal Input Voltage, Full Load.

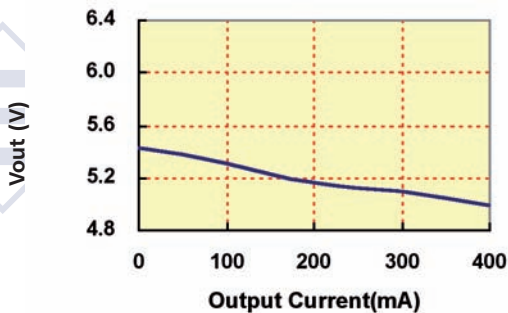
Simplified Schematic & Typical Applications



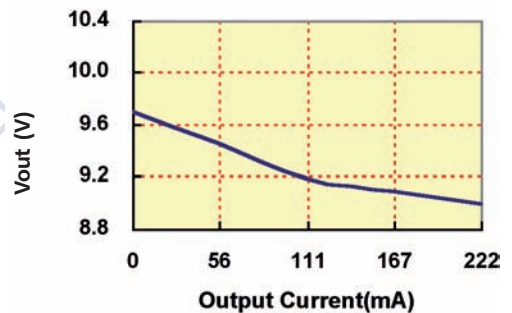
Typical Performance Curves

Specifications typical at $T_a=25^\circ\text{C}$, nominal input voltage, rated output current unless otherwise specified.

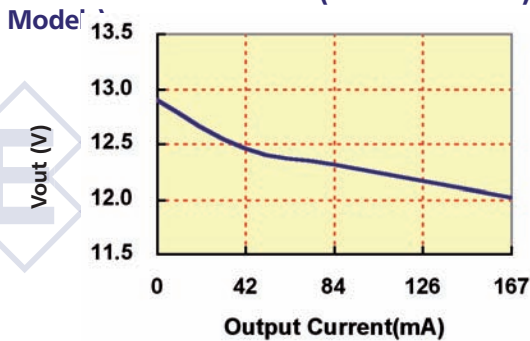
Vout Vs Load (5Vout Models)



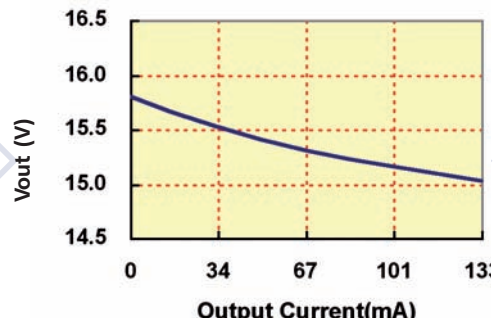
Vout Vs Load (9Vout Models)



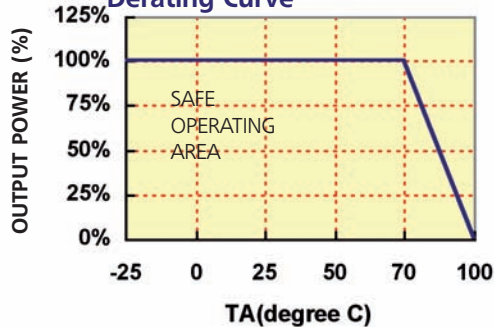
Vout Vs Load (12 Vout Models)



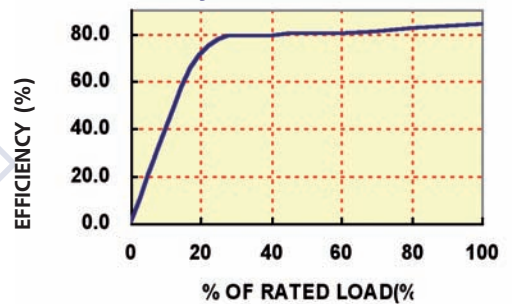
Vout Vs Load (15 Vout Models)



Derating Curve



Efficiency Vs Load



Input Fuse Selection Guide

4.5-5.5V Input Voltage(VDC)	10.8-13.2V Input Voltage(VDC)	21.6-26.4V Input Voltage(VDC)
800mA	300mA	170mA
Slow-Blow Type	Slow-Blow Type	Slow-Blow Type



Note: Certain applications may require the installation of external fuse in front of the input.

EPM-BU 2W Series Application Notes

External Capacitance Requirements:

Output filtering is required for operation. A minimum of 10uF is needed. Output capacitance may be increased for additional filtering, not to exceed 220uF.

To meet the reflected ripple requirements of the converter, an input impedance of less than 0.5ohm from DC to 250KHz is required.

We Can Offer EMC-Filter According To EN55011/22 Class B.

Negative Outputs:

A negative output voltage may be obtained by connecting the +OUT to circuit ground and connecting -OUT as the negative output.

Spezifikationen können jederzeit ohne Vorankündigung geändert werden.

