



2W DC-DC Unregulated Single Output Converter

SPU02 series



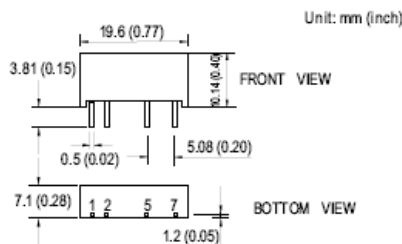
- Features :
- 3000VDC I/O isolation
 - Internal SMD technology
 - Built-in EMI filter
 - Protection: Short circuit
 - Cooling by free air convection
 - Non-conductive plastic case
 - Single in line package
 - 100% full load burn-in test
 - Low cost / High reliability
 - 2 years warranty



SPECIFICATION

ORDER NO.	SPU02L-05	SPU02M-05	SPU02N-05	SPU02L-12	SPU02M-12	SPU02N-12	SPU02L-15	SPU02M-15	SPU02N-15				
OUTPUT	DC OUTPUT VOLTAGE			12V			15V						
	CURRENT RANGE			0 ~ 167mA			0 ~ 133mA						
	EFFICIENCY (Typ.)			77%	79%	77%	80%	81%	80%	81%	83%	82%	
	RATED POWER			2W									
	RIPPLE & NOISE (max.) Note.2			100mVp-p									
	LINE REGULATION Note.3			±1.2% for 1% input variation									
	LOAD REGULATION Note.4			±8.0%									
	VOLTAGE ACCURACY			±2.0%									
INPUT	VOLTAGE RANGE			4.5 ~ 5.5V	10.8 ~ 13.2V	21.6 ~ 26.4V	4.5 ~ 5.5V	10.8 ~ 13.2V	21.6 ~ 26.4V	4.5 ~ 5.5V	10.8 ~ 13.2V	21.6 ~ 26.4V	
	NORMAL VOLTAGE			5V	12V	24V	5V	12V	24V	5V	12V	24V	
	INPUT CURRENT	Full load			520mA	214mA	107mA	520mA	214mA	107mA	520mA	214mA	107mA
		No load			60mA	20mA	15mA	60mA	20mA	15mA	60mA	20mA	15mA
	FILTER			Capacitor type									
	PROTECTION			Fuse recommended									
PROTECTION	OVERLOAD			Momentary									
	SHORT CIRCUIT			Momentary									
ENVIRONMENT	WORKING TEMP.			-25 ~ +71°C (Refer to output load derating curve)									
	WORKING HUMIDITY			20% ~ 90% RH non-condensing									
	STORAGE TEMP., HUMIDITY			-25 ~ +105°C, 10 ~ 95% RH									
	TEMP. COEFFICIENT			±0.03% / °C (0 ~ 50°C)									
	VIBRATION			10 ~ 500Hz, 2G 10min./1 cycle, period for 60min. each along X, Y, Z axes									
SAFETY & EMC	WITHSTAND VOLTAGE			I/P-O/P:3KVDC									
	ISOLATION RESISTANCE			I/P-O/P: 100M Ohms / 500VDC / 25°C / 70% RH									
	ISOLATION CAPACITANCE			80pF max.									
	EMI CONDUCTION & RADIATION			Compliance to EN55022 Class B, FCC part 15 Class B									
OTHERS	MTBF			700khrs min. MIL-HDBK-217F(25°C)									
	DIMENSION			19.6*7.1*10.2mm or 0.77**0.28**0.40* inch (L*W*H)									
WEIGHT			2.3g										

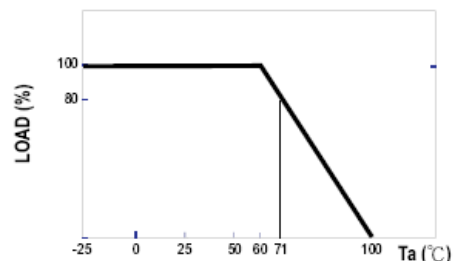
■ Mechanical Specification



■ Pin Configuration

Pin No.	Output
1	+Vin
2	-Vin
5	-Vout
7	+Vout

■ Derating Curve



NOTE

1. All parameters are specified at normal input, rated load, 25°C 70% RH ambient.
2. Ripple & noise are measured at 20MHz by using a 12" twisted pair terminated with a 0.1uf & 47uf capacitor.
3. Line regulation is measured from low line to high line at rated load.
4. Load regulation is measured from 10% to 100% rated load.