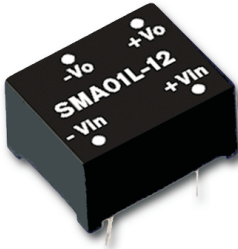




Automatización Eléctrica

Especialistas en Automatización

At the end of this document you will find links to products related to this catalog. You can go directly to our shop by clicking HERE. [HERE](#)



■ Features :

- 1500VDC I/O isolation
- 3000VDC I/O isolation(optional)
- Operating temperature range of -40 ~ +85°C without derating
- Internal SMD technology
- Built-in EMI filter
- Cooling by free air convection
- Non-conductive plastic case
- Dual in line package
- Industry standard pinout
- 100% burn-in test
- Low cost / High reliability
- 2 years warranty



SELECTION GUIDE

ORDER NO.	SMA01L-05	SMA01M-05	SMA01N-05	SMA01L-09	SMA01M-09	SMA01N-09
DC OUTPUT VOLTAGE	5V			9V		
OUTPUT CURRENT RANGE	0 ~ 200mA			0 ~ 110mA		
EFFICIENCY(Typ.)	77%	79%	77%	77%	78%	75%

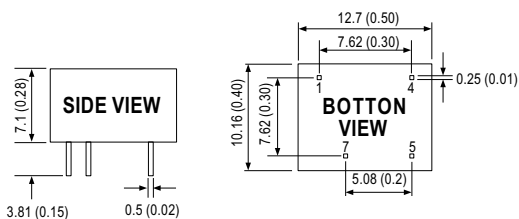
ORDER NO.	SMA01L-12	SMA01M-12	SMA01N-12	SMA01L-15	SMA01M-15	SMA01N-15
DC OUTPUT VOLTAGE	12V			15V		
OUTPUT CURRENT RANGE	0 ~ 84mA			0 ~ 67mA		
EFFICIENCY(Typ.)	78%	80%	78%	79%	79%	77%

SPECIFICATION

OUTPUT	RATED POWER	1W						
	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	SWITCHING FREQUENCY(Typ.)	100KHz						
	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	
	NORMAL VOLTAGE	5V	12V	24V	5V	12V	24V	
	INPUT CURRENT	Full load	265mA	110mA	57mA	265mA	110mA	57mA
		No load	32mA	15mA	11mA	32mA	15mA	11mA
	PROTECTION (FUSE RECOMMENDED)	500mA	250mA	150mA	500mA	250mA	150mA	
FILTER	Capacitor type							
PROTECTION	OVERLOAD	Momentary					Protection type : Broken	
	SHORT CIRCUIT	Momentary					Protection type : Broken	
ENVIRONMENT	WORKING TEMP.	-40 ~ +90°C (Refer to output load derating curve)						
	WORKING HUMIDITY	20% ~ 90% RH non-condensing						
	STORAGE TEMP., HUMIDITY	-55 ~ +125°C, 10 ~ 95% RH						
	TEMP. COEFFICIENT	±0.05% / °C (0 ~ 50°C)						
SAFETY & EMC	VIBRATION	10 ~ 500Hz, 2G 10min./1 cycle, period for 60min. each along X, Y, Z axes						
	WITHSTAND VOLTAGE	I/P-O/P: 1.5KVDC						
	ISOLATION RESISTANCE	I/P-O/P: 100M Ohms / 500VDC / 25°C / 70% RH						
	ISOLATION CAPACITANCE	80pF max.						
	EMI RADIATION	Compliance to EN55022 Class B, FCC part 15 Class B						
OTHERS	EMS IMMUNITY	Compliance to EN61000-4-2,3,4,5,6,8 light industry level, criteria A						
	MTBF	700khrs min. MIL-HDBK-217F(25°C)						
	DIMENSION (L*W*H)	12.7*10.16*7.1mm or 0.50*0.40*0.28 inch for 5V,12V input ; 12.7*10.16*7.62mm or 0.50*0.40*0.30 inch for 24V input						
WEIGHT	1.7g							

■ Mechanical Specification

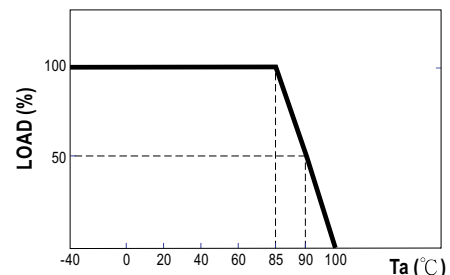
Unit: mm (inch)



■ Pin Configuration

Pin No.	Output
1	-Vin
4	+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 20% to 100% rated load.



Below is a list of articles with direct links to our shop Electric Automation Network where you can see:

- Quote per purchase volume in real time.
- Online documentation and datasheets of all products.
- Estimated delivery time enquiry in real time.
- Logistics systems for the shipment of materials almost anywhere in the world.
- Purchasing management, order record and tracking of shipments.

To access the product, [click on the green button.](#)

Product	Code	Reference	Product link
Input: 4,5-5,5 DC, Output: 1, V1: 5, A1: 0,2	SMA01L05	SMA01L-05	Buy on EAN
Input: 4,5-5,5 DC, Output: 1, V1: 9, A1: 0,11	SMA01L09	SMA01L-09	Buy on EAN
Input: 4,5-5,5 DC, Output: 1, V1: 12, A1: 0,084	SMA01L12	SMA01L-12	Buy on EAN
Input: 4,5-5,5 DC, Output: 1, V1: 15, A1: 0,067	SMA01L15	SMA01L-15	Buy on EAN
Input: 1,8-13,2 DC, Output: 1, V1: 5, A1: 0,2	SMA01M05	SMA01M-05	Buy on EAN
Input: 1,8-13,2 DC, Output: 1, V1: 9, A1: 0,11	SMA01M09	SMA01M-09	Buy on EAN
Input: 1,8-13,2 DC, Output: 1, V1: 12, A1: 0,084	SMA01M12	SMA01M-12	Buy on EAN
Input: 1,8-13,2 DC, Output: 1, V1: 15, A1: 0,067	SMA01M15	SMA01M-15	Buy on EAN
Input: 21,6-26,4 DC, Output: 1, V1: 5, A1: 0,2	SMA01N05	SMA01N-05	Buy on EAN
Input: 21,6-26,4 DC, Output: 1, V1: 9, A1: 0,11	SMA01N09	SMA01N-09	Buy on EAN
Input: 21,6-26,4 DC, Output: 1, V1: 12, A1: 0,084	SMA01N12	SMA01N-12	Buy on EAN
Input: 21,6-26,4 DC, Output: 1, V1: 15, A1: 0,067	SMA01N15	SMA01N-15	Buy on EAN