



**FEATURES:**

- RoHS compliant
- 4 Pin SIP Package
- Ultra miniature package
- High efficiency up to 84%
- Operating temperature -40°C to + 70°C
- Input / Output Isolation 1000 and 3000VDC
- Pin compatible with multiple manufacturers

**Models**  
**Single Output**  
**Input/Output Isolation 1000VDC**



Model	Input Voltage (V)	Output Voltage (V)	Output Current max (mA)	Capacitive load, max (µF)	Efficiency (%)
AM2S-0503SZ	4.5-5.5	3.3	400	470	71
AM2S-0505SZ	4.5-5.5	5	400	470	77
AM2S-0507SZ	4.5-5.5	7.2	270	470	77
AM2S-0509SZ	4.5-5.5	9	220	470	80
AM2S-0512SZ	4.5-5.5	12	160	470	82
AM2S-0515SZ	4.5-5.5	15	130	470	82
AM2S-0518SZ	4.5-5.5	18	110	470	82
AM2S-0524SZ	4.5-5.5	24	80	470	82
AM2S-1203SZ	10.8-13.2	3.3	400	470	72
AM2S-1205SZ	10.8-13.2	5	400	470	78
AM2S-1207SZ	10.8-13.2	7.2	270	470	80
AM2S-1209SZ	10.8-13.2	9	220	470	82
AM2S-1212SZ	10.8-13.2	12	160	470	84
AM2S-1215SZ	10.8-13.2	15	130	470	84
AM2S-1218SZ	10.8-13.2	18	110	470	84
AM2S-1224SZ	10.8-13.2	24	80	470	82
AM2S-2403SZ	21.6-26.4	3.3	400	470	74
AM2S-2405SZ	21.6-26.4	5	400	470	80
AM2S-2407SZ	21.6-26.4	7.2	270	470	80
AM2S-2409SZ	21.6-26.4	9	220	470	84
AM2S-2412SZ	21.6-26.4	12	160	470	84
AM2S-2415SZ	21.6-26.4	15	130	470	84
AM2S-2418SZ	21.6-26.4	18	110	470	84
AM2S-2424SZ	21.6-26.4	24	80	470	84
<b>Input/Output Isolation 3000VDC</b>					
AM2S-0503SH30Z	4.5-5.5	3.3	400	470	71
AM2S-0505SH30Z	4.5-5.5	5	400	470	77
AM2S-0507SH30Z	4.5-5.5	7.2	270	470	77
AM2S-0509SH30Z	4.5-5.5	9	220	470	80
AM2S-0512SH30Z	4.5-5.5	12	160	470	82
AM2S-0515SH30Z	4.5-5.5	15	130	470	82
AM2S-0518SH30Z	4.5-5.5	18	110	470	82
AM2S-0524SH30Z	4.5-5.5	24	80	470	82
AM2S-1203SH30Z	10.8-13.2	3.3	400	470	72
AM2S-1205SH30Z	10.8-13.2	5	400	470	78
AM2S-1207SH30Z	10.8-13.2	7.2	270	470	80
AM2S-1209SH30Z	10.8-13.2	9	220	470	82
AM2S-1212SH30Z	10.8-13.2	12	160	470	84
AM2S-1215SH30Z	10.8-13.2	15	130	470	84
AM2S-1218SH30Z	10.8-13.2	18	110	470	84
AM2S-1224SH30Z	10.8-13.2	24	80	470	82
AM2S-2403SH30Z	21.6-26.4	3.3	400	470	74
AM2S-2405SH30Z	21.6-26.4	5	400	470	80
AM2S-2407SH30Z	21.6-26.4	7.2	270	470	80
AM2S-2409SH30Z	21.6-26.4	9	220	470	84
AM2S-2412SH30Z	21.6-26.4	12	160	470	84

## Models

### Single Output (continued)

Model	Input Voltage (V)	Output Voltage (V)	Output Current max (mA)	Capacitive load, max (μF)	Efficiency (%)
AM2S-2415SH30Z	21.6-26.4	15	130	470	84
AM2S-2418SH30Z	21.6-26.4	18	110	470	84
AM2S-2424SH30Z	21.6-26.4	24	80	470	84

### Input Specifications

Parameters	Nominal	Typical	Maximum	Units
Voltage range	5	4.5-5.5	-0.7 - 7	VDC
	12	10.8-13.2	-0.7 - 15	
	24	21.6-25.4	-0.7 - 28	
Filter	Capacitor			
Turn on Transient process time			25	ms
Start up time		200		ms
Absolute Maximum Rating	5 Vin	0-7		VDC
	12 Vin	0-28		
	24 Vin	0-15		
Peak Input Voltage time		100		ms

### Isolation Specifications

Parameters	Conditions	Typical	Rated	Units
Tested I/O voltage	3 sec		1000 or 3000	VDC
Resistance		> 1000		MOhm
Capacitance		60		pF

### Output Specifications

Parameters	Conditions	Typical	Maximum	Units
Voltage accuracy		±3		%
Short Circuit protection		Momentary (1sec)		
Over current protection		110% Iout max		
Line voltage regulation (Single)	For 1.0% of Vin	±1.2		%
Load voltage regulation (Single)	20...100% load	±10		%
Load voltage regulation (Single) 3.3V output model	20...100% load	±20		%
Temperature coefficient		±0.02		%/°C
Ripple & Noise	At 20MHz Bandwidth	150		mV p-p
Rising time		100		ms

### General Specifications

Parameters	Conditions	Typical	Maximum	Units
Switching frequency	100% load	50		KHz
Operating temperature		-40 to +70		°C
Storage temperature		-40 to +125		°C
Max Case temperature			100	°C
Cooling	Free air convection			
Humidity			95	%
Case material	Plastic UL94-VO			
Weight		1.8		g
Dimensions (L x W x H)		0.46 x 0.29 x 0.38 inches	11.68 x 7.50 x 9.65 mm	
MTBF	>668 000hrs (MIL-HDBK -217F, Ground Benign, t=+25°C)			

NOTE: All specifications in this datasheet are measured at an ambient temperature of 25°C, humidity<75%, nominal input voltage and at rated output load unless otherwise specified.

## Safety Specifications

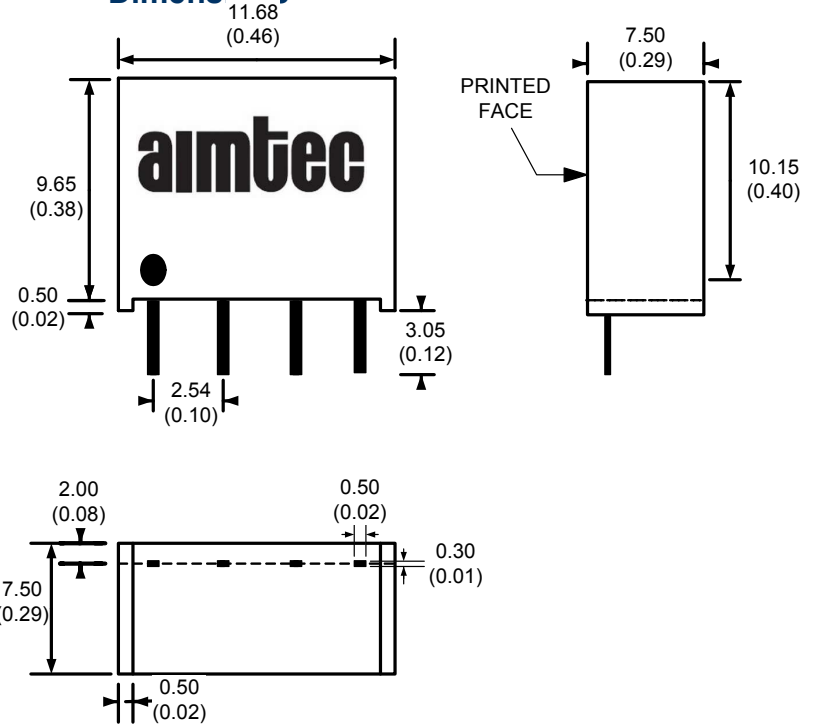
### Parameters

Agency approval	CE (for 1000VDC Isolated models)
Standards	EN55022 (Radiated Emissions) class B
	EN55024 (Noise Immunity)
	IEC61000-4-2(ESD)
	IEC61000-4-3(Radiated immunity)

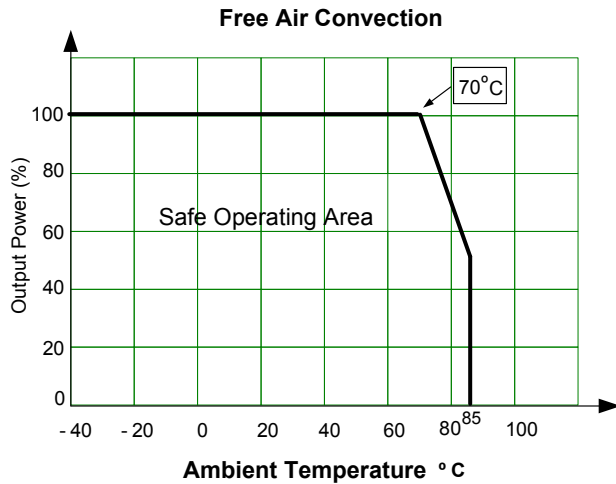
## Pin Out Specifications

Pin	1000 and 3000VDC
1	-V Input
2	+V Input
3	-V Output
4	+V Output

## Dimensions



## Derating



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