

# AD Series *AC to DC* Voltage Converters

## AC-DC Voltage Converters



These power supplies, commonly referred to as 'brick in the lead' units, offer a convenient way to use 12Vdc, 24Vdc or 48Vdc equipment from alternating current supplies of between 85 to 135Vac and 170 to 265Vac. Input voltage selection is automatic and requires no manual adjustment.

The continuous power rating spans 36 to 240 watts in five models. The nominal voltage output is factory set at 12Vdc, 24Vdc or 48Vdc.

These cool running products use switch mode technology and are assembled using surface mount technology.

The PowerMasters are continuously rated. The power output is limited at the continuous rating so that they can be used in parallel when extra power is required.

The units meet the European Low Voltage Directive and the EMC Directive. They also meet the requirements of UL1950 and FCC Class B.

### Applications

PowerMasters may be used to supply radiotelephones and other appliances from ac mains used in offices, portable site cabins, communication cabins, telephone exchanges, remote antenna sites, ships, oil rigs, etc. The units may also be used for constant voltage lead-acid battery charging providing the battery manufacturer's guidelines are followed.

### Rugged and Compact

The *brick* units are housed in a rugged corrosion resistant anodized aluminum extrusion. They can be

dropped, jumped on and splashed without damage.

The low mass Surface Mount Technology components are also less prone to damage from vibration and shock, further increasing the reliability of the units.

The use of SMT results in a very compact unit, making it easier for the installer to find a convenient location.

### Fast Installation

All the brick units fit onto a 'Click 'n' Fit' mounting clip. It is easy to fit the clip into awkward places then click the brick unit into the clip. The clip is fixed in three points allowing it to be mounted on uneven surfaces. *For desktop versions of these power supplies ask for the 'Desktop' leaflet.*

The units are compact enough to be neatly mounted onto a bulkhead, under a desk, under a shelf or alongside an appliance. They may also be used as a free standing 'brick in the lead' power unit, resting on the four rubber feet that are provided.

A red LED indicates when there is output from the converter. This gives reassurance to the installation engineer and speeds any fault finding in the wiring.

### International Connections

The mains input is via a national cordset attached to the unit via an IEC-320 C13/14 plug and socket. The DC output is via two 6.3 mm (1/4") push on connectors. A ground stud is also provided.

### Full Circuit Protection

The *brick* units have transient, overload and overheat protection.

### Product Coding

The new AlfaTronix AD Series codes have been developed to 'say everything'. They include all the product characteristics in one simple code and can be explained as follows, taking the AD115/230-12 as an example:

AD	AD Series (AC-DC power supplies)
115/230	115/230Vac input
12	12Vdc output
108	108 watts continuous output (9 amps at 12Vdc)

AlfaTRONIX

*for use in* offices, *on* ships *and* oil rigs



# Dati tecnici Convertitori AD

	12Vcc	24Vcc	48Vcc	Potenza	Dimensioni	Peso
Modello	AD 115/230-12 036	AD 115/230-24 036	AD 115/230-48 036	36 Watt	165 x 87 x 59mm	675g
	AD 115/230-12 072	AD 115/230-24 072	AD 115/230-48 072	72 Watt	165 x 87 x 59mm	675g
	AD 115/230-12 108	AD 115/230-24 108	AD 115/230-48 108	108 Watt	165 x 87 x 59mm	675g
	AD 115/230-12 168	AD 115/230-24 168	AD 115/230-48 168	168 Watt	215 x 87 x 59mm	900g
	AD 115/230-12 240	AD 115/230-24 240	AD 115/230-48 240	240 Watt	255 x 87 x 59mm	1150g
<b>Caratteristiche Comuni</b>						
Gamma di tensioni in ingresso		Regolazione automatica, 85-135Vca e 170-265Vca, 47-440 Hz				
Opzioni tensione d'uscita		13.6Vcc, 27.2 Vcc o 54.4 Vcc, indicare in fase d'ordine. In casi estremi +/- 4%				
Disturbo acustico		<50mV sul picco a carica continua				
Efficienza		Normalmente 85%				
Isolamento: Tra ingresso e contenitore/uscita Contenitore a terra		1.5kVca/3.0kVca rms Connesso direttamente alla linea di terra				
Durata media di funzionamento ottimale		>100 anni (HRD4)				
Temperatura d'esercizio		Da -25°C a + 30°C per rispettare le specifiche di questa tabella Da + 30°C a + 80°C l'ampereaggio decresce in maniera lineare a 0				
Temperatura di stoccaggio		-25°C a +100°C				
Temperatura max del contenitore		+70°C a pieno carico con +25°C di temperatura ambiente				
Umidità d'esercizio		95% massima, non condensante				
Contenitore		Alluminio anodizzato				
Conessioni: Ingresso Uscita Presa		IEC-320 C14 Connettori da 6.3 mm <b>Stud with crimp eyelet, adjacent to input</b>				
Spia tensione erogata		LED rosso accanto agli attacchi d'erogazione				
Metodi di Montaggio		Fissaggio a "T" tipo 'clip' con 3 punti di fissaggio, o a binari tipo DIN				
Protezioni: Sovracorrente Surriscaldamento Uscita fuori voltaggio Transitorie Guasto catastrofico		Controllato da un limitatore di correnti, anche in parallelo Controllato da un captatore termico Protetto da circuiti indipendenti ad spegnimento Protetto da filtri; scelta di componenti robusti Fusibili interni in ingresso ed in uscita				
Omologazioni		Direttiva Generale EMC 89/336/EEC Direttiva sulle Basse Tensioni 73/23/EEC Direttiva sulla Marchiatura CE 93/68/EEC				
Controlli		Rispetta le norme EN50081-1, EN50082-1, EN50014-1, EN61000-3-3, EN60950, EN60945, UL1950, CSA950-95, FCC categoria "B", VDE0805				
Marchi		CE				



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