



# CAP412

Quad Channel 100V Power Amplifier

## ► Features

- 4 x 100 Volt outputs
- 120 Watt output power
- 100V, 70V and 4 Ohm outputs
- Class-D Amplifier Technology
- XLR Signal Linkthrough
- Advanced Protection circuit
- Temperature controlled fan
- High pass filter switch & signal limiter
- 19" Mounting device (2 HE)

## ► Applications

- Public buildings
- Warehouses
- Retail stores
- Office buildings
- Train stations, Airports
- Restaurants, Bars
- ...



The CAP Series are professional 100V Multi-Channel Power Amplifiers, containing various models with different channels and different output power configuration.

The CAP412 is the four channel version with an output power of 120 Watt at each channel. This offers a flexible solution for Multi-Zone audio distribution systems with four or more independent zones.

They are designed as no-nonsense amplifiers with only the necessary controls and connections, which provides great simplicity in use and installation. A high efficiency and reliability of the devices is achieved by using switching power supplies in combination with Class-D Amplifier technology. A temperature controlled FAN constantly keeps all parts within the right operating range, while avoiding excessive buzz. A built-in multipurpose protection circuit protects against DC malfunction, Short circuit, overheating, overload and limits the signal when necessary.

The input connections are performed using balanced XLR connectors and link XLR output connectors are provided for linkthrough to other amplifiers.

Every output channel contains different power taps to be used in 100 Volt, 70 Volt and even 4 Ohm low impedance applications.

Besides, a high-pass filter switch (400 Hz) and a Gain adjustment potentiometer are provided for each channel.

The output connections are performed using reliable terminal block connectors and this all is housed into a solid constructed, double rack space (2 HE) 19" rack mounting housing.

## ► Specifications

SYSTEM SPECIFICATIONS		
RMS Power	4 x 120 Watt	
Frequency response	50 Hz - 22 kHz	
Signal to noise ratio	> 100 dB	
THD+N by 1 kHz (1/2 Rated Power)	< 0.3%	
Crosstalk	< 80 dB	
Technology	Class-D	
Power supply	Switching mode	
Power supply range	100 ~ 240 V AC / 50 ~ 60 Hz	
Input Sensitivity	-0.5 dB ~ 10.5 dB	
Input Impedance	10 k Ohm balanced	
Output Voltage / Impedance	100 V (83 Ohm)	
	70 V (42 Ohm)	
	4 Ohm	
Common mode rejection ratio	70 dB	
Protection	DC Short-circuit	
	Over heating	
	Over load	
	Signal limiting	
Cooling system	Temperature controlled FAN	
Operating temperature	0° ~ 40° at 95% Humidity	
Connectors	Input	Female XLR with Male Linkthrough
	Output	4-Pin Terminal block (5.08 mm pitch)
PRODUCT FEATURES		
Dimensions (Width x Height x Depth)	482 x 88 x 420 mm	
Weight net	14.8 Kg	
Mounting	19"	
Unit height	2 HE	
Construction	Steel	
Colour	Black	
SHIPPING & ORDERING		
Packaging	Carton box	
Shipping weight and volume	16.6 Kg - 0.046 Cbm	
Accessories included	4 x 4-Pin Terminal block Output con.	
Optional accessories	CPE100 Rack mount handles	
*AUDAC reserves the right to change specifications without notice: this is part of our policy to continually improve our products		

## ► Architect's and Engineers' Specifications

The Amplifier shall be a constant voltage 100 Volt type, containing four independent controllable amplifier channels with an output power of 4 x 120 Watt. The amplifier shall be constructed using Class-D Amplifier technology and powered by a switching power supply.

Each channel shall have integrated circuitry to protect against short-circuits or mismatched loads and over-heating. The operating temperature for each channel shall be continuously monitored and a speed-controlled fan will keep it within the operating range while minimising the acoustic noise. Additionally, the load shall be protected against DC faults and a clip limiter shall automatically reduce the input gain at onset of distortion.

The front panel shall contain an AC power switch accompanied by a blue power indicator LED and channel operation indicator LED's. Two green signal LED's indicating the presence of an input signal and it's level exceeding the -20 dB level, a clip LED indicating the channel operation at maximum level and a protection LED indicating any fault detected shall be provided for each channel.

All connections shall be made on the rear panel of the unit. The signal input connections shall be balanced and performed using female XLR connectors with male XLR connectors allowing signal link through to other channels or amplifiers. A gain control potentiometer shall be provided to adjust the input sensitivity within a range of -0.5 dB to 10.5 dB, and a switch shall allow the enabling / disabling of a high-pass filter with a roll off frequency of 400 Hz.

The output connections shall be performed using a 4-pin Terminal block connector with three different power taps for use with 100 Volt and 70 Volt constant voltage and 4 Ohm low impedance applications.

The amplifier shall operate on a 230~240 V AC / 50 Hz mains network and shall be equipped with a removable power cord having a standard shuko (CEE 7/7) AC plug. The connector on the amplifier chassis shall be a fused IEC C14 type.

The amplifier chassis shall be a two rackspace steel constructed 19" housing. Depth from mounting surface to rear supports shall be 420 mm and the weight shall not exceed 14.8 Kg.

## ► Block diagram

