

SAFETY PRECAUTIONS

Please read all instructions before attempting to unpack, install or operate this equipment and before connecting the power supply. Please keep the following in mind as you unpack and install this equipment:

- Always follow basic safety precautions to reduce the risk of fire, electrical shock and injury to persons.
- To prevent fire or shock hazard, do not expose the unit to rain, moisture or install this product near water.
- Never spill liquid of any kind on or into this product.
- Never push an object of any kind into this product through any openings or empty slots in the unit, as you may damage parts inside the unit.
- Do not attach the power supply cabling to building surfaces.
- Use only the supplied power supply unit (PSU). Do not use the PSU if it is damaged.
- Do not allow anything to rest on the power cabling or allow any weight to be placed upon it or any person walk on it.
- To protect the unit from overheating, do not block any vents or openings in the unit housing that provide ventilation and allow for sufficient space for air to circulate around the unit.

REVISION HISTORY

VERSION NO.	DATE DD/MM/YY	SUMMARY OF CHANGE
VRO	05/03/15	Preliminary Release

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1. INTRODUCTION

The AU-IP21 has the choice of Optical or analogue stereo inputs, outputting to analogue L/R with the choice of mono or stereo. Telnet and Web GUI control provide remote control over a network. The Web GUI inputs labels can be edited allowing the user to customize the interface. Ideal for adding remote volume control to amplification systems.

2. APPLICATIONS

- Entertainment Room / Home Theater
- Show Room / Demo Room
- Audio equipment central control

3. PACKAGE CONTENTS

- Optical & L/R to L/R Audio Controller
- 5V / 2.6A DC power supply
- Operation Manual

4. SYSTEM REQUIREMENTS

Input source equipment such as CD /DVD player or computer via optical or analog stereo output to amplifier or speaker with analog stereo output.

5. FEATURES

- Supports optical input sampling rate up to 192kHz
- Supports Optical & analogue L/R inputs to analogue L/R output
- Support Stereo out or Mono out
- Support Volume control by Telnet or WebGUI
- Single button source selection
- Editable source labels in Web Gui

6. OPERATION CONTROLS AND FUNCTIONS

6.1 Front Panel



- 1 IN Button: Short press IN button to switch the audio source. Long press IN button up to 4 seconds will reset the device to Default Ethernet Setting. The Power LED will blink 5 times.
- **2 POWER LED:** When power is on, the LED light will illuminate.
- **3 OPTICAL LED:** When source switch to Optical input selection, the LED light will illuminate. When switch to L/R the LED will unilluminate.
- CONTROL: This slot is to connect with intranet service line for telnet/ WebGUI control.
- 5 L/R OUT: These slots are to connect with active speakers or amplifier's L/R inputs.

6.2 Rear Panel



- OPTICAL IN: This slot is to connect with input source's optical output port.
- 2 L/R IN: These slots are to connect with input source's L/R output port.
- **3 SERVICE:** This slot is reserved for USB firmware update use only.
- **4 DC 5V:** Connect the adaptor included in the package and connect to AC wall outlet for power supply.

6.3 IP Searching Software Application and Installation

Please download the software from <u>www.cypeurope.com</u> with file name CDPS V2.000 and save it in a directory where you may use it later.

Connect the AUDIO CONTROLLER with an active network system and open the CDPS V2.000 application from the directory in a PC/Laptop. Click on Find Devices on Network and a list of the devices will show up.

6) (CDPS V2.000			- 10-	
				Find Devices	on Network	
		Product Name	Description	IP Address	MAC Address	
	1	AU-IP21	AUDIO CONTROLLER	192.168.1.50	F8:22:85:00:04:48	

Double click on the product name and an InfoFrom page will appear to show the products' detail or use the IP Address listed to control the device directly. Default Ethernet Setting is on Static mode with: IP: 192.168.1.50 SUBNET: 255.255.255.0 GATEWAY: 192.168.5.254 HTTP PORT: 80 TLENET PORT: 23

InfoFrom			
Product ID	2236		
Product Name	AU-IP21		
MAC Address	F8:22:85:00:04:48		
IP Address	192.168.1.50		
Subnet Mask	255.255.255.0		
Gateway IP	192.168.5.254		
DNS	0.0.0.0		
IP Mode	Static 🔹		
Web GUI Port	80		
Telnet Port	23		
S / N	SN:2236		
Firmware Version	V0.60		
Hardware Version	PCB-2330		
Description	AUDIO CONTROLLER		
Web GUI	Web GUI		
Save	boot		

6.4 Telnet Commands

Command Name	Description	Description of parameter		
SOURCE N	SOURCE SELECTION	N=0/Optical, 1/RCA IN or ?		
VOL N	OUTPUT VOLUME SETTING	N=-40~10dB (0) or ?		
MUTE N	OUTPUT VOLUME MUTE CONTROL	N=0(Unmute), 1(Mute) or ?		
MONO N	SET MOMO OR STEREO MODE	N=0(Stereo), 1(Mono) or ?		
NAME N1 N2	Set input name	N1=0(Optical), 1(RCA) N2=Up to 24 Characters or ?		
IPCONFIG SHOW IP CONFIGURATION STATUS		None		
	SET ETHERNET IP	N=X.X.X.X		
	ADDRESS	X=0~255 (192.168.1.50)		
SNETMASK N	SET ETHERNET	N=X.X.X.X		
	NETMASK	X=0~255 (255.255.255.0)		
SGATEWAY N	SET ETHERNET GATEWAY	N=X.X.X.X X=0~255 (192.168.5.254)		
RSTIP IP CONFIGURATIO RESET TO <dhcp></dhcp>		None (Statics)		
VER	SHOW UNIT FIRMWARE VERSION	None		
REBOOT	SYSTEM REBOOT	None		
FADEFAULT	FACTORY RESET	None		
eth_fadefault	ethernet Parameter set Factory default	None		
?	SHOW COMMAND LIST	None		
HELP SHOW COMMAND		None		

Note: All the RS-232 command will be not executed unless followed with a carriage return. All commands are case-sensitive

6.5 Telnet Control

To access the telnet control in Windows 7, click on 'Start' menu and type "cmd" in the Search field then press enter.

Under Windows XP go to the 'Start' menu and click on "Run", type "cmd" and press enter.

Under Mac OS X, go to $Go \rightarrow Application \rightarrow Utilities \rightarrow Terminal$



Once in the command line interface (CLI) type "telnet", then the IP address of the unit and hit enter.



Type HELP or ? to bring out all the commands.

Telnet 192.168.5	172
Welcome to TEL	NET .
help	
SOURCE	: SOURCE SELECTION 0:OPTICAL, 1:RCA IN
VOL	: OUTPUT VOLUME SETTING
MUTE	: OUTPUT VOLUME MUTE CONTROL Ø:UNMUTE, 1:MUTE
MONO	: SET MONO OR STEREO MODE Ø:STEREO, 1:MONO
NAME	: SET INPUT NAME
I PCONFI G	: DISPLAY THE CURRENT IPCONFIG
SIPADDR	: SET ETHERNET IP ADDRESS
SNETMASK	: SET ETHERNET NETMASK
SGATEWAY	: SET ETHERNET GATEWAY
RSTIP	: IP CONFIGURATION RESET TO <dhcp></dhcp>
VER	: SHOW UNIT FIRMWARE VERSION
REBOOT	: SYSTEM REBOOT
FADEFAULT	: ALL CONFIGURE SET TO FACTORY DEFAULT
ETH_FADEFAULT	: ALL ETHERNET CONFIGURE SET TO FACTORY DEFAULT
?	: SHOW DESCRIPT OF COMMAND
	USE N, N=COMMAND NAME TO SHOW DESCRIPT OF COMMAND
HELP	: SHOW DESCRIPT OF COMMAND
	USE <help n="COMMAND" n,="" name=""> TO SHOW DESCRIPT OF COMMAND</help>
_	
	T

Note: All the commands will be not executed unless followed by a carriage return. Commands are case-insensitive. If the IP is changed then the IP Address required for Telnet access will also change accordingly.

6.6 Web GUI Control

On a PC/Laptop that is connected to an active network system, open a web browser and type device's IP address on the web address entry bar. The browser will display the device's Audio and System

Settings for users to control.

A http://192.168.5.172/		
	Optical Label Edit Optical - OP TICAL OPTICAL	AU-IP21
Audio Settings System Settings Source Optice	e Sive Change Cancel	8
Source S OPTIC Volum	1 System TEREO MONO CAL e 0 dB	RCA Label fait () RCA - RCA ECA - X
Mute	e 0 dB	Swe Change Courd
		Version:V2.3

A http://192.168.5.172/	ָ ָ רָ ל <mark>מ</mark> אַ AU-IP21 ×	1	- ×
		 AU	<i>J-IP21</i>
Audio Settings System Settings	System P Mode DHCP P Mode		Version V2.3

7. CONNECTION DIAGRAM



8. SPECIFICATIONS

Input Ports	1 x RJ45(Control)
	1 x L/R
	1 x Optical
	1 x USB(service)
Output Ports	1 x L/R
Power Supply	5VDC/2.6A (US/EU standards, CE/ FCC/ UL certified)
ESD Protection	Human body model: ±8kV (air-gap discharge) ±4kV (contact discharge)
Chassis Material	Metal
Silkscreen color	Black
Dimensions	55mm (W) x82mm (D) x 22.5mm (H)
weight	342g
Operating Temperature	0°C~40°C / 32°F ~ 104°F
Storage temperature	-20°C~60°C / -4°F ~ 140°F
Relative Humidity	20~90% RH (no condensation)
Power Consumption	2w

Audio Specification						
Input	Output	Output	T.H.D+N	Frequency	SNR	Crosstalk
		Level	(A-Weight)	Response		
Optical	L/R	2Vrms±10%	<0.01%	±1dBFS	>80dB	<-80dB
OdBFS						
1kHz						
L/R	L/R	2Vrms±10%	<0.01%	±1dBFS	>80dB	<-80dB
2Vrms						
1kHz						



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