

8300A

User Instructions

audiolab



AVAILABLE AT
DIGITAL CINEMA

1: Important Safety Information



IMPORTANT SAFETY INFORMATION

Read these instructions.

Keep these instructions.

Heed all warnings.

Follow all instructions.

Do not use this apparatus near water.

Clean only with dry cloth.

Do not block any ventilation openings. Install in accordance with the manufacturer's instructions.

Do not install near any heat sources such as radiators, heat registers, stoves, or other apparatus (including amplifiers) that produce heat.

Do not defeat the safety purpose of the polarized or grounding plug. A grounding plug has two blades and a third grounding prong. The wide blade or the third prong is provided for your safety. If the provided plug does not fit into your outlet, consult an electrician for replacement of the obsolete outlet.



Protect the power cord from being walked on or pinched particularly at the plugs, convenience receptacles, and at the point where they exit from the apparatus.

Use only with the cart, stand, tripod, bracket, or table specified by the manufacturer, or sold with the apparatus. When a cart or rack is used, use caution when moving the cart/apparatus combination to avoid injury from tip-over.

Unplug this apparatus during lightning storms or when unused for long periods of time.

Refer all servicing to qualified service personnel. Servicing is required when the apparatus has been damaged in any way, such as power supply cord or plug is damaged, liquid has been spilled or objects have fallen into the apparatus, the apparatus has been exposed to rain or moisture, does not operate normally, or has been dropped.

Mains Supply: The mains operating voltage of Audiolab 8300 series units is shown on the rear panel. If this voltage does not match the mains voltage in your area, consult your Audiolab dealer about converting the unit.

The mains supply fuse on the rear panel is accessible when the IEC mains plug has been removed. In the rare event that it has broken, check for any obvious cause before replacing the fuse with one of the correct rating and type.

The fuse values are:

220 – 240V (UK, China, etc.) T2.5AL 250V Slow Blow

100 – 120V (UK, China, etc.) T4.0AL 250V Slow Blow

WARNING: Only use attachments/accessories specified or provided by the manufacturer (such as the exclusive supply adapter, battery etc.).

WARNING: The mains plug/appliance coupler/direct plug-in adapter is used as disconnection device; the disconnection device shall remain readily operable.

CAUTION: These servicing instructions are for use by qualified service personnel only. To reduce the risk of electric shock, do not perform any servicing other than that contained in the operating instructions unless you are qualified to do so.

Do not install this equipment in a confined or built-in space such as a bookcase or similar unit, and keep well ventilated in open space. The ventilation should not be impeded by covering the ventilation openings with items such as newspaper, table-cloths, curtains etc.

WARNING: To reduce the risk of fire or electric shock, do not expose this apparatus to rain or moisture. The apparatus shall not be exposed to dripping or splashing and ensure that objects filled with liquids, such as vases, shall not be placed on the apparatus. No naked flame sources, such as lighted candles, should be placed on the apparatus.



This equipment is a Class II or double insulated electrical appliance. It has been designed in such a way that it does not require a safety connection to electrical earth.

2: Getting Started

Welcome to Audiolab 8300 Series.

8300A is the latest in a long line of Audiolab integrated amplifiers with a pedigree that stretches back to the very first 8000A that made Audiolab and overnight sensation.

Inside 8300A you'll find the latest discrete technology from designers that understand analogue circuitry inside out. Delivering a balance of refined musical detail and powerful transient performance, 8300A packs far more weight than its svelte looks would indicate.

Designed to drive any loudspeaker load with absolute stability and finesse, 8300A is the perfect partner for other Audiolab sources such as 8300CD.

We hope you will enjoy its performance for many years to come.

Please read through this manual to obtain the very best performance from 8300A.

Inputs:

- Six external analog inputs.
- One external analog power input
- XLR balance analog input

Outputs:

- Two pre-amplifier output
- Loudspeaker output

Operating Features:

- Automatic detection decoding of external digital input source.
- Selectable digital filler setting.
- Fully variable output in the digital domain absolute fidelity with the straightest possible signal path.
- Automatic trigger post equipments via 12V trigger output.
- Analogue output level selectable between fixed and variable.
- Eight display brightness available with display on/off options.
- Auto standby function with function on/off options.

Unpacking

- Unpacking the product fully. The carton should contain:
- The Audiolab 8300A
- One IEC power cord suitable for your area.
- One Remote handset with two AAA batteries
- This instruction manual.

If an item is missing or damaged report this to your dealer as soon as possible. Retain the packing for safe transport of your unit. If you dispose of the packing, do so with regard to any recycling regulation in your area.

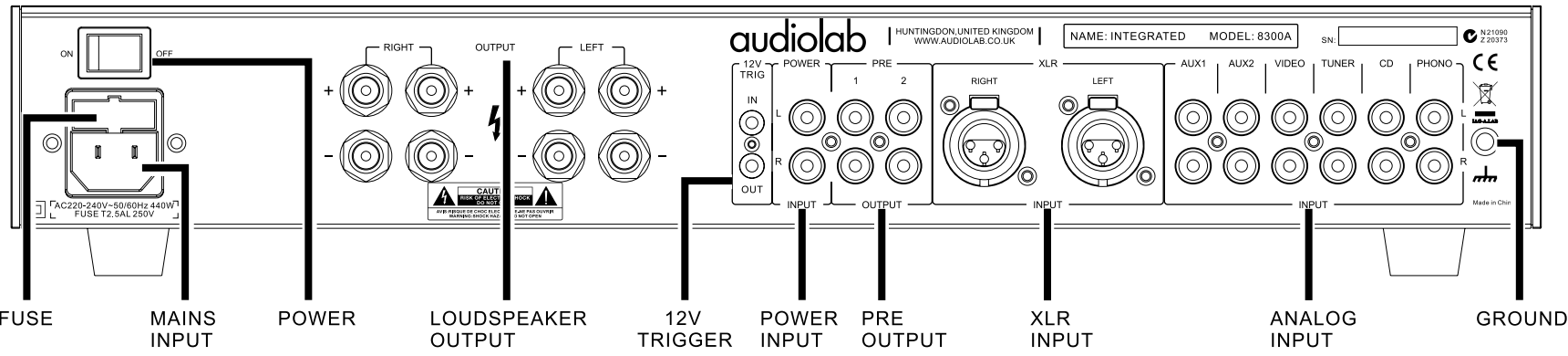
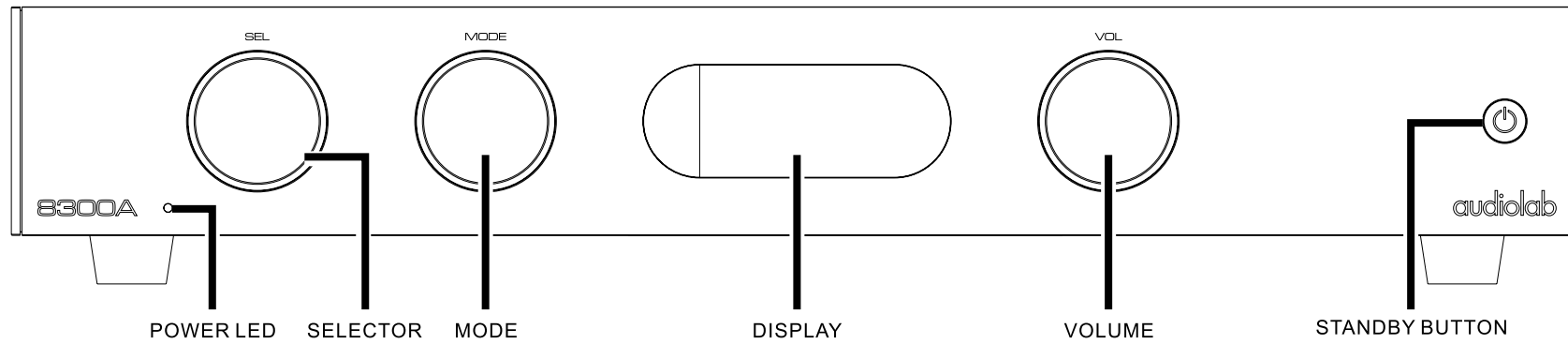
Placement

The unit is designed to run warm during normal operation but ensure you do not block any ventilation openings.

Place the unit on a sturdy shelf or table. If you use equipment rack, ensure the unit has adequate ventilation and is on its own shelf. To minimize any interference place the power supply in a stable location as far from sensitive analogue input ads possible.

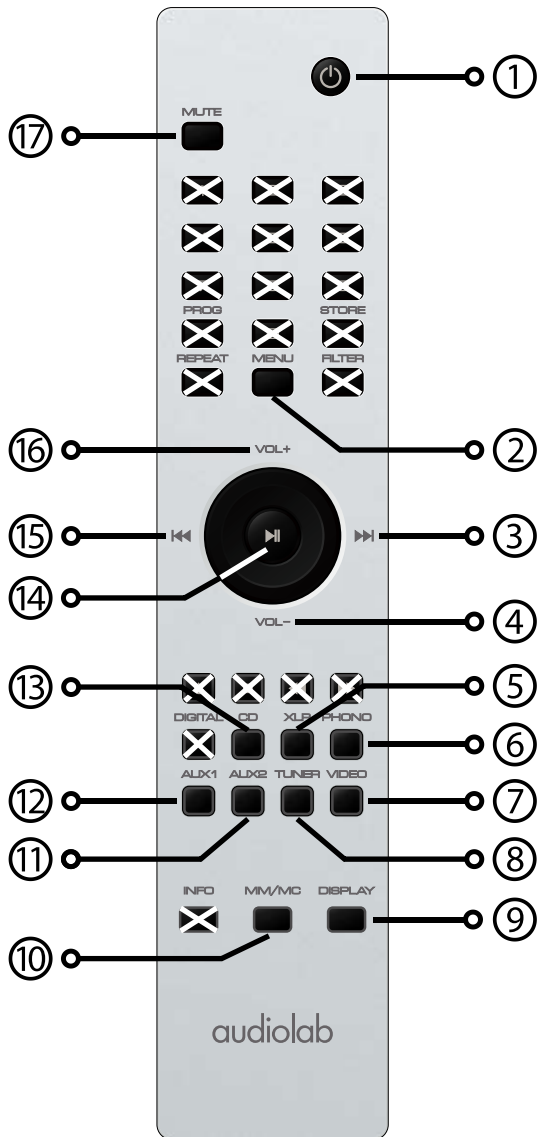
Ensure your mains voltage corresponds to the rating plate on the rear of the product's power supply. If in doubt, consult your dealer. If you move to an area with a different mains voltage seek advice from an Audiolab appointed dealer or a competent service technician.

3: Controls and Connectors



4: Remote Handset

NOTE : the handset buttons shown crossed out are for use with other 8300CD Audiolab units and are not operational when used with the 8300A



- | | | |
|----|---------|--|
| 1 | STANDBY | Press to bring the unit in/out of Standby |
| 2 | MENU | Press to enter menu mode |
| 3 | ▶▶ | Move to next menu page or setting |
| 4 | VOL- | Press to decrease Volume |
| 5 | XLR | Press to select XLR input |
| 6 | PHONO | Press to select Phono input |
| 7 | VIDEO | Press to select Video input |
| 8 | TUNER | Press to select Tuner input |
| 9 | DISPLAY | Press to toggle the display on/off |
| | | Press and hold to select display brightness levels |
| 10 | MM/MC | Press to toggle Phono MM/MC mode |
| 11 | AUX2 | Press to select Aux2 input |
| 12 | AUX1 | Press to toggle different digital input |
| 13 | CD | Press to select CD input |
| 14 | ▶ | Press to select menu page or setting |
| 15 | ◀◀ | Move to last menu page or setting |
| 16 | MUTE | Press to mute and unmute the sound |

Fitting Batteries

Open the cover, unwrap the supplied AAA batteries and place them in the battery compartment with the polarity as shown, replace the cover.

Always use AAA batteries and always replace them in sets. Never mix old and new batteries. Very weak batteries can leak and damage the handset. Replace them in good time!

There is a risk of fire and burns if a battery is handled improperly. Do not disassemble, crush, puncture, short external contacts, or dispose of in fire or water.

Do not attempt to open or service a battery. Discard used batteries in full accordance with recycling regulations in force in your area.

Handset Operation

The handset operates several Audiolab components. The handset buttons shown crossed out are for use with other Audiolab units and are not operational when used with the 8300A.

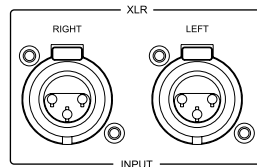
Point the handset at the remote receiver and press the relevant key. The handset should be within 15 meters of the player and there must be a clear line of sight between the two units.

5: Connections - 1

Signal Input

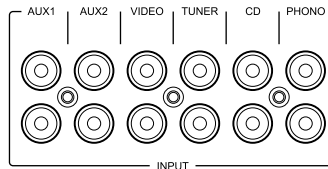
Balanced Input

Balanced connections provide greater balanced headroom and improved S/N ratio. If your source unit has a dynamic headroom output uses the balanced connection. You need one XLR balanced cable per channel. The socket connects to the player and the plug normally connects to the amplifier.



Unbalanced Input

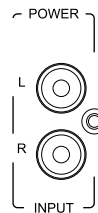
If you cannot use the balanced input, connect a high quality stereo screened RCA phone lead from the unbalanced input of the 8300A to a suitable output of the source unit. 8300A has AUX1, AUX2, VIDEO, TUNER, CD, PHONO six signal inputs which may be used for connecting any line level source.



source.

Power AMP Input

For driving the power amplifier input directly from an external source. Only operates when Pre-Power mode is selected.



Signal Output

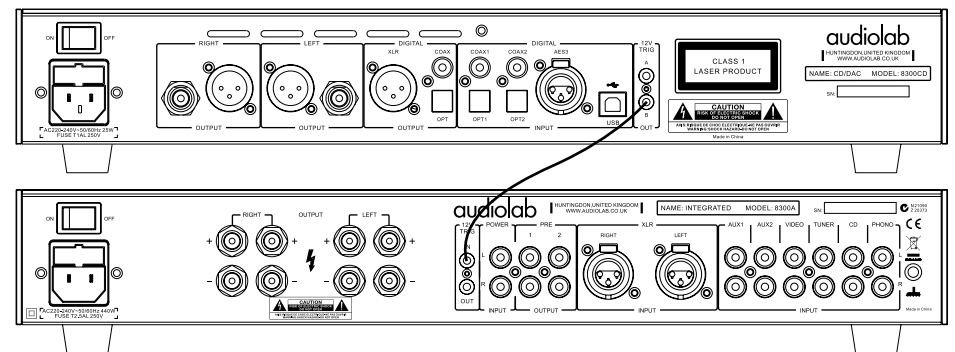
PRE-AMP OUT 1&2

Low impedance pre-amplifier outputs for driving external power amplifiers, sub-woofers or signal processors. Pre-Amp outputs are switched off when integrated mode is selected or whenever amplifier is muted.

Trigger Connections

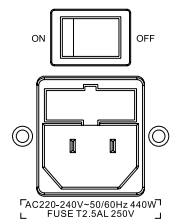
Audiolab 8300A has one pair parallel trigger connections at the rear panel, can be activated by 8300CD's or any other source's trigger output. 8300A can also provide a trigger signal to another 8300A's or any other amplifier's trigger input. If you have an 8300 system, we advise connecting the triggers. This will enable all 8300 units to be brought in and out of standby along with the trigger connections.

To connect to your control unit, you will need a cable with one end to match the trigger output of the control unit and other terminating in a 3.5mm jack plug. For Audiolab 8300 series, this will be a 3.5mm to 3.5mm interconnect.



Mains Input

Before connecting the 8300A to the mains supply make sure that all the other connections to your system have been properly and securely made. Make sure the ON/OFF switch on the 8300A is switched off. Switch the mains supply off at the wall socket, and then, using the cable supplied, connect the socket on the back of your 8300A to an AC supply outlet. The 8300A is now ready for operation.



6: Operation - 1



Switching On and Off

Connect power to all system units. Switch the mains on. Switch on all source units, switch on the power amplifiers 8300A.

When switching off: switch off the amplifier 8300A first before switching off the source unit unless they are trigger enabled.

When switching on: The power LED illuminates, the display shows the welcome screen. After a short period the unit boots up.

Standby Mode

Audiolab 8300A will be in standby mode when power on. Press the  button to bring 8300A out of standby, the power indicator LED becomes brighter. You can activate the "auto standby" function by holding the  button for 3 seconds. Using this "auto standby" function, 8300A will automatically go into standby mode when there is no signal input or operation for 20 minutes, and the power indicator LED becomes dim.

Protection

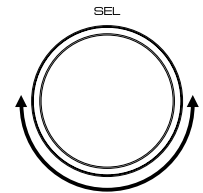
The Audiolab 8300A is protected by a thermal fuse which interrupts the audiolab output if the amplifier is grossly overloaded for a period of time. The display will show PROTECTION for 3 seconds, and then display is off, the power indicator LED will flash.

To restore operation, simply press  button to bring unit into standby and then press to activate unit again.

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Source Select

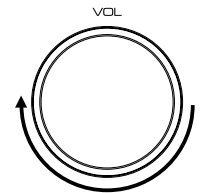
Rotate the SEL knob on the front panel to select different source inputs. 8300A has AUX1, AUX2, VIDEO, TUNER, CD, PHONO, XLR total seven signal inputs available.




Altering the Volume Level

Rotate the VOL knob on front panel to alter the volume level.

The range is -80dB to +8dB, the factory default volume is -20dB. If the volume is set to lower than -20dB when unit is closed, the default volume will be last used value when the unit next boots up. If the volume is set to higher than -20dB, the default volume will be -20dB when the unit next boots up.



Mute

Press the VOL knob on the front panel or the  button on remote can toggle the sound on/off.

VIDEO:20.0dB
Integrated Mute

Switching the display on and off

Press DISPLAY button on remote to toggle the display off and on.

When the display is OFF: Pressing any key will bring the display on. After a few moments the display will again switch off. Switching the 8300CD off and on restores the display.

Display Off

To alter the display brightness: Press and hold the display key to display the current brightness level. You can select from 1 to 8 eight brightness levels.

Display On

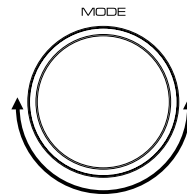
PROTECTION
01sec

6: Operation - 2

Operating Modes

Although 8300A is an integrated amplifier, it can function as a separate pre-amplifier and power amplifier. Rotate the MODE knob on the front panel to select different operating modes.

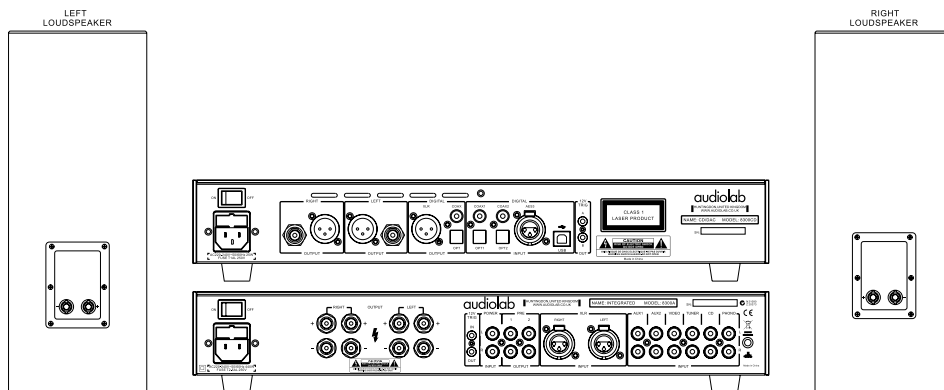
NOTE: When switching modes, the making and breaking of connections may momentarily operate the muting function on the 8300A.



MODE	POWER AMP IN	PRE-AMP OUT1&2	PRE-POWER INTERNAL LINK	LOUDSPEAKERS
PRE	DISABLE	ACTIVE	DISABLE	DISABLE
PRE-POWER	ACTIVE	ACTIVE	DISABLE	ACTIVE
INTEGRATED	DISABLE	ACTIVE	ACTIVE	ACTIVE

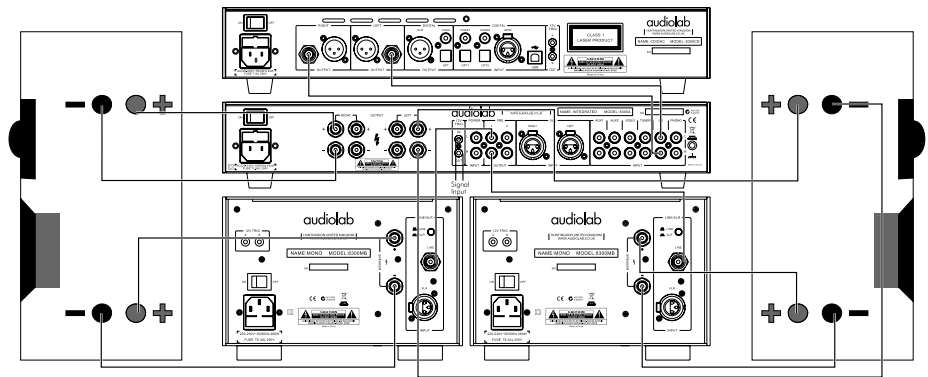
Integrated mode

The pre-amplifier section is internally connected to the power amplifier. Pre-Amp outputs are not operational. External subwoofers, processors, or amplifiers will not receive any signal.



Pre-Power mode

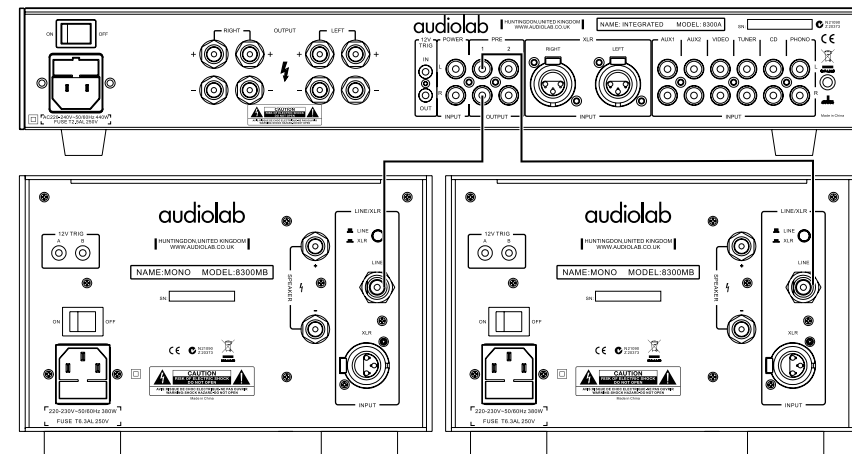
The pre-amplifier outputs are operational. A second power amplifier can be connected for bi-amplifying as shown in the diagram. An additional power amplifier can also be connected to drive a second pair of speakers.



Pre Mode

All signal to and from the power amplifier of the 8300A are disconnected. In this mode, the 8300A functions as a stand-alone pre-amplifier.

The pre-amplifier section of the 8300A can be connected to a stereo power amplifier, or to two monobloc amplifiers



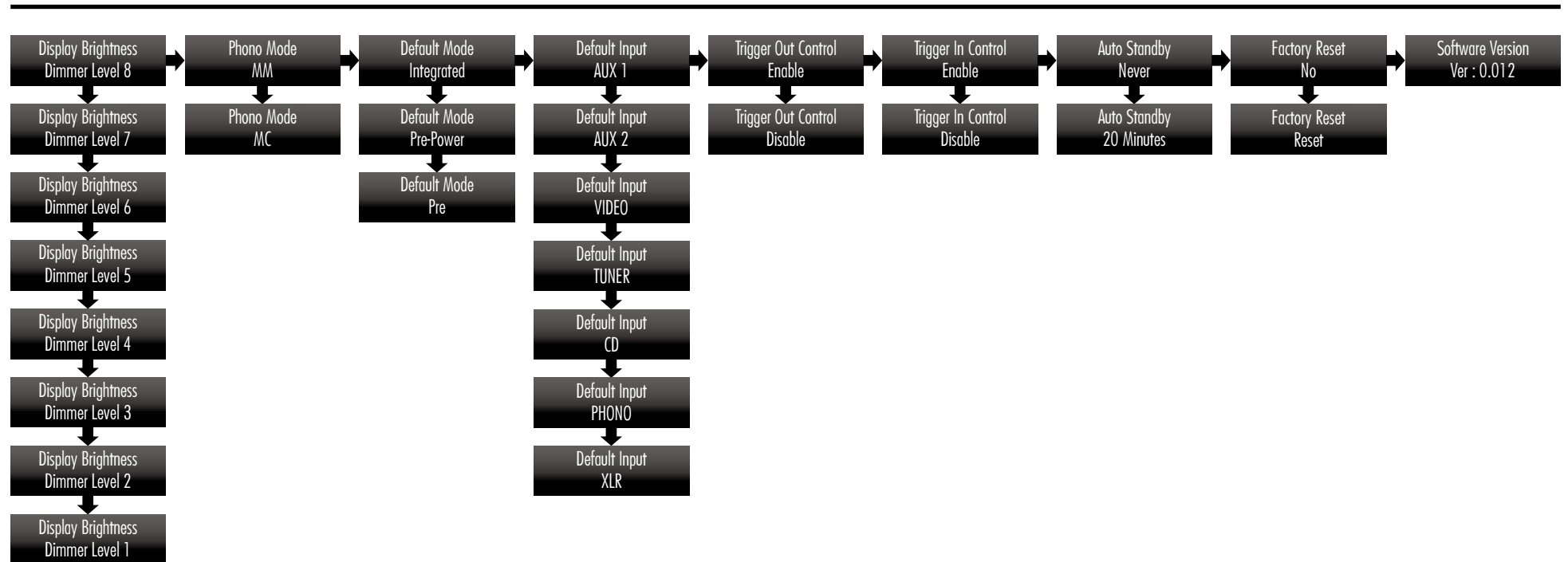
7: The Menu

The menu enables you to customize the unit and optimize the interface with other equipment in your system.

8300A has 9 different menu pages. Press MENU key on remote to enter menu mode, and then press ◀◀ or ▶▶ to turn to different menu pages, press ▶▶ to enter any menu page, press ◀◀ or ▶▶ again to select different setting, press ▶▶ again to confirm chosen setting and exit the menu mode. Press MODE knob on front panel also can enter menu mode, rotate the knob can turn to different menu pages, press MODE knob again can enter any menu page, rotate knob again can surf the setting , press MODE knob again to select different setting. No operation for 5 seconds will also exit menu mode. The Setting will not take effect if ▶▶ or MODE knob is not pressed.

The Menu Tree

The chart shows the menu options, Main menu item are at the top. The next level shows the default settings.



8: Warranty

Audiolab Ltd. warrants this product, subject to the terms and conditions below, to be free from defects in materials and workmanship. During the warranty period Audiolab will repair or replace (at Audiolab's option) this product, or any defective part in this product, if it is found to be defective due to faulty materials, workmanship or function. The warranty period may vary from country to country.

Terms and conditions

The warranty starts on the date of purchase (or the date of delivery if this is later).

You must provide proof of purchase/delivery before work can be carried out. Without this proof, any work carried out will be chargeable to you.

All work will be carried out by Audiolab or its authorized agents or distributors.

Any unauthorized repair or modification will void this warranty.

If any part is no longer available it will be replaced with a functional replacement part.

Any parts that are replaced will become the property of Audiolab.

Any repair or replacement under this warranty will not extend the period of warranty.

This warranty is valid only in the county of purchase, applies only to the first purchaser and is not transferable.

The following are not covered:

1. Products which the serial number have been removed, altered or otherwise made illegible.
2. Normal wear tear and cosmetic damage.
3. Transportation or installation of the product.

Accidental damage, fault caused by commercial use, acts of God, incorrect installation, connection or packing, misuse, neglect or careless operation or handling of the product which is not in accordance with Audiolab's user instructions.

1. Repairs or alterations carried out by parties other than Audiolab or its authorized agents or distributors.
2. Products not purchased from an Audiolab authorized dealer.
3. Products that were not new at the time of original purchase.
4. Products sold 'as is', 'as seen' or 'with all faults'.

Repairs or replacements as provided under this warranty are the exclusive remedy of the consumer. Audiolab shall not be liable for any incidental or consequential damages for breach of any express or implied warranty in this product. Except to the extent prohibited by law, this warranty is exclusive and in lieu of all other warranties whatsoever, both express and implied, including, but not limited to, the warranty of merchantability and fitness for a practical purpose.

This warranty provides benefits that are additional to and do not affect your statutory rights as a consumer.

Some countries and U.S. states do not allow the exclusion or limitation of incidental or consequential damages or implied warranties so the exclusions in the paragraph above may not apply to you. This warranty gives you specific legal rights, and you may have other statutory rights, which vary from state to state or county to county.

How to claim:

To obtain warranty service contact the Audiolab authorized dealer from which you purchased this product. Do not dispatch goods without the prior agreement of the dealer, Audiolab or their authorized distributors.

If asked to return products for inspection and/or repair, pack carefully, preferably in the original cartons or packing affording an equal degree of protection, and return prepaid. If unsuitable packaging is used, Audiolab may make a charge for the supply of new packaging.

Insurance is recommended and goods are returned at owner's risk. Audiolab or their authorized distributors cannot be held liable for loss or damage in transit.

9: Specifications

(Measurement made with 230V power supply)

Gain	0dB (Volume = 0dB, Line/XLR)+48(MM Phono, Volume = 0dB) , +60dB (MC Phono,Volume = 0dB)
Input Sensitivity	330mV (Line/XLR) 3mV (MM Phono) , 300uV (MC Phono)
Input Impedance	100K (Line/XLR) 47K (MM Phonp) , 100R (MC Phono)
Input Voltage (Line)	3.5V max. (< 0.02% THD)
Output voltage (Line)	2.3V max. (< 0.02% THD)
Output impedance (Line)	120 ohm
Frequency response (Line)	+/- 0.1dB (10Hz - 20kHz) +/- 3.0dB (10Hz - 100kHz)
Frequency response (Phono RIAA)	+/- 0.3dB (10Hz - 20kHz)
Channel Imbalance	< 0.2dB (10Hz - 20kHz)
"Total harmonic distortion (THD) (Vol=0dB , Vin=1V ,20Hz - 20kHz, ref. 1kHz)"	<0.001% (Line) <0.01% (Phono)
"Signal-to-noise ratio (Line) (Volume = 0dB , Vin=1V ,20Hz - 20kHz) "	"> 107dB > 109dB (A-weighted)"
"Signal-to-noise ratio Phono (MM) (Volume = 0dB , Vin=3mV , Rs=1K, 20Hz - 20kHz)"	"> 73dB > 78dB (A-weighted)"
"Signal-to-noise ratio Phono (MC) (Volume = 0dB , Vin=300uV , Rs=0R, 20-20KHz)"	"> 68dB > 73dB(A-weighted)"
Crosstalk	< 80dB (L-> R & R->L @10kHz)

Power amplifier Section	
Gain	29dB (20Hz-20kHz)
Input Sensitivity	840mV (Line/XLR)
Input impedance (Line)	15 kohm
Rated Max Power Output	"2 x 70W RMS (8 ohm) , 2x105W (4 ohm) (Vmains = 230V , THD < 1%) "
Frequency response	- 0.1dB (10Hz – 20kHz) - 3.0dB (10Hz – 100kHz)
Channel Imbalance	< 0.2dB (10Hz – 20kHz)
Total harmonic distortion (THD) - (Line)	< 0.002% (Power Out = 50W @ 1kHz, BW = 20 – 20kHz)
Signal-to-noise ratio (S/N)	"> 107dB (20Hz – 20kHz) > 109dB(A-weighted, 20Hz – 20kHz)" "
Damping factor	125 (8ohm Load @ 1kHz)
Standby Power Consumption	< 0.5W
Dimensions (mm) (W x H x D)	80 x 444 x 330.3
Carton size (mm) (W x H x D)	500 x 140 x 452
Net weight	7.8kg
Gross weight	9.0kg



Correct disposal of this product. This marking indicates that this product should not be disposed with other household wastes throughout the EU. To prevent possible harm to the environment or human health from uncontrolled waste disposal, recycle it responsibly to promote the sustainable reuse of material resources. To return your used device, please use the return and collection systems or contact the retailer where the product was purchased. They can take this product for environmental safe recycling.

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