

User Manual



ULTRABASS BB410

High-Performance 1,200-Watt Bass Cabinet with
Original 4 x 10" BUGERA Speakers and 1" Horn Driver

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EN Important Safety Instructions



Terminals marked with this symbol carry electrical current of sufficient magnitude to constitute risk of electric shock.

Use only high-quality professional speaker cables with ¼" TS or twist-locking plugs pre-installed. All other installation or modification should be performed only by qualified personnel.



This symbol, wherever it appears, alerts you to the presence of uninsulated dangerous voltage inside the enclosure - voltage that may be sufficient to constitute a risk of shock.



This symbol, wherever it appears, alerts you to important operating and maintenance instructions in the accompanying literature. Please read the manual.



Caution

To reduce the risk of electric shock, do not remove the top cover (or the rear section). No user serviceable parts inside. Refer servicing to qualified personnel.



Caution

To reduce the risk of fire or electric shock, do not expose this appliance to rain and moisture. The apparatus shall not be exposed to dripping or splashing liquids and no objects filled with liquids, such as vases, shall be placed on the apparatus.



Caution

These service 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 operation instructions. Repairs have to be performed by qualified service personnel.

1. Read these instructions.
2. Keep these instructions.
3. Heed all warnings.
4. Follow all instructions.
5. Do not use this apparatus near water.
6. Clean only with dry cloth.
7. Do not block any ventilation openings. Install in accordance with the manufacturer's instructions.
8. Do not install near any heat sources such as radiators, heat registers, stoves, or other apparatus (including amplifiers) that produce heat.

9. Do not defeat the safety purpose of the polarized or grounding-type plug. A polarized plug has two blades with one wider than the other. A grounding-type plug has two blades and a third grounding prong. The wide blade or the third prong are provided for your safety. If the provided plug does not fit into your outlet, consult an electrician for replacement of the obsolete outlet.

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

11. Use only attachments/accessories specified by the manufacturer.



injury from tip-over.

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

14. 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.

15. The apparatus shall be connected to a MAINS socket outlet with a protective earthing connection.

16. Where the MAINS plug or an appliance coupler is used as the disconnect device, the disconnect device shall remain readily operable.



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

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LIMITED WARRANTY

§ 1 Warranty

① This limited warranty is valid only if you purchased the product from a MUSIC Group Authorized Reseller in the country of purchase. A list of authorized resellers can be found on BEHRINGER's website behringer.com under "Where to Buy", or you can contact the MUSIC Group office closest to you.

② MUSIC Group* warrants the mechanical and electronic components of this product to be free of defects in material and workmanship if used under normal operating conditions for a period of one (1) year from the original date of purchase (see the Limited Warranty terms in § 4 below), unless a longer minimum warranty period is mandated by applicable local laws. If the product shows any defects within the specified warranty period and that defect is not excluded under § 4, MUSIC Group shall, at its discretion, either replace or repair the product using suitable new or reconditioned product or parts. In case MUSIC Group decides to replace the entire product, this limited warranty shall apply to the replacement product for the remaining initial warranty period, i.e., one (1) year (or otherwise applicable minimum warranty period) from the date of purchase of the original product.

③ Upon validation of the warranty claim, the repaired or replacement product will be returned to the user freight prepaid by MUSIC Group.

④ Warranty claims other than those indicated above are expressly excluded.

PLEASE RETAIN YOUR SALES RECEIPT. IT IS YOUR PROOF OF PURCHASE COVERING YOUR LIMITED WARRANTY. THIS LIMITED WARRANTY IS VOID WITHOUT SUCH PROOF OF PURCHASE.

§ 2 Online registration

Please do remember to register your new BEHRINGER equipment right after your purchase at behringer.com under "Support" and kindly read the terms and conditions of our limited warranty carefully. Registering your purchase and equipment with us helps us process your repair claims quicker and more efficiently. Thank you for your cooperation!

§ 3 Return materials authorization

① To obtain warranty service, please contact the retailer from whom the equipment was purchased. Should your MUSIC Group Authorized Reseller not be located in your vicinity, you may contact the MUSIC Group Authorized Fulfiller for your country listed under

LEGAL DISCLAIMER

TECHNICAL SPECIFICATIONS AND APPEARANCES ARE SUBJECT TO CHANGE WITHOUT NOTICE AND ACCURACY IS NOT GUARANTEED. BEHRINGER IS PART OF THE MUSIC GROUP (MUSIC-GROUP.COM). ALL TRADEMARKS ARE THE PROPERTY OF THEIR RESPECTIVE OWNERS. MUSIC GROUP ACCEPTS NO LIABILITY FOR ANY LOSS WHICH MAY BE SUFFERED BY ANY PERSON WHO RELIES EITHER WHOLLY OR IN PART UPON ANY DESCRIPTION, PHOTOGRAPH OR STATEMENT CONTAINED HEREIN. COLORS AND SPECIFICATIONS MAY VARY FROM ACTUAL PRODUCT. MUSIC GROUP PRODUCTS ARE SOLD THROUGH AUTHORIZED FULLFILLERS AND RESELLERS ONLY. FULLFILLERS AND RESELLERS ARE NOT AGENTS OF MUSIC GROUP AND HAVE ABSOLUTELY NO AUTHORITY TO BIND MUSIC GROUP BY ANY EXPRESS OR IMPLIED

“Support” at behringer.com. If your country is not listed, please check if your problem can be dealt with by our “Online Support” which may also be found under “Support” at behringer.com. Alternatively, please submit an online warranty claim at behringer.com BEFORE returning the product. All inquiries must be accompanied by a description of the problem and the serial number of the product. After verifying the product’s warranty eligibility with the original sales receipt, MUSIC Group will then issue a Return Materials Authorization (“RMA”) number.

② Subsequently, the product must be returned in its original shipping carton, together with the return authorization number to the address indicated by MUSIC Group.

③ Shipments without freight prepaid will not be accepted.

§ 4 Warranty Exclusions

① This limited warranty does not cover consumable parts including, but not limited to, fuses and batteries. Where applicable, MUSIC Group warrants the valves or meters contained in the product to be free from defects in material and workmanship for a period of ninety (90) days from date of purchase.

② This limited warranty does not cover the product if it has been electronically or mechanically modified in any way. If the product needs to be modified or adapted in order to comply with applicable technical or safety standards on a national or local level, in any country which is not the country for which the product was originally developed and manufactured, this modification/adaptation shall not be considered a defect in materials or workmanship. This limited warranty does not cover any such modification/adaptation, regardless of whether it was carried out properly or not. Under the terms of this limited warranty, MUSIC Group shall not be held responsible for any cost resulting from such a modification/adaptation.

③ This limited warranty covers only the product hardware. It does not cover technical assistance for hardware or software usage and it does not cover any software products whether or not contained in the product. Any such software is provided “AS IS” unless expressly provided for in any enclosed software limited warranty.

④ This limited warranty is invalid if the factory-applied serial number has been altered or removed from the product.

⑤ Free inspections and maintenance/repair work are expressly excluded from this limited warranty, in particular, if caused by improper handling of the product by the user. This also applies to defects caused by normal wear and tear, in particular, of faders, crossfaders, potentiometers, keys/buttons, guitar strings, illuminants and similar parts.

⑥ Damage/defects caused by the following conditions are not covered by this limited warranty:

- improper handling, neglect or failure to operate the unit in compliance with the instructions given in BEHRINGER user or service manuals;

- connection or operation of the unit in any way that does not comply with the technical or safety regulations applicable in the country where the product is used;
- damage/defects caused by acts of God/Nature (accident, fire, flood, etc) or any other condition that is beyond the control of MUSIC Group.

⑦ Any repair or opening of the unit carried out by unauthorized personnel (user included) will void the limited warranty.

⑧ If an inspection of the product by MUSIC Group shows that the defect in question is not covered by the limited warranty, the inspection costs are payable by the customer.

⑨ Products which do not meet the terms of this limited warranty will be repaired exclusively at the buyer’s expense. MUSIC Group or its authorized service center will inform the buyer of any such circumstance. If the buyer fails to submit a written repair order within 6 weeks after notification, MUSIC Group will return the unit C.O.D. with a separate invoice for freight and packing. Such costs will also be invoiced separately when the buyer has sent in a written repair order.

⑩ MUSIC Group Authorized Resellers do not sell new products directly in online auctions. Purchases made through an online auction are on a “buyer beware” basis. Online auction confirmations or sales receipts are not accepted for warranty verification and MUSIC Group will not repair or replace any product purchased through an online auction.

§ 5 Warranty transferability

This limited warranty is extended exclusively to the original buyer (customer of authorized reseller) and is not transferable to anyone who may subsequently purchase this product. No other person (reseller, etc.) shall be entitled to give any warranty promise on behalf of MUSIC Group.

§ 6 Claim for damage

Subject only to the operation of mandatory applicable local laws, MUSIC Group shall have no liability to the buyer under this warranty for any consequential or indirect loss or damage of any kind. In no event shall the liability of MUSIC Group under this limited warranty exceed the invoiced value of the product.

§ 7 Limitation of liability

This limited warranty is the complete and exclusive warranty between you and MUSIC Group. It supersedes all other written or oral communications related to this product. MUSIC Group provides no other warranties for this product.

§ 8 Other warranty rights and national law

① This limited warranty does not exclude or limit the buyer’s statutory rights as a consumer in any way.

② The limited warranty regulations mentioned herein are applicable unless they constitute an infringement of applicable mandatory local laws.

③ This warranty does not detract from the seller’s obligations in regard to any lack of conformity of the product and any hidden defect.

§ 9 Amendment

Warranty service conditions are subject to change without notice. For the latest warranty terms and conditions and additional information regarding MUSIC Group’s limited warranty, please see complete details online at behringer.com.

* MUSIC Group Macao Commercial Offshore Limited of Rue de Pequim No. 202-A, Macau Finance Centre 9/J, Macau, including all MUSIC Group companies

1. Introduction

Thank you for expressing your confidence in our products by purchasing the BEHRINGER ULTRABASS BB410. This cabinet is built with the outstanding BUGERA bass speakers. The speaker cones are made of special high-quality paper that provide rich bass tone and clear middle frequencies.

Bass players, who love the warm and direct sound of a classic paper cone, will appreciate the high quality and workmanship as well as the extremely high power output of these speakers. All these characteristics make your ULTRABASS BB410 a high-value, dependable companion on the stage, in the studio or in your practice room.

1.1 Shipment

The BB410 was carefully packed at the assembly plant to assure secure transport. Should the condition of the cardboard box suggest that damage may have taken place, please inspect the unit immediately and look for physical indications of damage.

- ❖ **Damaged equipment should NEVER be sent directly to us. Please inform the dealer from whom you acquired the unit immediately as well as the transportation company from which you took delivery. Otherwise, all claims for replacement/repair may be rendered invalid.**
- ❖ **Always use the original packing carton to prevent damage during storage or transport.**
- ❖ **Never let unsupervised children play with the ULTRABASS or with its packaging.**
- ❖ **Please dispose of all packaging materials in an environmentally friendly fashion.**

1.2 Initial operation

Connect the ULTRABASS BB410 to a power amplifier using the speaker connectors located in the back.

- ❖ **Please make sure to completely lower the volume on your amp before connecting it to the BB410.**

2. Control Elements and Connections

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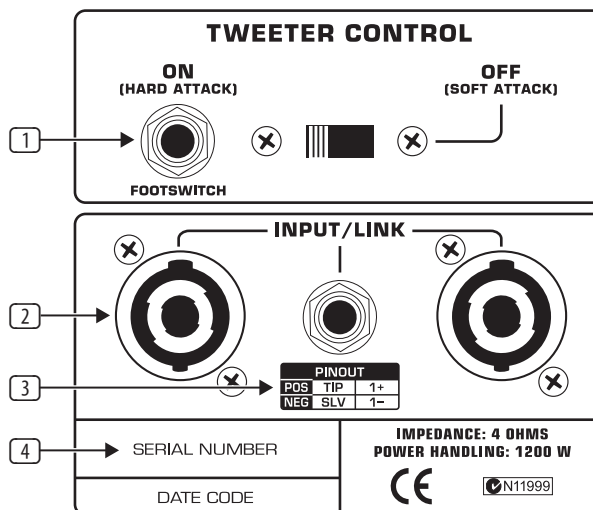


Fig. 2.1: Control elements and connections

- 1 You can connect a **FOOTSWITCH** (e.g. MIDI FOOT CONTROLLER FCB1010) to this 1/4" TS connector to remotely enable/disable the tweeter. When the tweeter is enabled, you get a harder, more direct sound (Hard Attack). When the tweeter is disabled, the entire sound spectrum is reproduced only on the bass speakers (Soft Attack).
- 2 The loudspeakers of the ULTRABASS series feature a 1/4" TS connector in the **INPUT/LINK** section as well as two professional speaker connectors (compatible with NEUTRIK SPEAKON). All connectors are wired in parallel, which means that all three connections are identical in their function. Therefore, you can connect a second speaker to the link connector output without going directly to the amplifier. This way, you can utilize short cables and will require no additional connectors on your amp.
- ❖ **Connecting several ULTRABASS cabinets via the link connector reduces the input impedance: if you connect two identical speakers, the impedance is reduced to one half of the original value, with three speakers to a third, and so on. Therefore, always keep in mind the impedance value of your amplifier to avoid causing damage by overloading. Ideally, the impedance of your speakers corresponds to the impedance of your amplifier. If the speaker has a higher impedance than the amplifier, this will have no negative consequences on the amp, but it won't be able to pass its full power to the speaker. See chapter 4. "Installation" for more information.**
- ❖ **Attention! Never connect two amps to one BB410. Otherwise, you may destroy both your amps and your speakers.**
- 3 This table shows the correct polarity of the connectors:

Plus pole (POS) = Tip (TIP) on the 1/4" TS connector or 1+ on the professional speaker connector.
Minus pole (NEG) = Sleeve (SLV) on the 1/4" TS connector or 1- on the professional speaker connector.
- ❖ **Please observe the illustrations 4.1 and 4.2.**
- 4 **SERIAL NUMBER.** Please take a few minutes and send us the completed warranty card within 14 days of the date of purchase; failure to do so may void future warranty claims. You may also register online at behringer.com.

3. Applications

With a variety of connectors and the option to combine your BB410 with other BEHRINGER equipment, there is a large number of possible applications for your ULTRABASS. The following illustrations show a few of those.

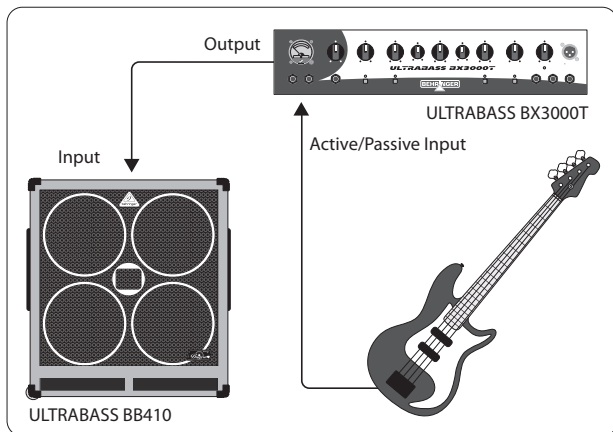


Fig. 3.1: Mono setup with the ULTRABASS BX3000T

This illustration shows a simple setup with the BEHRINGER ULTRABASS BX3000T bass amplifier. This setup is particularly well suited for practice rooms and smaller venues. On larger stages, you can connect it to a mixing console via the DI Out connector. The equipment can be quickly assembled and disassembled, yet it is amazingly flexible.

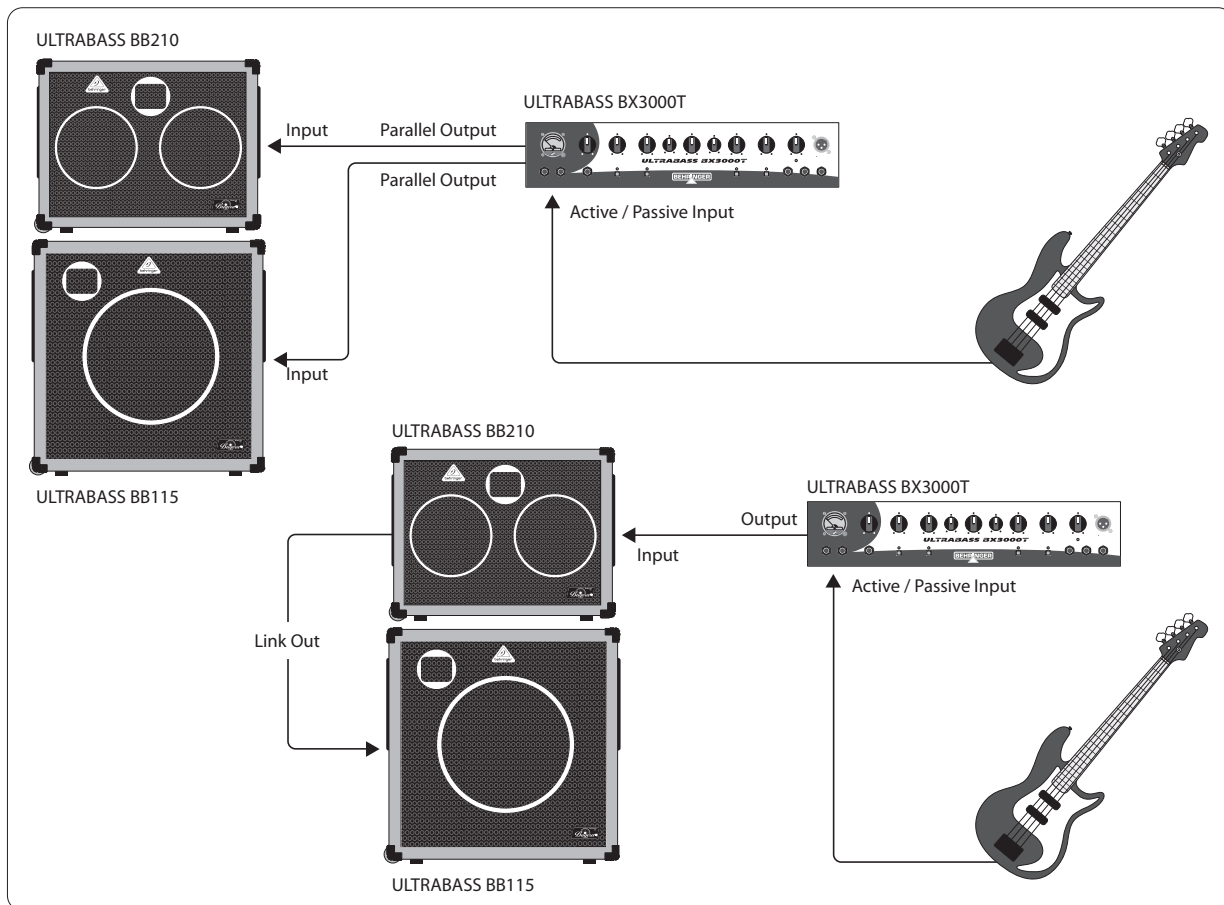


Fig. 3.2: Expanded mono setup with different connectivity options for loudspeakers

This setup is recommended for gigs or practice with bigger bands. Here, two different cabinets are combined into a stack. Speaker connection is either done separately, so that each cabinet is connected to a separate

ULTRABASS BX3000T output, or by connecting only one cabinet directly to the amplifier, whereby the signal is fed into the second cabinet with a cable (Link). Also see [2].

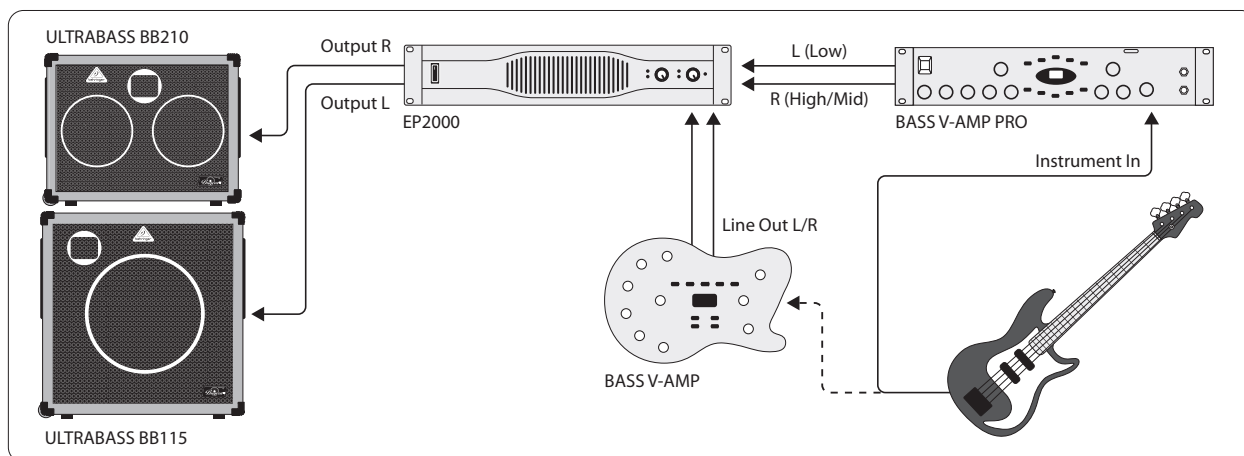


Fig. 3.3: Bi-amping: high and low frequencies are separately reproduced by the bass cabinets

When using the BASS V-AMP or the BASS V-AMP PRO, you also have the option of using bass cabinets in the bi-amping mode. With bi-amping, high and low frequency ranges are split between different bass cabinets, so that the entire sound spectrum is not simultaneously reproduced on all speakers. In fig. 3.3, low-end signals are reproduced on the BB115, while the mids and the highs are reproduced on the BB210. Splitting the frequency range requires an active crossover.

The BASS V-AMP and the BASS V-AMP PRO already feature this function. Here, the frequencies are split in such a way that the low-end signals are reproduced on the left channel, and the mids and the highs are reproduced on the right channel. How to make the necessary settings on the crossover (X-OVER function) is explained in chapter 6.3 (post amp effects) in the BASS V-AMP/BASS V-AMP PRO manual.

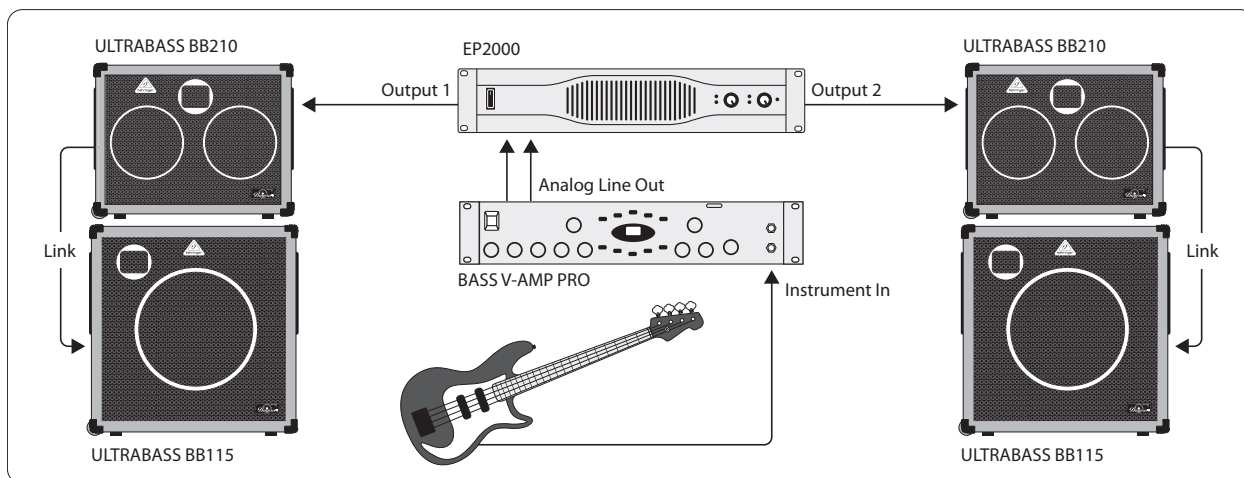


Fig. 3.4: Expanded stereo configuration

This stereo setup is meant for all those who crave a saturated stereo sound. Together with the BASS V-AMP or the BASS V-AMP PRO, stereo effects such as Chorus or Delay come alive. Real stereo effects require two separate cabinets set up to run in stereo. Our EUROPOWER EP2500 is perfect in the amplifier role. Additionally, with its 2 x 1,200 Watts, it has the necessary headroom to truly rock.

This is the expansion of the setup shown in fig. 3.3. Instead of powering two individual cabinets, the amp in fig. 3.4 powers each of the two stacks comprised of the BB115 and the BB210 cabinets. The cabinets are connected to one another using a link cable. Here, too, we recommend using only professional loudspeaker cables (compatible with NEUTRIK SPEAKON).

4. Installation

4.1 Speaker connector

When combining several speakers/cabinets, you should bear in mind the resulting overall impedance. Here are some brief explanations about different kinds of connections:

Serial connection: The individual impedance values of the connected speakers are added up. If two 4-Ohm speakers are connected to one another, there is an overall impedance value of 8 Ohms.

Parallel connection: If speaker/cabinets with identical impedance values are connected in parallel, the overall nominal impedance is reversely proportional to the number of speakers, e.g. if you connect two speakers/cabinets, the nominal impedance is halved; if you connect three speakers/cabinets, the nominal impedance is one third of the individual speakers' impedance; with four speakers, it's one quarter, and so on. For example, this way you can turn two 8-Ohm systems into one 4-Ohm system.

If four or more speakers/cabinets need to be connected, this can be done using a **serial parallel connection**. With four speakers with an impedance value of 4 Ohms each, the resulting overall impedance does not change.

♦ Whenever possible, try to use thick and short speaker cables to minimize power loss. Don't lay output cables near input cables.

Wiring options for loudspeakers are additionally explained in the following illustrations and tables.

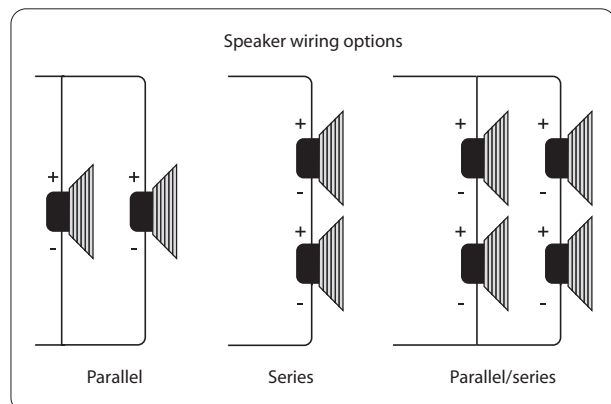


Fig. 4.1: Different types of connections

Number of speakers	2x	2x	2x	4x	4x	4x
Impedance of each speaker (Ω)	4	8	16	4	8	16
Resulting impedance with parallel connection (Ω)	2	4	8	1	2	4
Resulting impedance with serial connection (Ω)	8	16	32	16	32	64
Resulting impedance with serial parallel connection (Ω)	—	—	—	4	8	16

Table 4.1: Speaker wiring options and resulting impedance

♦ Please note that if the LINK connector is utilized, the BA and BB series bass cabinets only support parallel connections.

4.2 Audio connections

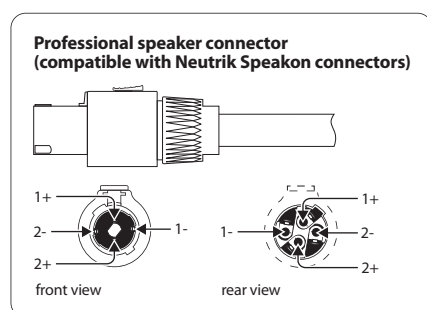


Fig. 4.2: Professional speaker connector with polarity allocation

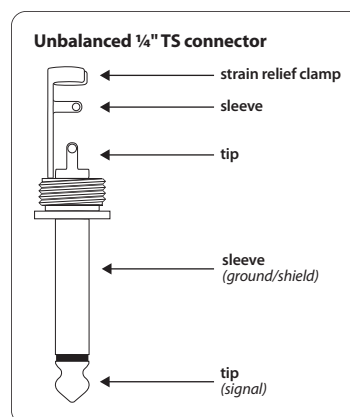


Fig. 4.3: 1/4" TS connector

5. Specifications

Speakers

High-power bass speakers	4 x 10" BUGERA
Sensitivity	99 dB @ 1 W / 1 m
Impedance	4 Ohm
Frequency response	38 Hz - 16 kHz
Power (RMS / Music)	1,200 W
Tweeter	1" tweeter driver

Speaker Connections

Input/Link	2 professional speaker connectors, compatible with NEUTRIK SPEAKON (wired in parallel) as well as one 1/4" TS connector
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Dimensions/Weight

Dimensions (W x H x D)	25 4/5 x 28 1/5 x 16" 655 x 716 x 407 mm
Weight	ca. 100.2 lbs / 45.4 kg

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We Hear You