

**ENGLISH** 

**Xi-3** V1

Ordercode: D3432/D3433

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# Warning



# For your own safety, please read this user manual carefully before your initial start-up!



#### **Unpacking Instructions**

Immediately upon receiving this product, carefully unpack the carton and check the contents to ensure that all parts are present, and have been received in good condition. Notify the dealer immediately and retain packing material for inspection if any parts appear damaged from shipping or the carton itself shows signs of mishandling. Save the carton and all packing materials. In the event that a fixture must be returned to the factory, it is important that the fixture be returned in the original factory box and packing.

#### Your shipment includes:

- 2 x DAP Audio Xi-3
- 2 x 6,3 mm jack speaker cable (0,2 m)
- User manual





#### **CAUTION!**

Keep this device away from rain and moisture!
Unplug mains lead before opening the housing!



#### **Safety Instructions**

Every person involved with the installation, operation and maintenance of this system has to:

- be qualified
- follow the instructions of this manual



CAUTION! Be careful with your operations.

With a dangerous voltage you can suffer a dangerous electric shock when touching the wires!



Before you initial start-up, please make sure that there is no damage caused by transportation. Should there be any, consult your dealer and do not use the system.

To maintain perfect condition and to ensure a safe operation, it is absolutely necessary for the user to follow the safety instructions and warning notes written in this manual.

Please consider that damages caused by manual modifications to the system are not subject to warranty.

This system contains no user-serviceable parts. Refer servicing to qualified technicians only.

#### **IMPORTANT:**

The manufacturer will not accept liability for any resulting damages caused by the non-observance of this manual or any unauthorized modification to the system.

- Always disconnect power from the mains, when system is not used. Only handle the power cord by the plug. Never pull out the plug by tugging the power cord.
- Always operate the unit with the AC ground wire connected to the electrical system ground.
- Avoid flames and do not put close to flammable liquids or gases.



- Avoid ground loops! Always be sure to connect the power amps and the mixing console to the same electrical circuit to ensure the same phase!
- Avoid installing your equipment very near radio or TV sets, mobile phones, etc., as these can cause RF (radio frequency) interference.
- Before changing your grounds around, always turn your amplifiers down.
- Do not connect this device to a dimmer pack.
- Do not drive the inputs with a signal level higher than required to drive the equipment to full output.
- Do not open this device. Risk: hazardous radiation exposure.
- Do not switch the system on and off in short intervals, as this would reduce the system's life.
- Extreme frequency boosts in connection with a high input signal level may lead to overdriving your equipment. Should this occur, it is necessary to reduce the input signal level by using the INPUT control.
- If device is dropped or struck, disconnect mains power supply immediately. Have a qualified engineer inspect for safety before operating.
- If the system has been exposed to drastic temperature fluctuation (e.g. after transportation), do not switch it on immediately. The arising condensation water might damage your system. Leave the system switched off until it has reached room temperature.
- Make sure that the available voltage is not higher than stated on the rear panel.
- Make sure that the power cord is never crimped or damaged. Check the device and the power cord from time to time.
- Make sure that the signals into the mixer are balanced, otherwise hum could be created.
- Make sure that there is sufficient room on all sides of the system for air circulation.
- Make sure you do not use the wrong kind of cables or defective cables.
- Make sure you use DI boxes to balance unbalanced signals; All incoming signals should be clear.
- Never let the power cord come into contact with other cables! Handle the power cord and all connections with the mains with particular caution!
- Never remove warning or informative labels from the unit.
- Never use anything to cover the ground contact.
- Only use device indoors, avoid contact with water or other liquids.
- Prevent distortion! Make sure that all components connected to the Xi-3 have sufficient power ratings. Otherwise distortion will be generated because the components are operated at their limits.
- Repairs, servicing and electric connection must be carried out by a qualified technician.
- The best way (even if not always feasible) to avoid ground loops is to connect the electric ground of all the equipment to a single central point ("star" system). In this case, the central point can be the mixer.
- To avoid or solve hum and buzzing troubles, try different combinations of lifting grounds on units that are supplied with ground lift switches or make sure all chassis are connected to earth ground, either through the A.C. power cord ground or by the front panel rack mount screws.
- To emphasize a frequency range, you do not necessarily have to move its respective slider upwards; instead, try lowering surrounding frequency ranges. This way, you avoid causing the next piece of equipment in your sound path to overdrive. You also preserve valuable dynamic reserve ("headroom").
- When connecting the other parts of your sound system, watch out for the so-called "ground loops".
- WARRANTY: Till one year after date of purchase.

#### **Operating Determinations**

- If this system is operated in any other way, than the one described in this manual, the product may suffer damages and the warranty becomes void.
- Any other operation may lead to dangers like short-circuit, burns, electric shock, etc.

You endanger your own safety and the safety of others!

Improper installation can cause serious damage to people and property!



#### Connection with the mains

Connect the device to the mains with the power-plug.

Always pay attention, that the right color cable is connected to the right place.

<u>International</u>	EU Cable	UK Cable	US Cable	Pin
L	BROWN	RED	YELLOW/COPPER	PHASE
N	BLUE	BLACK	SILVER	NEUTRAL
<b>(</b>	YELLOW/GREEN	GREEN	GREEN	PROTECTIVE GROUND

Make sure that the device is always connected properly to the earth!

Improper installation can cause serious damage to people and property!



#### **Return Procedure**



Returned merchandise must be sent prepaid and in the original packing, call tags will not be issued. Package must be clearly labeled with a Return Authorization Number (RMA number). Products returned without an RMA number will be refused. Highlite will not accept the returned goods or any responsibility. Call Highlite 0031-455667723 or mail <a href="mailto:aftersales@highlite.nl">aftersales@highlite.nl</a> and request an RMA prior to shipping the fixture. Be prepared to provide the model number, serial number and a brief description of the cause for the return. Be sure to properly pack fixture, any shipping damage resulting from inadequate packaging is the customer's responsibility. Highlite reserves the right to use its own discretion to repair or replace product(s). As a suggestion, proper UPS packing or double-boxing is always a safe method to use.

# Note: If you are given an RMA number, please include the following information on a piece of paper inside the box:

- 01) Your name
- 02) Your address
- 03) Your phone number
- 04) A brief description of the symptoms

#### Claims

The client has the obligation to check the delivered goods immediately upon delivery for any short-comings and/or visible defects, or perform this check after our announcement that the goods are at their disposal. Damage incurred in shipping is the responsibility of the shipper; therefore the damage must be reported to the carrier upon receipt of merchandise.

It is the customer's responsibility to notify and submit claims with the shipper in the event that a fixture is damaged due to shipping. Transportation damage has to be reported to us within one day after receipt of the delivery.

Any return shipment has to be made post-paid at all times. Return shipments must be accompanied with a letter defining the reason for return shipment. Non-prepaid return shipments will be refused, unless otherwise agreed in writing.

Complaints against us must be made known in writing or by fax within 10 working days after receipt of the invoice. After this period complaints will not be handled anymore.

Complaints will only then be considered if the client has so far complied with all parts of the agreement, regardless of the agreement of which the obligation is resulting.



## Description of the device

#### **Features**

The Xi series is designed for installation use. The specially designed housing makes it possible to reach the ideal power handling and the desired acoustic spread of the sound. With the variable dispersion angles (0-12°), the innovative cabinet facilitates optimization of the sound dispersion for different acoustic requirements at various venues.

It is possible to install multiple Xi-3 units, to customize the setup, depending on the venue (bars, shopping malls, auditoriums, gyms, community centers and other medium-sized environment).

- Impedance: 8 Ω
- Continuous power: 30W
- Program power: 60W
- Peak power: 90W
- Array RMS power: 60W (2pcs @4 Ohm), 120W (4pcs @ 8 Ohm),
  - 180W (6pcs @ 5,3 Ohm), 240W (8pcs @ 4 Ohm)
- Components: 4" Neodymium woofer + 3 x 0,5" dome tweeter
- Frequency response (-3dB): 160-18000 Hz
- Frequency response (-10dB): 100-20000 Hz
- Recommended HPF: 160Hz
- Crossover frequency: 3000Hz, 12dB/Okt
- Sensitivity (full space): 88dB/W/m
- Peak SPL @1m: 94dB
- Normal dispersion (HxV): 110° x 20°
- Connectors: 3 x 6,3 mm jack
- Housing: Aluminum cabinet, resistant black finish
- Color: Black (**D3432**), White (**D3433**)
- Dimensions: 170 x 145 x 140 mm (LxWxH)
- Weight (per speaker): 1,5 kg

#### Optional accessories:

- D3434 Wall Bracket (Black)
- D3435 Wall Bracket (White)
- D3436 Suspension Bracket (Black)
- D3437 Suspension Bracket (White)
- D3438 Mobile Bracket (Black)
- D3439 Mobile Bracket (White)
- **D3442** Xi-12B (Black)
- **D3443** Xi-12B (White)

#### Overview

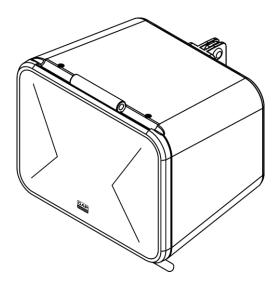


Fig. 01



#### **Backside**

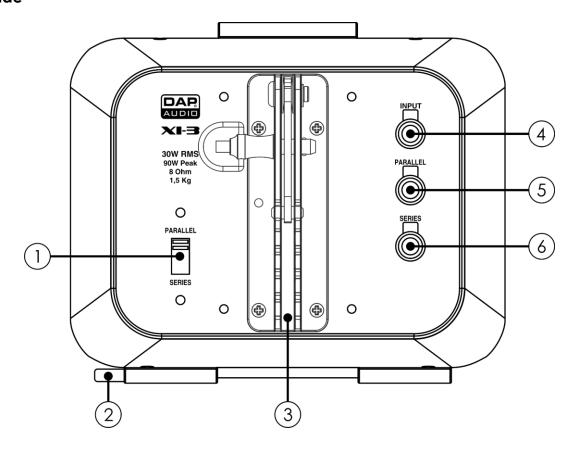


Fig. 02

#### 01) Parallel/Series switch

Move the switch to select Parallel for parallel connections **(05)**. Move the switch to select Series for series connections **(06)**. See pages 11-12 for connection examples.

- 02) Rigging pin
- 03) Rigging bracket
- 04) 6,3 mm jack connector INPUT

Connect the Xi-3 to an external amplifier or another Xi-3 speaker.

05) 6,3 mm jack connector – PARALLEL

Connect the Xi-3 to another Xi-3, in parallel.

06) 6,3 mm jack connector - SERIES

Connect the Xi-3 to another Xi-3, in series.

#### Installation

Remove all packing materials from the Xi-3. Check if all foam and plastic padding is removed. Connect all cables.

Do not supply power before the whole system is set up and connected properly. Always disconnect from electric mains power supply before cleaning or servicing. Damages caused by non-observance are not subject to warranty.

You can mount the Xi-3 by means of the:

- Wall Bracket (Black, **D3434**), (White, **D3435**)
- Suspension Bracket (Black, D3436), (White, D3437)
- Mobile Bracket (Black, D3438), (White, D3439)



#### **Wall Bracket**

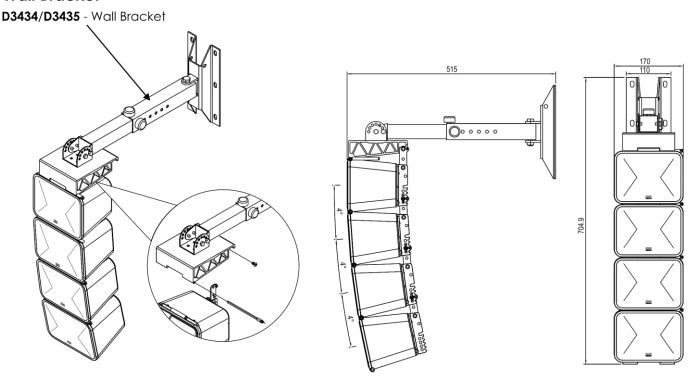


Fig. 03

- 01) Mount the Wall Bracket (**D3434/D3435**) on a wall (fig. 03).
- 02) Mount the Xi-3 speakers on the Wall Bracket, from the top downwards, and insert the rigging pins to connect them to each other (fig. 04 and fig. 05).

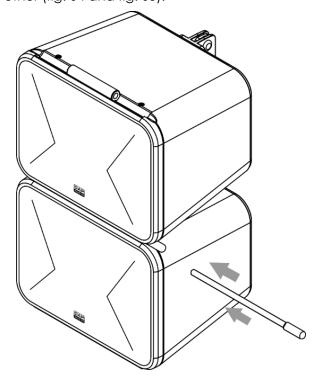


Fig. 04

03) Choose the desired directivity angle by inserting the rigging pin into the appropriate slot (0/4/8/12°). Insert the latch, to lock the speakers in position. The angle setting has influence on the sound directivity.

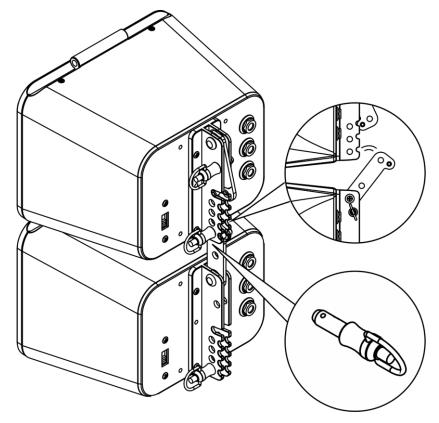


Fig. 05

### **Suspension Bracket**

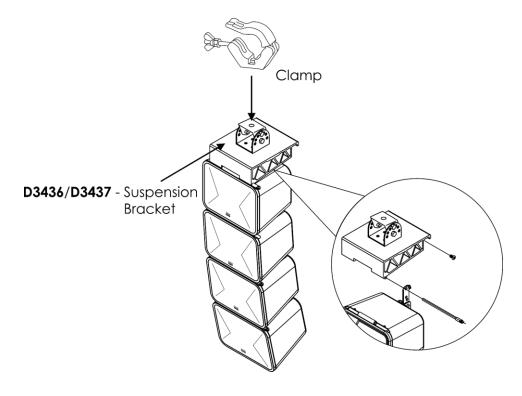


Fig. 06

- 01) By means of a clamp, mount the Suspension Bracket (D3436/D3437) on a truss.
- 02) Mount the Xi-3 speakers on the Suspension Bracket, from the top downwards (see fig. 04 and fig. 05).

#### **Mobile Bracket**

- 01) Mount a 35-mm speaker stand/speaker pole.
- 02) Mount the Mobile Bracket (**D3438/D3439**) on the top of the speaker stand/speaker pole and tighten its mounting screw, to secure it in position.
- 03) Mount the first Xi-3 speaker on the Mobile Bracket and insert the rigging pin to secure it in position (fig. 07).

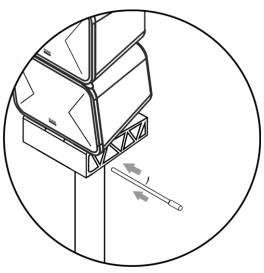


Fig. 07

- 04) Choose the desired directivity angle by inserting the rigging pin into the appropriate slot. Insert the latch, to lock the first Xi-3 speaker (fig. 08). The angle setting has influence on the sound directivity. This time, please, ignore the angle indicators located on the slots (0/4/8/12°) as they are valid only in case of connecting multiple Xi-3 speakers.

  In combination with the Mobile Bracket, however, the angle indicators are NOT CORRECT!!!
- 05) Mount more Xi-3 speakers, from the bottom upwards, on the top of the already mounted first Xi-3 speaker (fig. 04 and fig. 05).

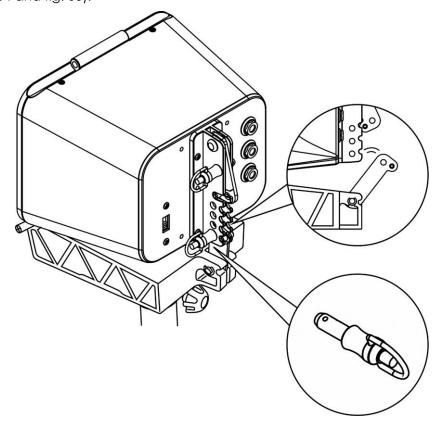


Fig. 08



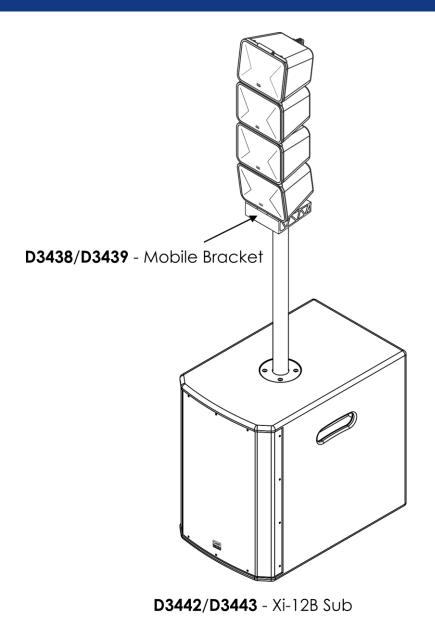


Fig. 09

# **Set Up and Operation**

Follow the directions below, as they pertain to your preferred operation mode.

# Connection Example 1 (Top-Bottom)

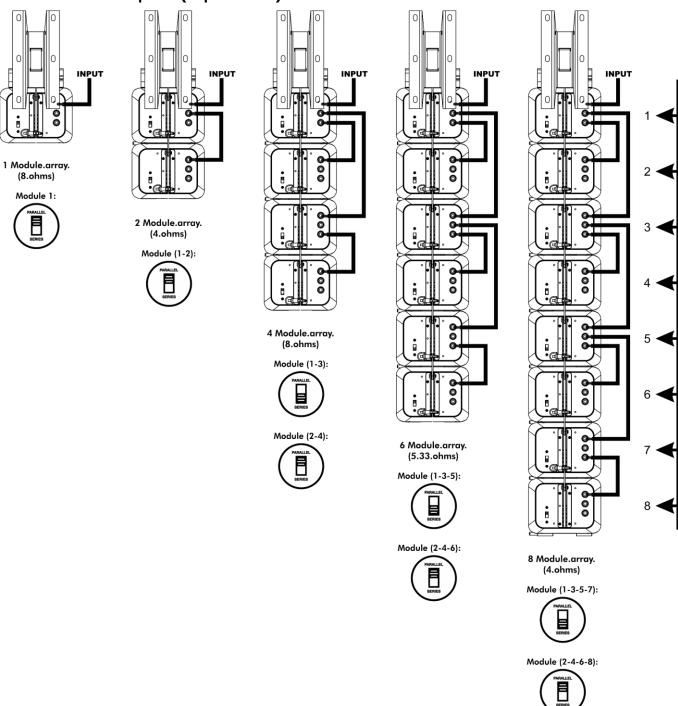


Fig. 10



# Connection Example 2 (Bottom-Top)

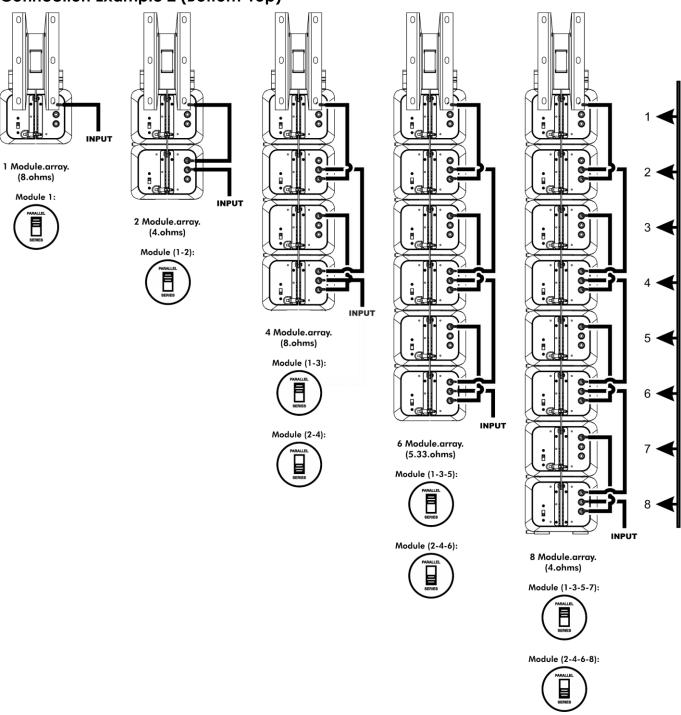


Fig. 11



#### System Setup Example 1 (8 x Xi-3)

Make your initial connections with all the equipment powered off and ensure that all the main volume controls are turned completely to the minimum. Follow the steps below.

- 01) Connect the outputs on your mixer with the inputs on your digital crossover.
- 02) Connect the outputs on your digital crossover with the inputs on your amplifier.
- 03) Use speaker cables to connect the outputs on your amplifier with the input sockets on your Xi-3 satellite cabinets (**D3432/D3433**). See pages 11-12 for more information about wiring.
- 04) Turn on your mixer first, then the amplifier.
- 05) After using your equipment, turn off your amplifier first, then the mixer.

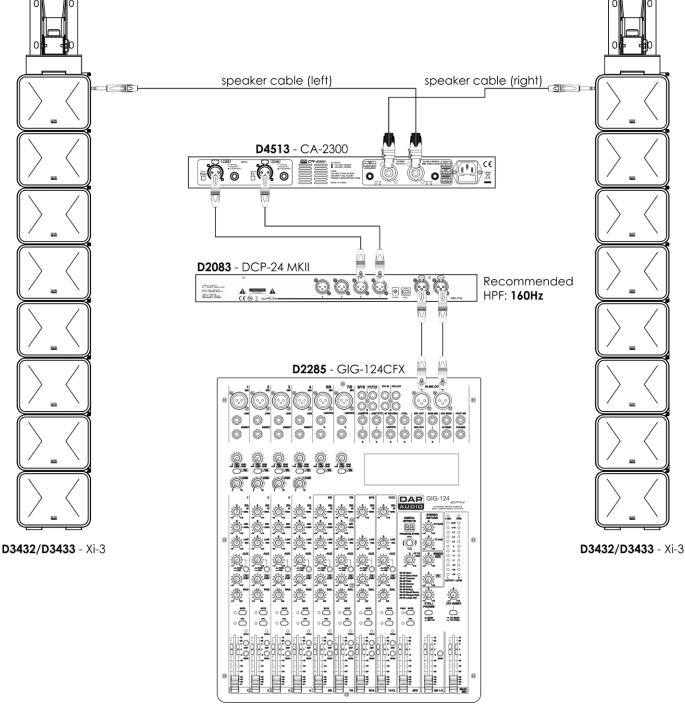


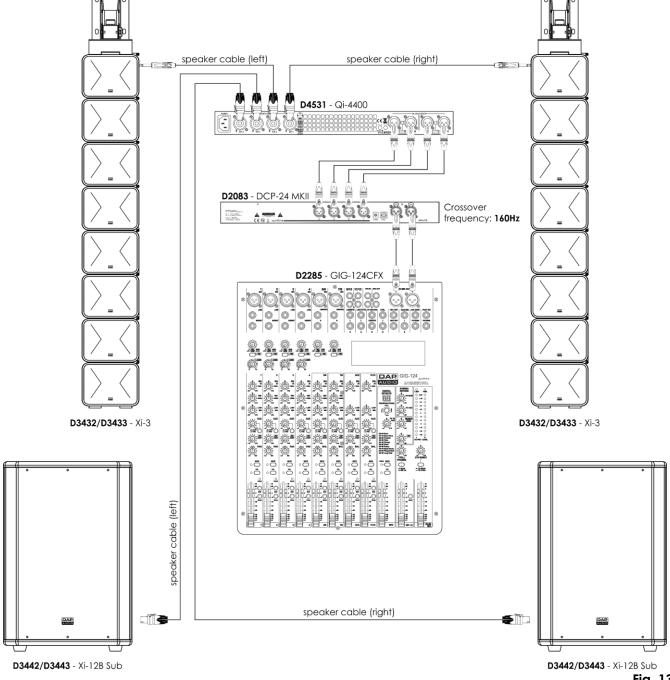
Fig. 12



#### System Setup Example 2 (8 x Xi-3 and 2 x Xi-12B)

Make your initial connections with all the equipment powered off and ensure that all the main volume controls are turned completely to the minimum. Follow the steps below.

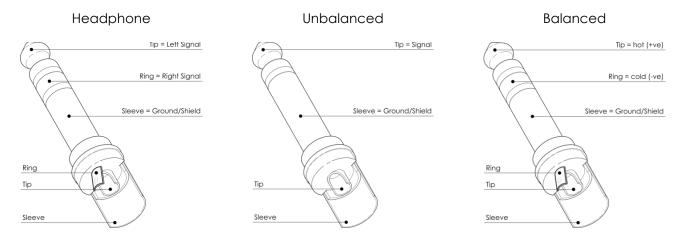
- 01) Connect the outputs on your mixer with the inputs on your digital crossover.
- 02) Connect the high-pass outputs on your digital crossover with the dedicated inputs on your amplifier.
- 03) Connect the low-pass outputs on your digital crossover with the dedicated inputs on your amplifier.
- 04) Use speaker cables to connect the corresponding high-pass outputs (160Hz) on your amplifier with the input sockets on your Xi-3 satellite cabinets (**D3432/D3433**). See pages 11-12 for more information about wiring.
- 05) Use speaker cables to connect the corresponding low-pass outputs (160Hz) on your amplifier with the input sockets on your Xi-12B subwoofers (**D3442/D3443**). See pages 11-12 for more information about wiring.
- 06) Turn on your mixer first, then the amplifier.
- 07) After using your equipment, turn off your amplifier first, then the mixer.





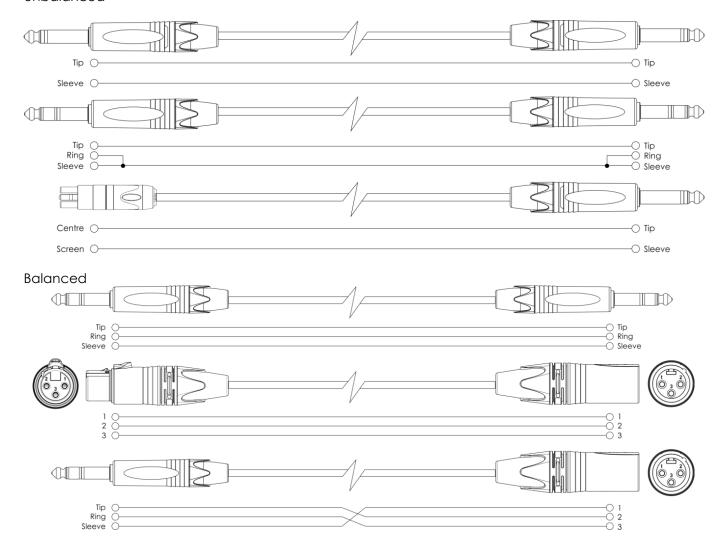
### **Connection Cables**

Take care of your cables, always holding them by the connectors and avoiding knots and twists when coiling them: This gives the advantage of increasing their life and reliability. Periodically check your cables. A great number of problems (faulty contacts, ground hum, discharges, etc.) are caused entirely by using unsuitable or faulty cables.



For these applications the unit provides 1/4" TRS and XLR connectors to easily interface with most professional audio devices. Follow the configuration examples below for your particular connection.

#### Unbalanced





#### **Recommended Speaker Cables**

<u>FS01150</u> – FS01 jack mono > jack mono, 2 x 1,5mm<sup>2</sup> (1,5 m)

FSO13 - FSO1 jack mono > jack mono,  $2 \times 1.5 \text{mm}^2$  (3 m)

FS016 - FS01 jack mono > jack mono, 2 x 1,5mm<sup>2</sup> (6 m)

<u>FS0110</u> - FS01 jack mono > jack mono, 2 x 1,5mm<sup>2</sup> (10 m)

FS0115 - FS01 jack mono > jack mono, 2 x 1,5mm² (15 m)

FS026 – FS02 jack mono > XLR/F 3-pin, 2 x 1,5mm<sup>2</sup> (6 m)

FS0210 - FS02 jack mono > XLR/F 3-pin, 2 x 1,5mm<sup>2</sup> (10 m)

FS163 – Neutrik FS16 jack mono > Speakon/M, 2 x 1,5mm<sup>2</sup> (3 m)

FS166 – Neutrik FS16 jack mono > Speakon/M, 2 x 1,5mm<sup>2</sup> (6 m)

FS1610 - Neutrik FS16 jack mono > Speakon/M, 2 x 1,5mm<sup>2</sup> (10 m)

FS1620 - Neutrik FS16 jack mono > Speakon/M, 2 x 1,5mm<sup>2</sup> (20 m)

#### Maintenance

The Xi-3 requires almost no maintenance. However, you should keep the unit clean. Disconnect the mains power supply, and then wipe the cover with a damp cloth. Do not immerse in liquid. Do not use alcohol or solvents.

Keep connections clean. Disconnect electric power, and then wipe the connections with a damp cloth. Make sure connections are thoroughly dry before linking equipment or supplying electric power.

# **Troubleshooting**

This troubleshooting guide is meant to help solve simple problems. If a problem occurs, carry out the steps below in sequence until a solution is found. Once the unit operates properly, do not carry out following steps.

- 01) If the device does not operate properly, unplug the device.
- 02) Check the power from the wall, all cables, etc.
- 03) If all of the above appears to be O.K., plug the unit in again.
- 04) If you are unable to determine the cause of the problem, do not open the Xi-3, as this may damage the unit and the warranty will become void.
- 05) Return the device to your Dap Audio dealer.

# **Product Specifications**

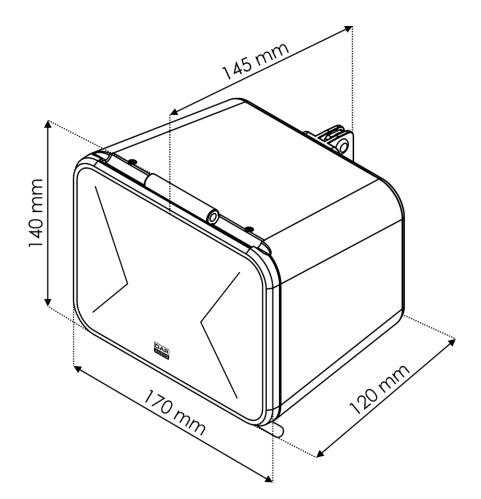
Impedance:	8 Ω
Continuous power:	60W
Peak power:	90W
Array RMS power:	60W (2pcs @4 Ohm), 120W (4pcs @ 8 Ohm), 180W (6pcs @ 5,3 Ohm), 240W (8pcs @ 4 Ohm)
Components:	4" Neodymium woofer + 3 x 0,5" dome tweeter
Frequency response (-3dB):	160-18000Hz
Frequency response (-10dB):	100-20000Hz
Recommended HPF:	160Hz
Crossover frequency:	3000Hz, 12dB/Okt
Sensitivity (full space):	88dB/W/m
Peak SPL @1m:	94dB
Normal dispersion (HxV):	110° x 20°
Connectors:	3 x 6,3 mm jack
Housing:	Aluminum cabinet, resistant black finish
Color:	Black ( <b>D3432</b> ), White ( <b>D3433</b> )
Dimensions:	170 x 145 x 140 mm (LxWxH)
Weight (per speaker):	1,5 kg

Design and product specifications are subject to change without prior notice.





# Dimensions







Ordercode: D3432/D3433

