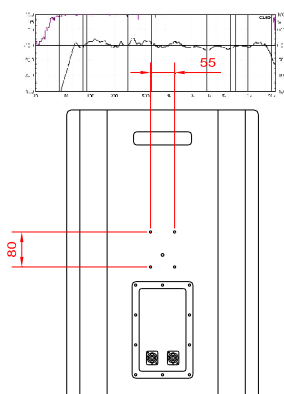




# QB Series

## USER MANUAL

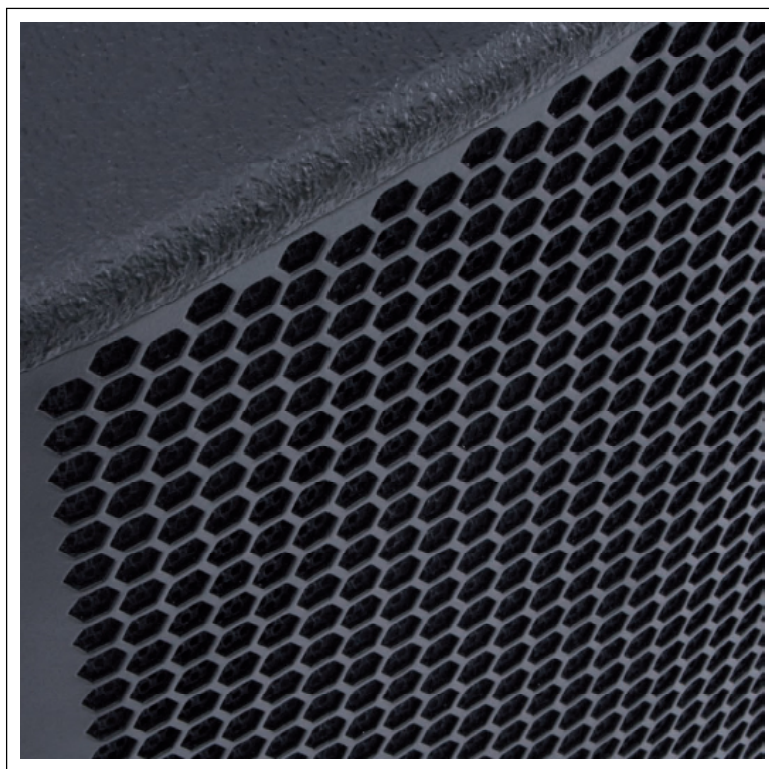
V.12.01



**Lynx Pro Audio S.L.**

Valencia, Spain - [www.lynxproaudio.com](http://www.lynxproaudio.com) - [info@lynxproaudio.com](mailto:info@lynxproaudio.com)

- ▶ Complete installation range
- ▶ Versatile Sound reinforcement
- ▶ High Performance
- ▶ Precise band pass directivity control
- ▶ ARK optimised preset
- ▶ White & black colour optional
- ▶ Multiple rigging/mounting options



## QB series, installation cabinets



### Manufacturer



**LYNX Pro Audio S.L.**  
**Calle 7 - Pol. Ind. Picassent**  
**E-46220 Picassent (Valencia)**



**CE CERTIFICATION, EUROPEAN PRODUCT**



RoHS Directive 2002/95/EC

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Before starting to use this device, please read this instruction manual carefully.  
Keep these instructions in the place where the equipment will be used and with easy access to them.



**- Electrical appliance.**

The exclamation mark within a triangle identifies the presence of electricity. Use the system carefully without wet hands or feet. Avoid installing the speaker in wet or excessively humid places. Regularly check the condition of the cables and make sure these are not being walked on or pinched. Connect the speaker to bipolar, earthed mains. The mains plug must be connected to the appropriate protection (fuse or breaker). Connection to any other type of mains could result in an electrical shock and violate local electrical codes. **DO NOT CONNECT OR DISCONNECT THE AC POWER CONNECTORS UNDER LOAD.**



**- Hearing damage risk.**

These systems can reproduce large quantities of sound pressure which can damage hearing. Take precautions if you are going to be near them for extended amounts of time and do not get too close.



**- Hanging – Flying.**

Do not hang the cabinets from the handles or from any other part other than the designated hanging point. When flying this system please observe the technical and “Lynx On Stage” software data carefully. Never exceed the maximum safe working loads or ignore the instructions included within this manual. Use Only flying accessories provided by Lynx Pro Audio S.L.

Rigging must be always carried out by professionals.



**- Delicate Material.**

Please ensure no foreign object or water enters the speaker. Do not place material that contains liquid on or near the unit. Only clean the unit with dry cloths. Do not use solvents.



**-Overheating – Fire risk.**

To reduce the risk of the speaker over heating, avoid direct contact with sunlight. Avoid placing the unit close to heat inducing objects such as radiators. Do not cover the equipment in use and do not block any ventilation openings. Do not put naked flame, such as lighted candles, close or on top of the unit.



**- Electromagnetic and interferente emissions.**

Avoid placing objects which through electromagnetic waves can damage the unit, such as mobile phones, lap tops, magnetic strip cards etc.

This system complies with normatives

EN 55103-1 (1)

EN 55103-2 (2)

(1) This device may not cause harmful interferences.

(2) This device may receive interference including interferences that may cause undesired working.



**-IMPORTANT NOTE.**

This Equipment must be used in accordance with these instructions and by trained professional personnel only.

This equipment should not be used in places with extreme tropical climates. Don't expose this apparatus to extreme humidity and or temperature values.



**- Heavy equipment.**

Apply back protection when using the system. Avoid loading and unloading at heights.

## INTRODUCTION

To facilitate, correct and reliable use of the QB series we have designed this instruction manual. Please read the manual carefully before proceeding to install the cabinets.

All QB Series components have been carefully selected to offer a lightweight, versatile series delivering dynamic sound whilst remaining as competitively priced as possible and guaranteeing utmost reliability. All cabinets deliver a linear phase response and have been engineered to reduce distortion.

The series can boast exceptional coverage with wide horn-drivers fitted to all the cabinets. Cluster configurations are possible to increase both pressure and dispersion whilst maintaining excellent sound distribution and fidelity.

All QB Series Full Range cabinets are supplied with high frequency OCPP protection (Over Current Passive protection) whilst all Sub-bass models come with SWR (Stationary Wave Reduction) to reduce internal stationary waves.

All QB Series cabinets are finished in a rugged, premium birch plywood and coated with high resistant water-based black paint and a strong steel grille. Cabinets are also available in white on request.

Special attention to detail has been given to offer flexible application solutions ensuring simple and reliable setups. A selection of professional accessories and rigging is available providing installation solutions for any application.

For QB Series simulation and planning the Rainbow Prediction software is available to all Lynx users. Rainbow offers an accurate prediction for any sound reinforcement project with both horizontal and vertical planning available.

SPECIFICATIONS	QB-5	QB-8
COMPONENTS	LF 1 x 5" transducer (32 mm voice coil) HF 1 x 1" tweeter (13 mm voice coil)	LF 1 x 8" transducer (38 mm voice coil) HF 1 x 1" tweeter (25 mm voice coil)
FREQUENCY RANGE	65 Hz - 20 KHz	50 Hz - 22 KHz
FREQUENCY RESPONSE	75 Hz - 18 KHz	60 Hz - 20 KHz
SENSIVITY 1w @ 1m	88 dB	98 dB
MAX SPL 1w@ 1m	110 dB	119 dB
RATED POWER RMS	80 W	150 W
PROGRAM POWER	160 W	300 W
COVERAGE	90° V x 90° H	90° V x 90° H
NOMINAL IMPEDANCE	16 Ohms	8 Ohms
CONNECTORS	2 x Neutrik Speakon NL4MP	2 x Neutrik Speakon NL4MP
CONSTRUCTION	10 mm Premium Birch plywood	15 mm Premium Birch plywood
FINISH	High resistant water-based black paint Black steel grill with internal foam protector	High resistant water-based black paint Black steel grill with acoustical fabric protection
FITTINGS	2 x Rear M6 for WB-01	4 x Rear M5 for WB-02 2 x Top M6 for eyebolt and horizontal bracket HBR-8 2 x Bottom M6 for eyebolt and horizontal bracket HBR-8 1 x Rear M6 for eyebolt 2 x Left & Right M6 for vertical bracket VBR-8 2 x Left & Right M6 for eyebolt 1 x Botton Top Hat
DIMENSIONS (H x W x D)	254 x 172,2 x 186,5 mm	450 x 277,1 x 275,5 mm.
WEIGHT	3 Kg	8,5 Kg

SPECIFICATIONS	QB-10	QB-12
COMPONENTS	LF 1 x 10" transducer (50 mm voice coil) HF 1 x 1" driver (44 mm voice coil)	LF 1 x 12" transducer (75 mm voice coil) HF 1 x 1" driver (44,4 mm voice coil)
FREQUENCY RANGE	60 Hz - 22 KHz	50 Hz - 20 KHz
FREQUENCY RESPONSE	70 Hz - 22 KHz	55 Hz - 18 KHz
SENSIVITY 1w @ 1m	102 dB	103 dB
MAX SPL 1w@ 1m	122 dB	129 dB
RATED POWER RMS	250 W	400 W
PROGRAM POWER	500 W	800 W
COVERAGE	80° V x 60° H	90° x 40° rotatable
NOMINAL IMPEDANCE	8 Ohms	8 Ohms
CONNECTORS	2 x Neutrik Speakon NL4MP	2 x Neutrik Speakon NL4MP
CONSTRUCTION	15 mm Premium Birch plywood	15 mm Premium Birch plywood
FINISH	High resistant water-based black paint Black steel grill with internal foam protector	High resistant water-based black paint Black steel grill with acoustic fabric protection
FITTINGS	4 x Rear M5 for WB-02 2 x Top M6 for eyebolt and horizontal bracket HBR-10 2 x Bottom M6 for eyebolt and horizontal bracket HBR-10 1 x Rear M6 for eyebolt 2 x Left & Right M6 for vertical bracket VBR-10 2 x Left & Right M6 for eyebolt 1 x Bottom Top Hat	4 x Rear M5 for WB-02 2 x Top M6 for eyebolt and horizontal bracket HBR-12 2 x Bottom M6 for eyebolt and horizontal bracket HBR-12 1 x Rear M6 for eyebolt 2 x Left & Right M6 for vertical bracket VBR-12 2 x Left & Right M6 for eyebolt 1 x Bottom Top Hat
DIMENSIONS (H x W x D)	473 x 336,1 x 293,4 mm.	596 x 377,4 x 375,3 mm.
WEIGHT	13,5 Kg	17.5 Kg



SPECIFICATIONS	QB-15	QB-D6
COMPONENTS	LF 1 x 15" transducer (75 mm voice coil) HF 1 x 1" driver (44,4 mm voice coil)	LF 2 x 6" transducers (51,7 mm voice coil) HF 1 x 1" driver (44,4 mm voice coil)
FREQUENCY RANGE	48 Hz - 20 KHz	70 Hz - 20 KHz
FREQUENCY RESPONSE	58 Hz - 18 KHz	78 Hz - 18 KHz
SENSIVITY 1w @ 1m	105 dB	95 dB
MAX SPL 1w@ 1m	132 dB	121 dB
RATED POWER RMS	500 W	400 W
PROGRAM POWER	1000 W	800 W
COVERAGE	90° x 40° rotatable	80° H x 60° V
NOMINAL IMPEDANCE	8 Ohms	8 Ohms
CONNECTORS	2 x Neutrik Speakon NL4MP	2 x Neutrik Speakon NL4MP
CONSTRUCTION	15 mm Premium Birch plywood	15 mm Premium Birch plywood
FINISH	High resistant water-based black paint Black steel grill with acoustical fabric protection	High resistant water-based black paint Black steel grill with acoustical fabric protection
FITTINGS	4 x Rear M5 for WB-02 2 x Top M6 for eyebolt and horizontal bracket HBR-15 2 x Bottom M6 for eyebolt and horizontal bracket HBR-15 1 x Rear M6 for eyebolt 2 x Left & Right M6 for vertical bracket VBR-15 2 x Left & Right M6 for eyebolt 1 x Bottom Top Hat	4 x Rear M5 for WB-02 2 x Top M6 for eyebolt and horizontal bracket HBR-D6 2 x Bottom M6 for eyebolt and horizontal bracket HBR-D6 1 x Rear M6 for eyebolt 2 x Left M6 for vertical bracket VBR-D6 2 x Right M6 for vertical bracket VBR-D6 1 x Bottom Top Hat
DIMENSIONS (H x W x D)	663 x 438,2 x 375,3 mm.	570 x 222,6 x 251,7 mm.
WEIGHT	25 Kg	15 Kg

SPECIFICATIONS	QB-D8	QB-D15
COMPONENTS	LF 2 x 8" transducer (51,7 mm voice coil) HF 1 x 1" driver (44,4 mm voice coil)	LF 2 x 15" transducers (75 mm voice coil) HF 1 x 1" driver (44,4 mm voice coil)
FREQUENCY RANGE	50 Hz - 20 KHz	45 Hz - 20 KHz
FREQUENCY RESPONSE	60 Hz - 18 KHz	55 Hz - 18 KHz
SENSIVITY 1w @ 1m	100 dB	109 dB
MAX SPL 1w@ 1m	127 dB	139 dB
RATED POWER RMS	500 W	1000 W
PROGRAM POWER	1000 W	2000 W
COVERAGE	80° x 60° Rotatable	80° H x 50° V
NOMINAL IMPEDANCE	4 Ohms	4 Ohms
CONNECTORS	2 x Neutrik Speakon NL4MP	2 x Neutrik Speakon NL4MP
CONSTRUCTION	15 mm Premium Birch plywood	15 mm Premium Birch plywood
FINISH	High resistant water-based black paint Black steel grill with acoustical fabric protection	High resistant water-based black paint Black steel grill with acoustical fabric protection
FITTINGS	4 x Rear M5 for WB-02 2 x Top M6 for eyebolt and horizontal bracket HBR-D8 2 x Bottom M6 for eyebolt and horizontal bracket HBR-D8 1 x Rear M6 for eyebolt 2 x Left & Right M6 for vertical bracket VBR-D8 2 x Left & Right M6 for eyebolt 1 x Bottom Top Hat	2 x Top M6 for eyebolt 1 x Rear M6 for eyebolt 1 x Top Handle 2 x Left & Right Handles 2 x wheels for transport
DIMENSIONS (H x W x D)	666 x 277.1 x 275.5 mm.	1187 x 476,2 x 451,9 mm.
WEIGHT	17Kg	41Kg

SPECIFICATIONS	QB-M12	DR-N12
COMPONENTS	LF 1 x 12" transducer (75 mm voice coil) HF 1 x 1" exit throat (44,4 mm voice coil)	LF 1 x 12" transducer 100 mm voice coil
FREQUENCY RANGE	50 Hz - 20 KHz	34 Hz - 400 Hz
FREQUENCY RESPONSE	65 Hz - 18 KHz	38 Hz - 220 Hz
SENSIVITY 1w @ 1m	104 dB	97 dB
MAX SPL 1w@ 1m	130 dB	129 dB
RATED POWER RMS	500 W	1000 W
PROGRAM POWER	1000 W	2000 W
COVERAGE	60° x 40° Rotatable horn	360° single unit
NOMINAL IMPEDANCE	8 Ohms	8 Ohms
CONNECTORS	2 x Neutrik Speakon NL4MP	2 x Neutrik Speakon NL4MP
CONSTRUCTION	15 mm Premium Birch plywood	18 mm Premium Birch plywood
FINISH	High resistant water-based black paint Black steel grill with acoustical fabric protection	High resistant water-based black paint Black steel grill with internal foam protector
FITTINGS	3 x Top M6 for eyebolt and horizontal bracket HBR-M12 2 x Bottom M6 for eyebolt and horizontal bracket HBR-M12 1 x Bottom Top Hat 4 x rubber feet	8 x rubber feet 2 x top hat 2 x integrated handle
DIMENSIONS (H x W x D)	650 x 383 x 314,5 mm.	415 x 590 x 370 mm
WEIGHT	17 Kg	28 Kg

SPECIFICATIONS	SUB-08	DBP-N15
COMPONENTS	LF 1 x 8" transducer 2 x 50 mm voice coil	LF 15" transducer 100 mm voice coil
FREQUENCY RANGE	43 Hz - 160 Hz	34 Hz - 250 Hz
FREQUENCY RESPONSE	47 Hz - 154 Hz	38 Hz - 200 Hz
SENSIVITY 1w @ 1m	93 dB	101 dB
MAX SPL 1w@ 1m	117 dB	131 dB 1w@ 1m
RATED POWER RMS	2 x 100 W	750 W
PROGRAM POWER	2 x 200 W	1500 W
COVERAGE	360° single unit	360° single unit
NOMINAL IMPEDANCE	2 x 8 Ohms	8 Ohms
CONNECTORS	2 x Neutrik Speakon NL4MP	2 x Neutrik Speakon NL4MP
CONSTRUCTION	15 mm Premium Birch plywood	18 mm Premium Birch plywood
FINISH	High resistant water-based black paint Black	High resistant water-based black paint Black steel grill with internal foam protector
FITTINGS	4 x rubber feet	4 x rubber feet 2 x integrated handles
DIMENSIONS (H x W x D)	268 x 641 x 304 mm	580 x 506 x 620 mm
WEIGHT	9 Kg	43,5 Kg

SPECIFICATIONS	SB-215	DR-N18
COMPONENTS	LF 2 x 15" transducer 100 mm voice coil	LF 1 x 18" transducer 100 mm voice coil
FREQUENCY RANGE	30 Hz - 160 Hz	30 Hz - 230 Hz
FREQUENCY RESPONSE	35 Hz - 150 Hz	35 Hz - 200 Hz
SENSIVITY 1w @ 1m	103 dB	105 dB
MAX SPL 1w@ 1m	138 dB	134 dB
RATED POWER RMS	2000 W	800 W
PROGRAM POWER	4000 W	1600 W
COVERAGE	360° single unit	360° single unit
NOMINAL IMPEDANCE	4 Ohms	8 Ohms
CONNECTORS	2 x Neutrik Speakon NL4MP	2 x Neutrik Speakon NL4MP
CONSTRUCTION	18 mm Premium Birch plywood	18 mm Premium Birch plywood
FINISH	High resistant water-based black paint Black	High resistant water-based black paint Black steel grill with acoustical fabric protection
FITTINGS	1 x Top hat 4 x rubber feet 2 x integrated handles	4 x rubber feet 1 x Top hat 2 x integrated handles
DIMENSIONS (H x W x D)	644 x 463 x 600 mm	733 x 570 x 630 mm
WEIGHT	59 Kg	50 Kg

**SPECIFICATIONS DR-N218**

COMPONENTS	LF 2 x 18" transducers 100 mm voice coil
FREQUENCY RANGE	33 Hz - 340 Hz
FREQUENCY RESPONSE	39 Hz - 220 Hz
SENSIVITY 1w @ 1m	111 dB
MAX SPL 1w@ 1m	140 dB
RATED POWER RMS	1600 W
PROGRAM POWER	3200 W
COVERAGE	360° single unit
NOMINAL IMPEDANCE	4 Ohms
CONNECTORS	2 x Neutrik Speakon NL4MP

CONSTRUCTION	18 mm Premium Birch plywood
FINISH	High resistant water-based black paint Black steel grill with internal foam protector
FITTINGS	4 x rubber feet 4 x integrated handles

DIMENSIONS (H x W x D)	677 x 1122 x 630 mm
WEIGHT	82 Kg

## 2. CABINET CONECTIONS

### 2.1 Normative

QB Series cabinets meet the following standards:

EN 55103-1:1996: Electromagnetic compatibility. Product family standard for audio, video, audio-visual and entertainment lighting control apparatus for professional use (-1 Emmision).

EN 55103-1:1996: Electromagnetic compatibility. Product family standard for audio, video, audio-visual and entertainment lighting control apparatus for professional use. (-2 Immunity)

EN 60065:2002: Audio, video and similar electronic apparatus. Safety requirements.

### 2.2 Cable connection

In the following table you can see the maximum power of the cabinets and their nominal impedance.

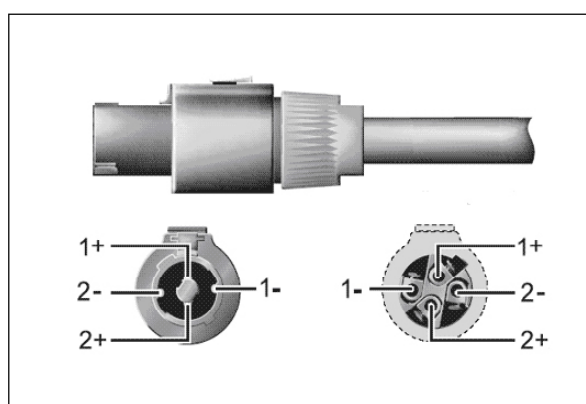
Model	Connector type	Speakon connections	Per box	Nominal impedance	Rated Power	Program Power
QB-5	Neutrik® NL4-MP	±1	x2	16 Ω	80W	160W
QB-8	Neutrik® NL4-MP	±1	x2	8 Ω	150W	300W
QB-10	Neutrik® NL4-MP	±1	x2	8 Ω	250W	500W
QB-12	Neutrik® NL4-MP	±1	x2	8 Ω	400W	800W
QB-15	Neutrik® NL4-MP	±1	x2	8 Ω	500W	1000W
QBD-6	Neutrik® NL4-MP	±1	x2	8 Ω	400W	800W
QBD-8	Neutrik® NL4-MP	±1	x2	4 Ω	500W	1000W
QBD-15	Neutrik® NL4-MP	±1	x2	4 Ω	1000W	2000W
QB-12M	Neutrik® NL4-MP	±1	x2	8 Ω	500W	1000W
<b>SUBS</b>						
Sub08	Neutrik® NL4-MP	±1/±2	x1	8 Ω / 8 Ω		
DR-N12	Neutrik® NL4-MP	±1	x2	8 Ω	1000W	2000W
SB-215	Neutrik® NL4-MP	±1/±2	x2	8 Ω / 8 Ω	2000W	4000W
DBP-N15	Neutrik® NL4-MP	±1	x2	8 Ω	1000W	2000W
DR-N18	Neutrik® NL4-MP	±1	x2	8 Ω	800W	1600W
DR-N218	Neutrik® NL4-MP	±1/±2	x2	4 Ω	1600W	3200W

## 2.3 Connectors

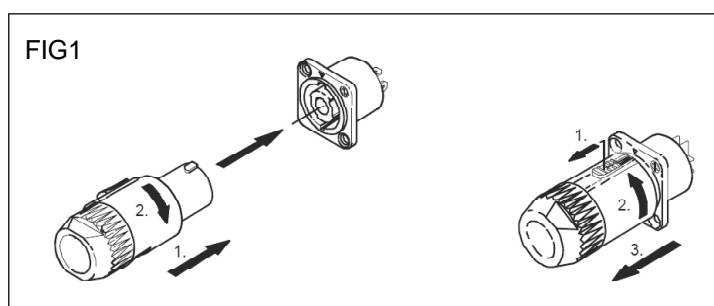
The QB Series has a connection panel at the rear of the cabinet. This consists of 2 internally bridged Nuetrik NL4-MP connectors which apply no process to the signal.

Note: If pins +-2 are not used they will still be internally bridged.

To power the cabinet use NL4 speakon connectors as shown in the following diagram. Consult the "Conection cable table" on previous page, under the column 'Speakon Connections' to see which pins are used for each cabinet.



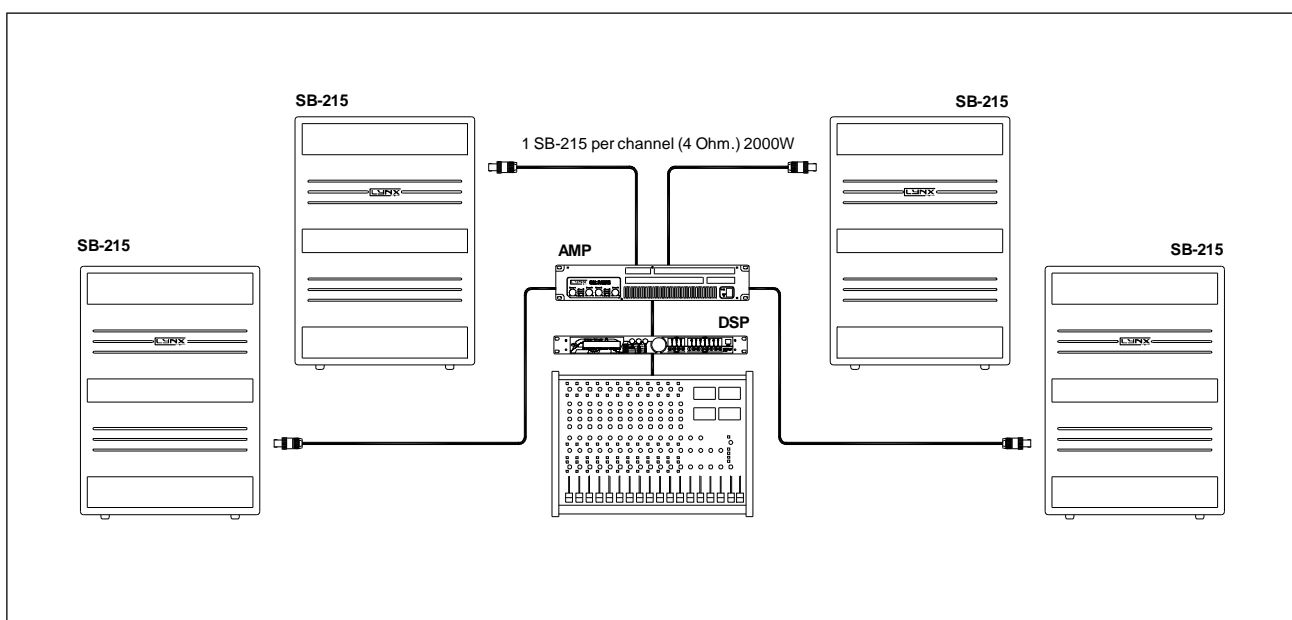
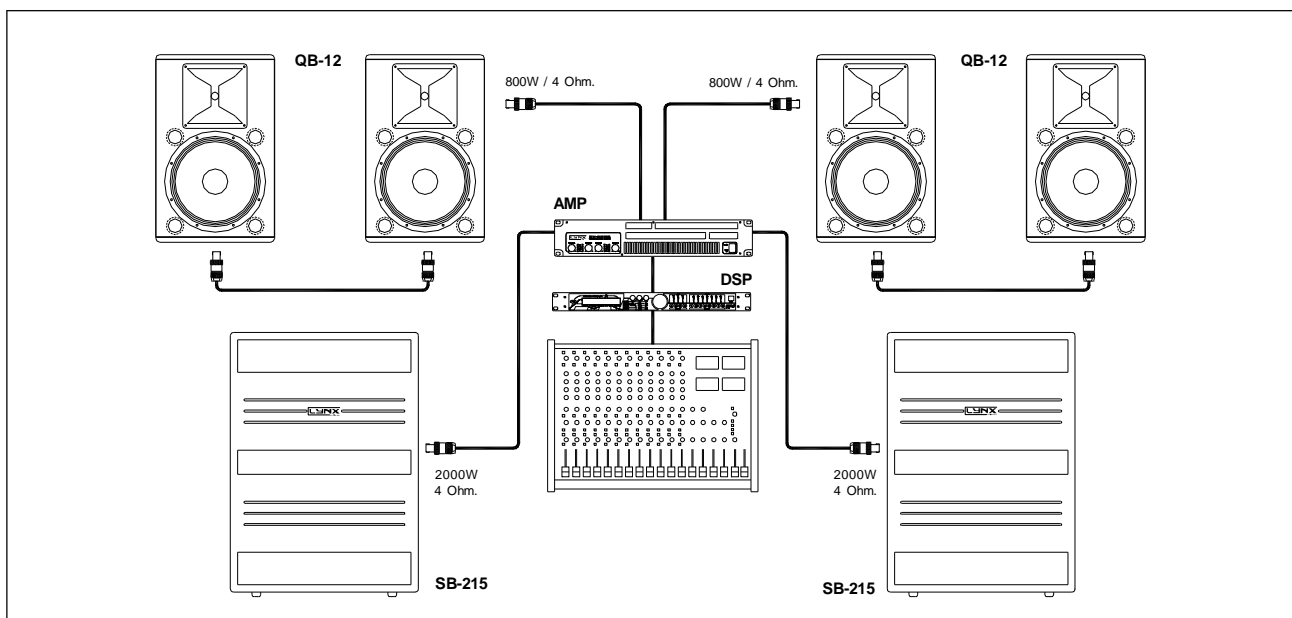
To connect the speakon follow the instructions in fig. 1



Insert the male speakon in its corresponding hole and turn right until it clicks. This fixes it safely and strongly and helps stop it being pulled out by mistake. At the other end of the cable connect in the same way to the amplifier channel.



There are various connection configurations such as stereo, sub or sub-bass reinforcement. Some of these configurations can be seen below. Pay attention to the frequency response data of each cabinet to achieve the desired response whilst compensating for the 'natural' drops between different systems.



## 2.4 Recommendations:

Always ensure cables are in good condition. Know the recommended cable length and thickness according to the cabinet and quantity you are installing. An incorrect connection can affect the functioning of the system or even damage it. Cable thickness will vary according to cabinet impedance, quantity and distance. This is especially important when connecting Sub-bass cabinets.

As a guide, please see the following table which outlines the thickness depending on the power and length of cable.

Maximum recommended cable length for low impedance systems.						
Wire section	AWG number	Cable resistance in 100 meters	Maximum recommended length (in meters)			
			2 Ω	4 Ω	8 Ω	16 Ω
13.3 mm <sup>2</sup>	6	0.25 ohm	24	57	122	253
6.63 mm <sup>2</sup>	8	0.49 ohm	12	28	61	126
5.26 mm <sup>2</sup>	10	0.62 ohm	10	23	48	100
3.31 mm <sup>2</sup>	12	0.99 ohm	6	14	30	63
2.08 mm <sup>2</sup>	14	1.57 ohm	4	9	19	40
1.31 mm <sup>2</sup>	16	2.49 ohm	2	6	12	25
0.82 mm <sup>2</sup>	18	3.98 ohm	2	4	8	16
0.52 mm <sup>2</sup>	20	6.28 ohm	1	2	5	10
0.33 mm <sup>2</sup>	22	9.89 ohm	1	1	3	6

Bear in mind Ohm ratings on the amplifiers used to power the cabinets. For example 2 ohm amplifier configurations are not recommended due to the excessive power from the amp output.

Never connect more cabinets than recommended in parallel. With parallel connections, the total impedance can be calculated by dividing the impedance of 1 cabinet by the number connected. E.g: 2 QB-8 cabinets in parallel have an impedance of 4Ohm (8Ohm impedance - for 1 cabinet - divided by 2 – numbers of cabinets connected).

### 3. CABINET INSTALLATION

#### 3.1 Mounting advices

The QB Series is primarily designed to be used in fixed installations such as pubs, bars, restaurants, conference halls, hotels etc. A large selection of accessories are available to help ease the installation and achieve the necessary angulation to direct the sound towards the required listening zones. Many cabinets also enable the horn to be rotated offering further coverage options.

Never place the safety of personnel at risk. Please read the recommendations on hanging the cabinets on page 31.

#### 3.2 Rotatable Horn Coverage

The following QB Series cabinets have rotatable horns:

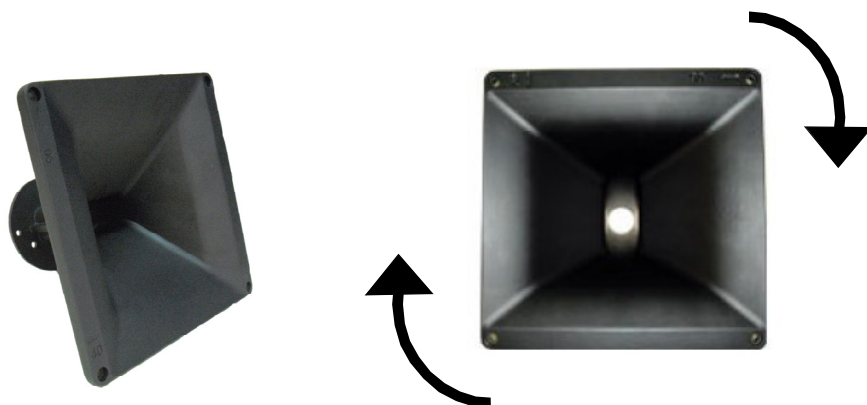
QB-12 (90° x 40°)

QB-15 (90° x 40°)

QB-D8 (80° x 60°)

QB-M12 (60° x 40°)

On the horn, the opening angles are indicated on each side.

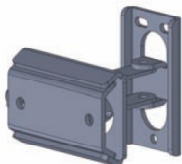


The rotatable horn feature enables the installer to also set the cabinet up horizontally whilst maintaining the horn features such as horizontal and vertical coverage. This is helpful in installs with low ceilings or where esthetically the cabinet looks better horizontally.

To be able to view and design system set-ups Lynx Pro Audio also offer Rainbow, the prediction software which can be downloaded free of charge from [www.lynxproaudio.com](http://www.lynxproaudio.com).

To turn the horn the user must first remove the cabinet grill, unscrew the horn, rotate it 90° and screw it back in. Please be sure to maintain the connection. Put the grill back on.

### 3.3 Accessories



#### WB-01

Wall bracket for the QB-5. Also available in white - WB-01W



#### WB-02

Wall bracket for the QB-8, QB-10, QB-12, QB-15, QB-D6, QB-D8. Also available in white. Ref.:WB-02W



#### WB-03

Wall bracket for top hat insertion for the QB-8, QB-10, QB-12, QB-15, QB-D6 and QB-D8.



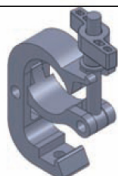
#### VBR-8 / VBR-10 / VBR-12 / VBR-15 / VBR-D6 / VBR-D8

Vertical flying/mounting bracket for QB-8, QB-10, QB-12, QB-15, QB-D6, QB-D8. Every QB cabinet has its own bracket.



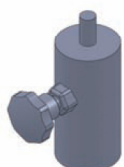
#### HBR-8 / HBR-10 / HBR-12 / HBR-15 / HBR-D6 / HBR-D8

Horizontal flying/mounting bracket for QB-8, QB-10, QB-12, QB-15, QB-D6, QB-D8, QB-M12. Every QB cabinet has its own bracket.



#### TV-50

Clamp for connection with horizontal/vertical bracket to fly QB Series full range from 50mm truss/tube.



#### TV-35

35mm adaptor for stand mounting with horizontal/vertical bracket.

#### VSM-V1

35mm speaker mounting top hat for QB-8, QB-10, QB-12, QB-15, QB-D6, QB-D8 and all subwoofers



#### VSM-V2

M20 connector plate for all subwoofers



#### TU-C01

35mm connecting pole for satellite combination between QB-8, QB-10, QB-12, QB-15, QB-D6, QB-D8 and QB-M12. With spring-loaded locking screw and safety bolt



#### TU-C02

M20 pole support for combination between sub woofer and QB-8, QB-10, QB-12, QB-15, QB-D6, QB-D8 and QB-M12. With spring-loaded locking screw and safety bolt



#### SB-02

35mm lightweight aluminium stand for the QB-8, QB-10, QB-12, QB-15, QB-D6, QB-D8, QB-M12.



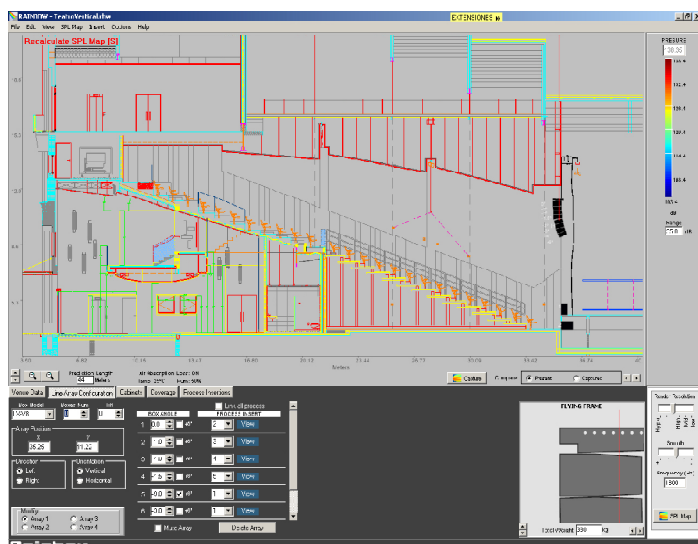
#### AGR-06

M6 eye bolt for all QB Series cabinets



## RAINBOW – ACOUSTICAL PREDICTION SOFTWARE

Thanks to the RAINBOW software, you will be able to “virtually” determine the acoustical response of one or various cabinets at the same time.



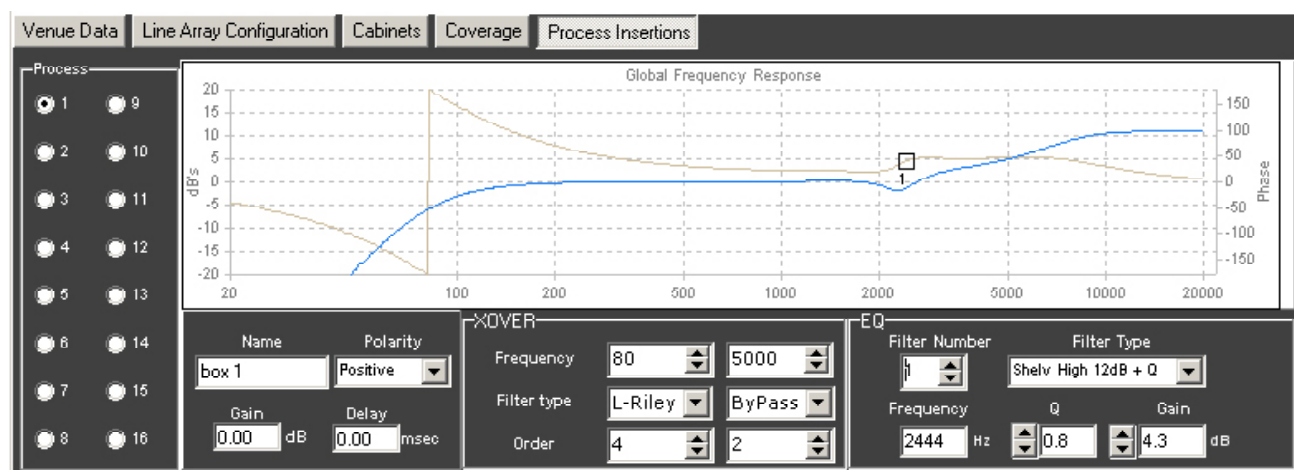
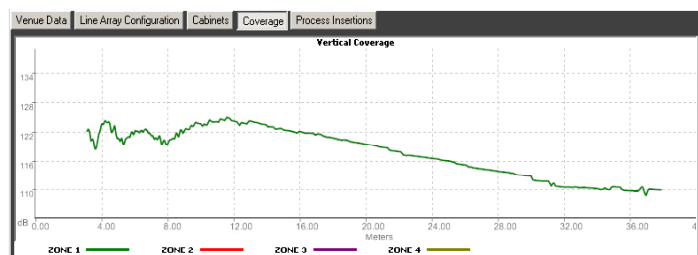
Based on polar response measurements, taken meticulously with a 360° coverage both vertically and horizontally, the Rainbow software is able to calculate the SPL response including the interaction between them taking into account the magnitude and phase response, in order to enable the user to correct cancellations and even to create them if the acoustical design so requires.

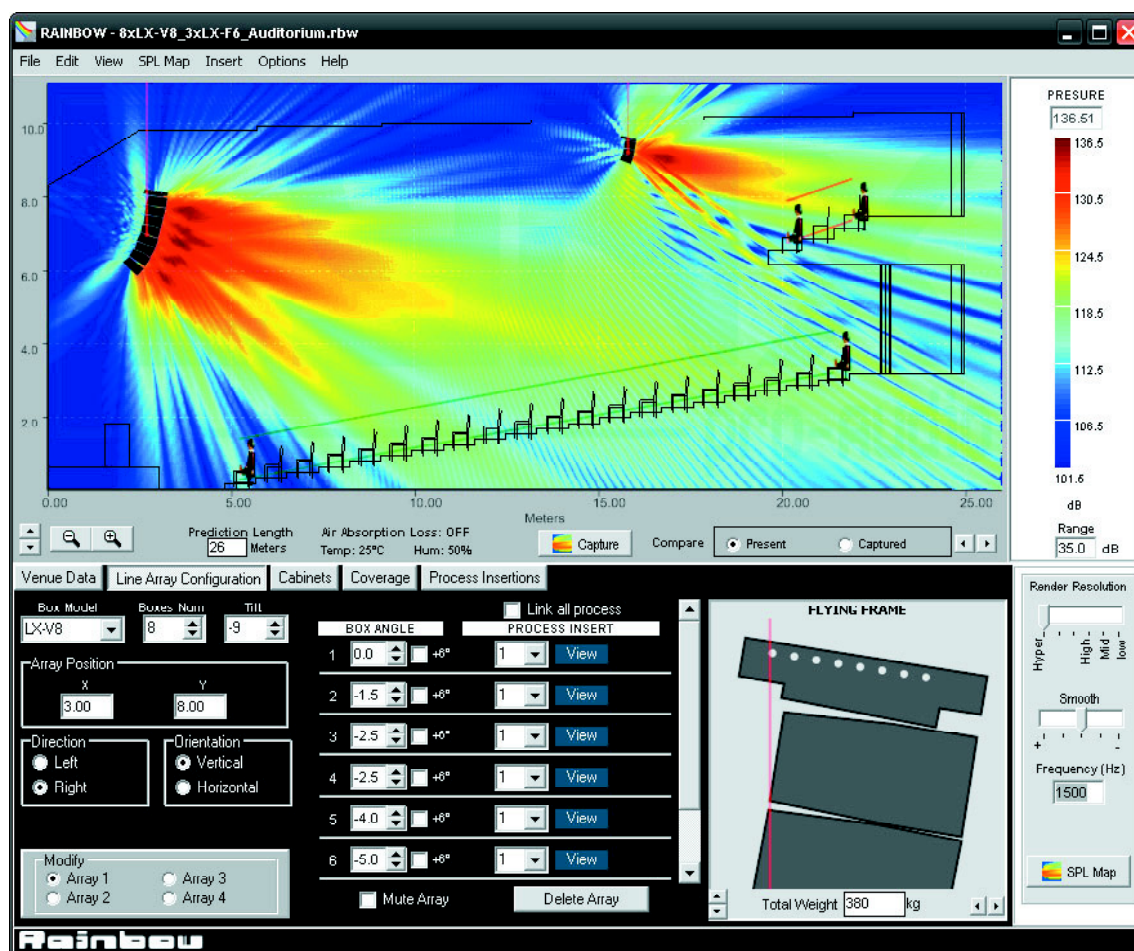
Rainbow is very easy to use and offers a very intuitive design, multitool interface and on-line updatable data base.

The Rainbow software has been designed by and for sound technicians. Its aim is to help installers and users of Lynx pro audio products.

This software is able to import WMF Vector Files with technical drawings and insert them directly into the prediction window and thus enabling real measurement predictions.

This also helps to determine dead zones and obtain the maximum performance from each of the cabinets installed.



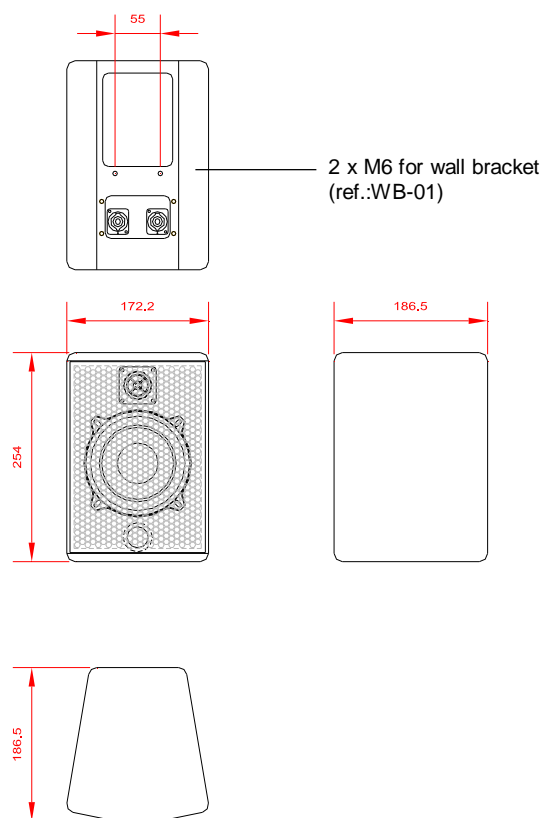


## Features

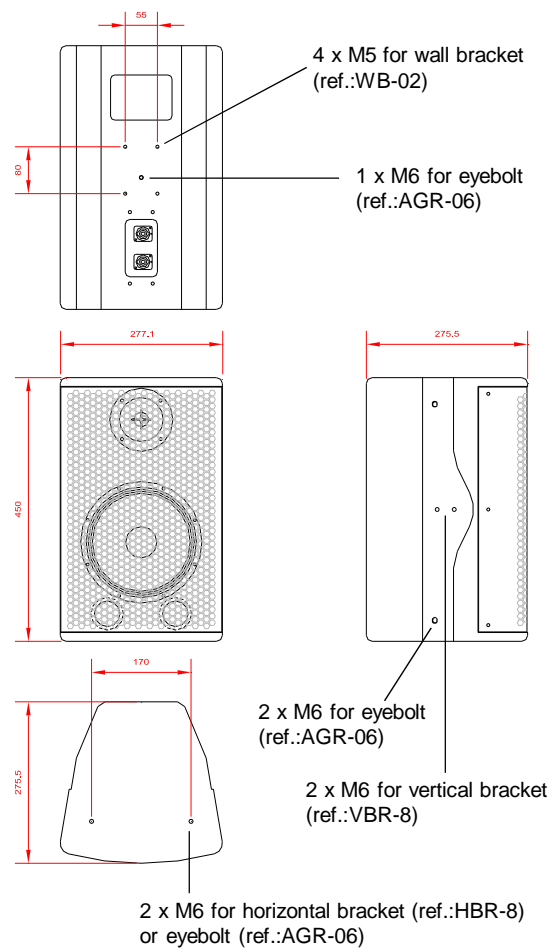
The RAINBOW acoustical prediction software allows among other things:

- Prediction up to 4 LINE ARRAYS of 24 cabinets each simultaneously, together with multiple points with cabinets
- Flying points information according to the inclination of the cabinets
- Weight calculation of the different systems
- Sub-bass simulation (for instance to achieve cardioid configurations)
- Orientation of cabinets (Horizontal/vertical)
- Throw Direction of cabinets (right/ left)
- Individual delay per cabinet/system
- Polarity selection for each cabinet
- Up to 40 process insertions with Equalization and CrossOver assignable per cabinet.
- Simulation of the Air absorption sound loss with the distance
- SPL Pressure information
- Distance measurement
- Import of CAD files
- Up to 4 audience or hearing zones
- Coverage curves on the hearing zones.
- Export of SPL Map and coverage curves on jpg or bmp format
- Print project report (SPL prediction, flying points, weights, cabinet inclination, polarities, process applied, EQ Curves...)

### QB-5 DIMENSIONS & FITTINGS

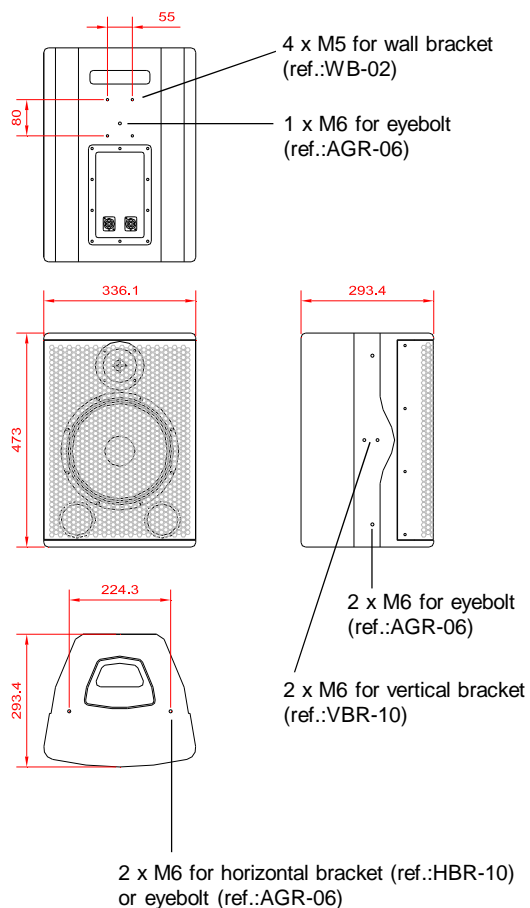


### QB-8 DIMENSIONS & FITTINGS

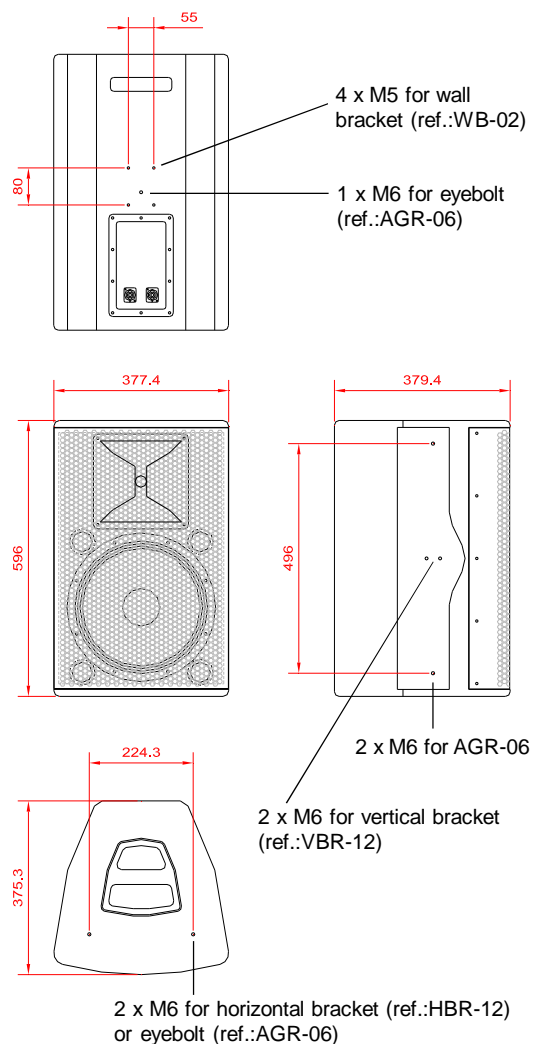




### QB-10 DIMENSIONS & FITTINGS

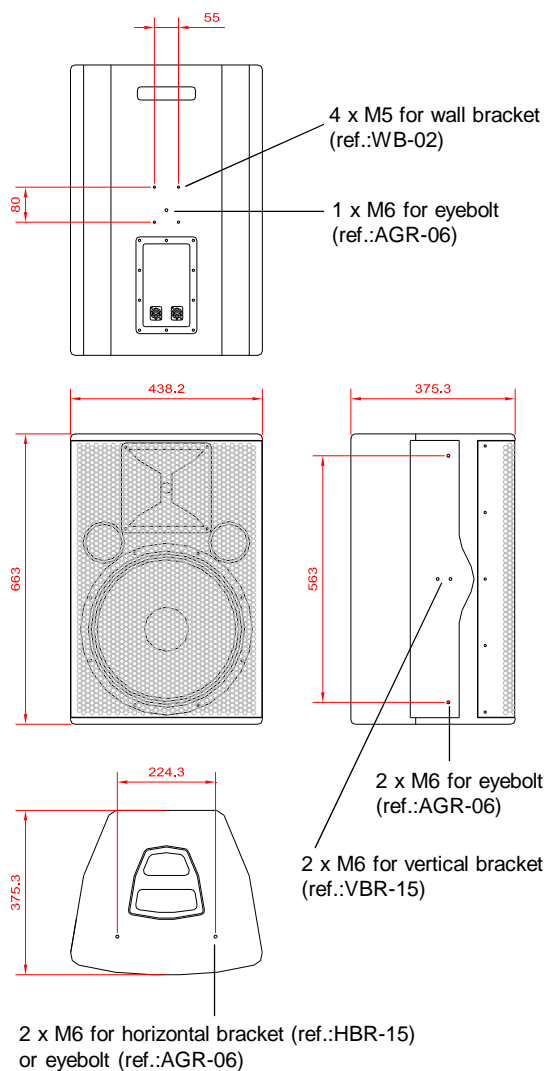


### QB-12 DIMENSIONS & FITTINGS

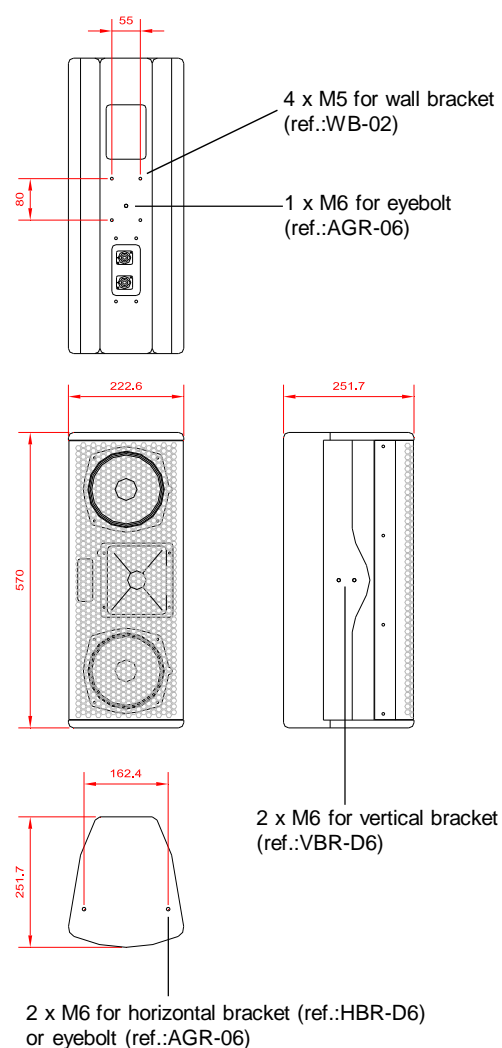




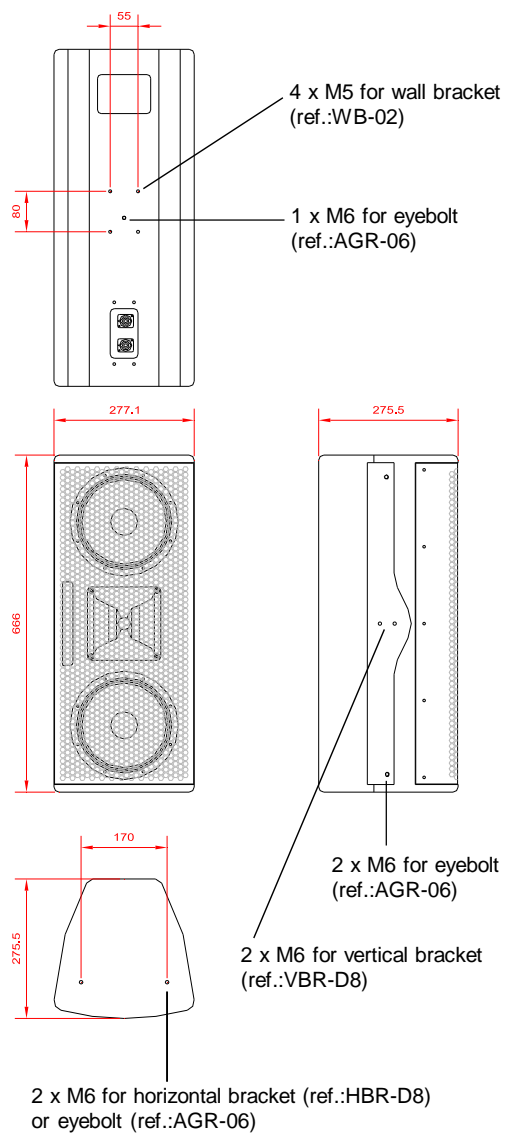
### QB-15 DIMENSIONS & FITTINGS



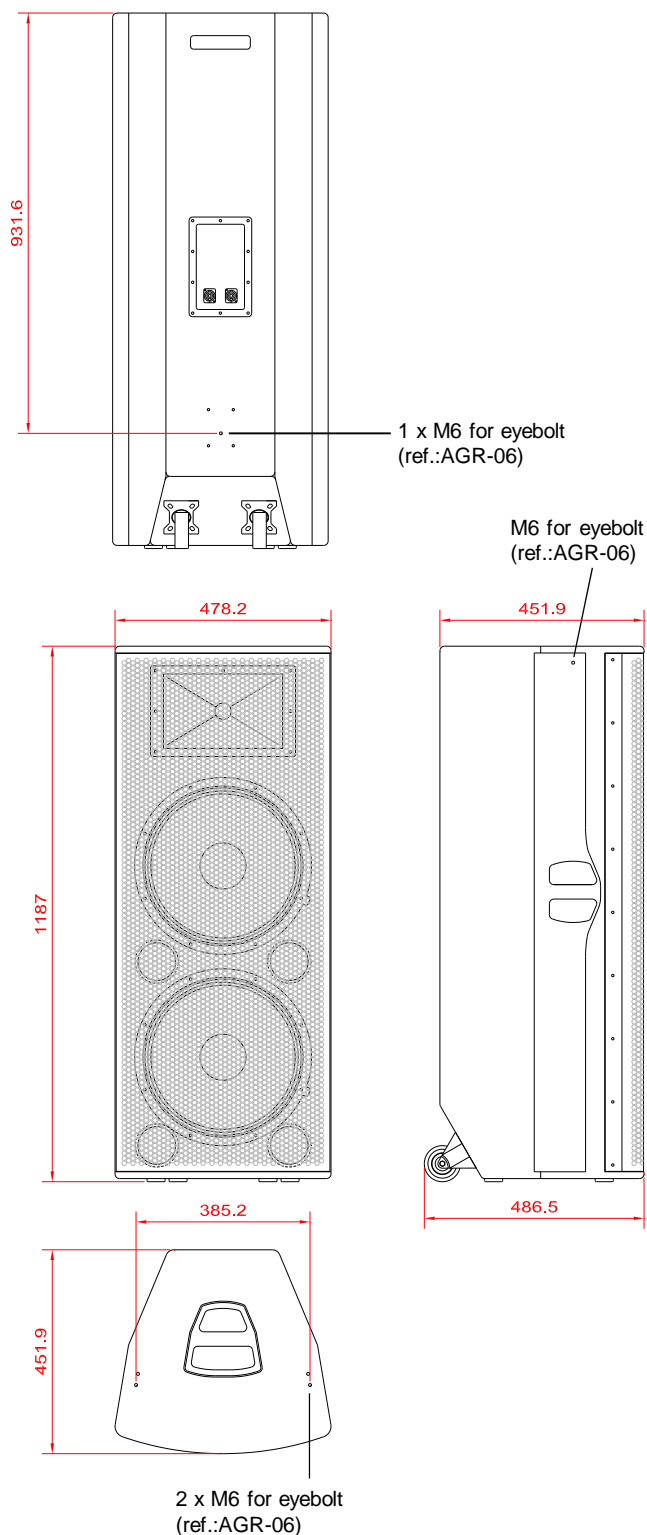
### QB-D6 DIMENSIONS & FITTINGS



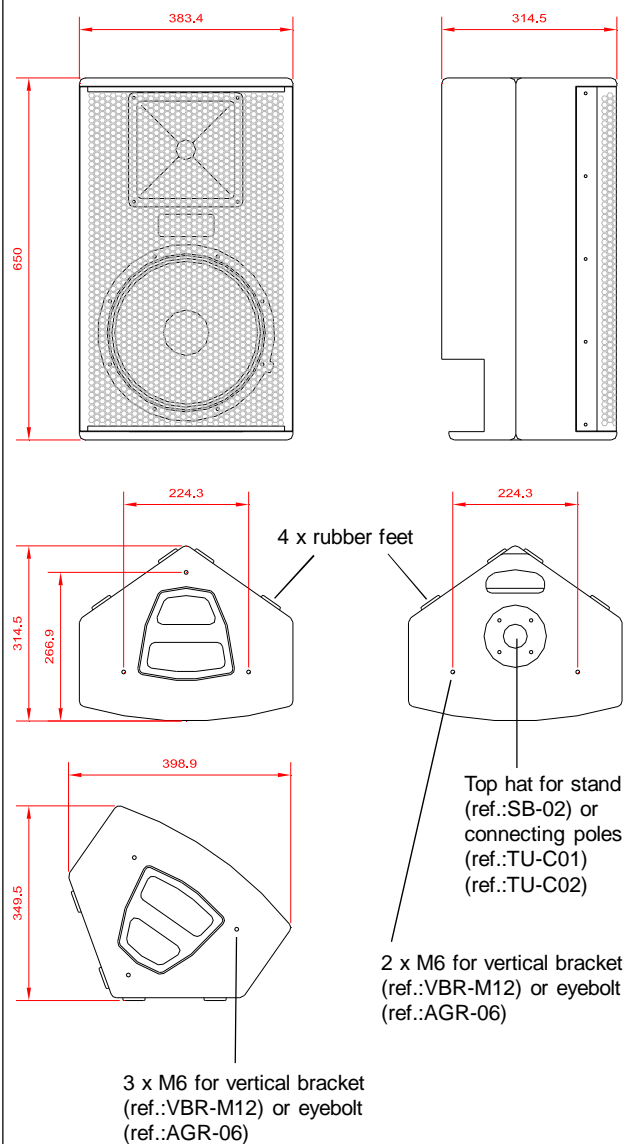
### QB-D8 DIMENSIONS & FITTINGS



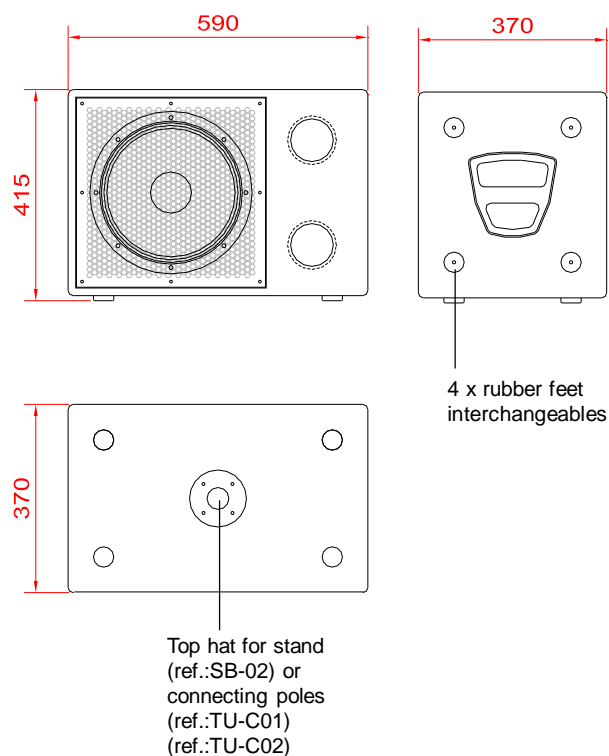
### QB-D15 DIMENSIONS & FITTINGS



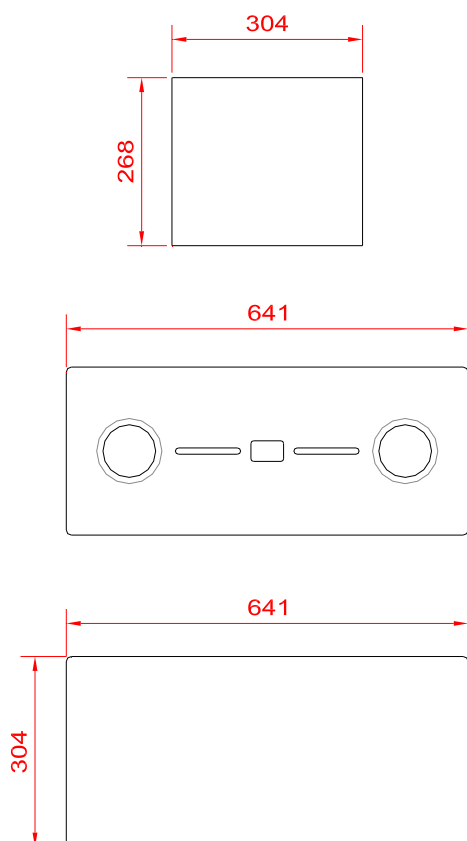
### QB-M12 DIMENSIONS & FITTINGS



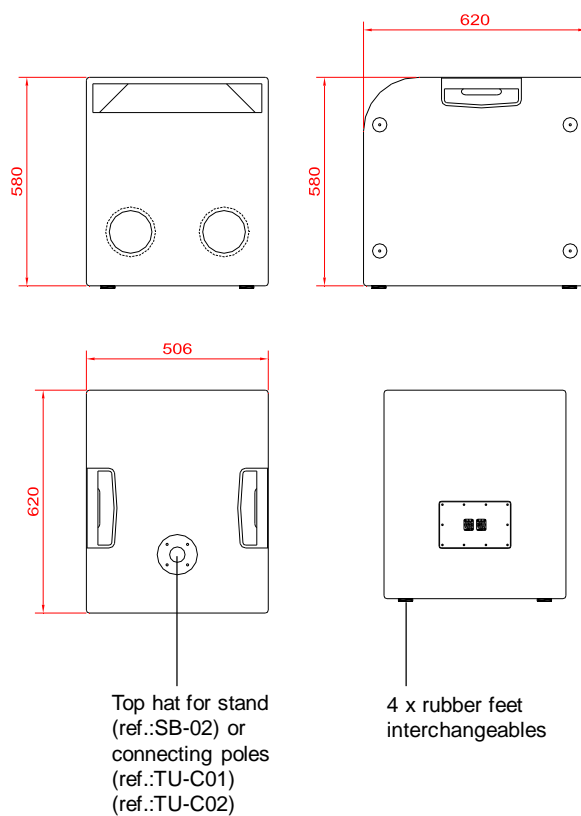
### DR-N12 DIMENSIONS & FITTINGS



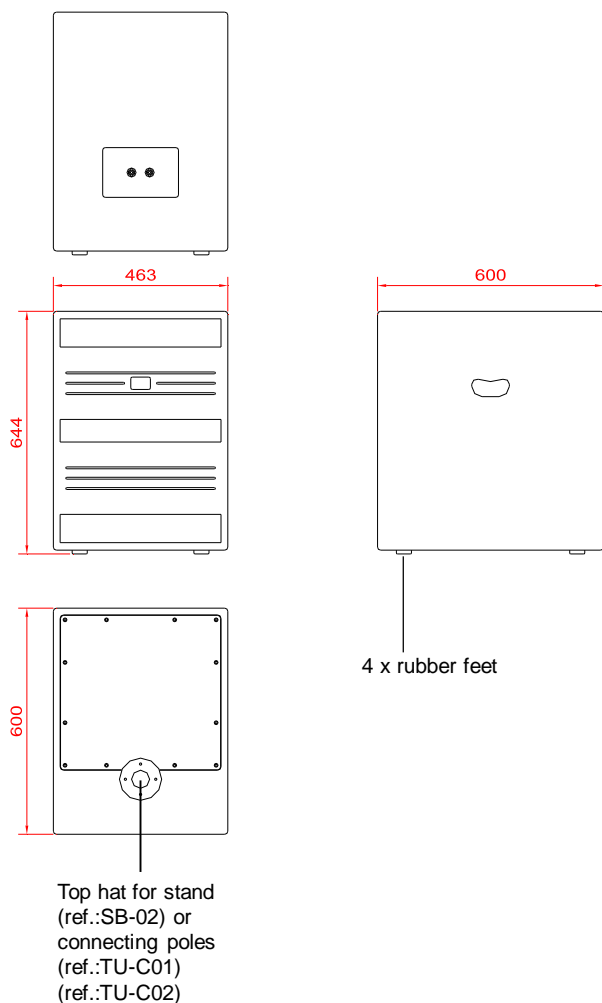
**DIMENSIONS SUB-08**



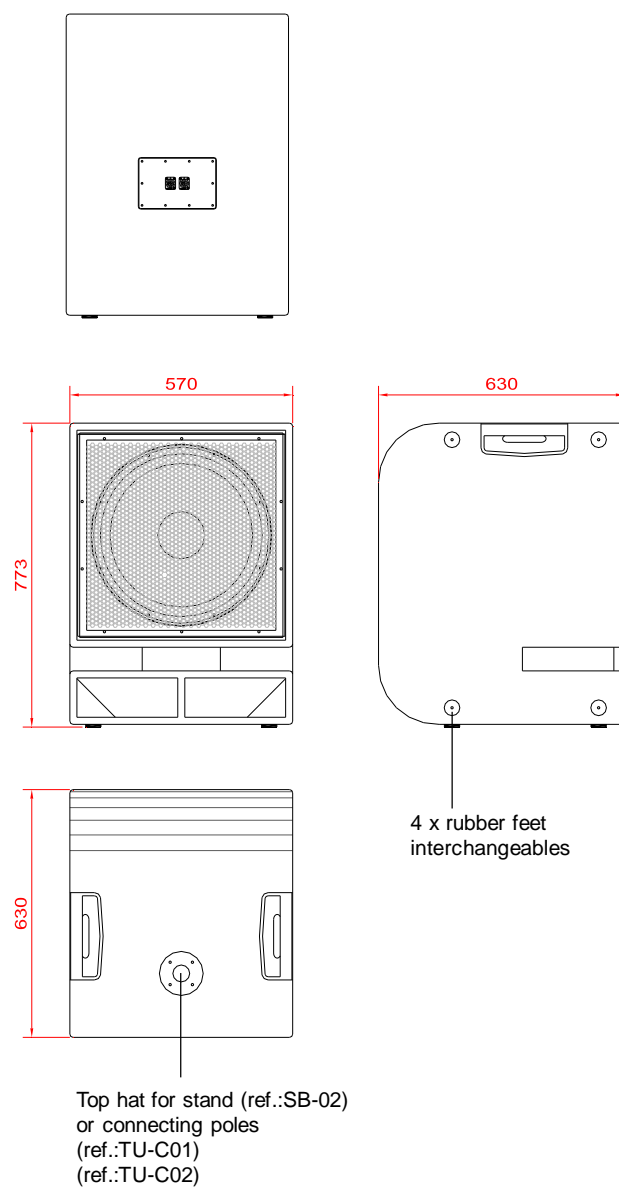
**DBP-N15 DIMENSIONS & FITTINGS**



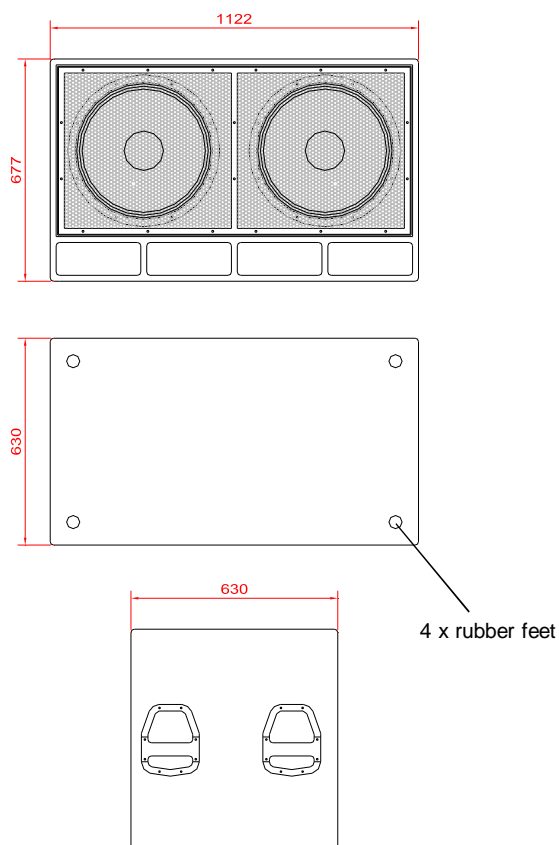
### SB-215 DIMENSIONS & FITTINGS



### DR-N18 DIMENSIONS & FITTINGS



**DIMENSIONS DR-N218**



### 3.4 Hanging the cabinets, advices

QB Series cabinets come with rigging points/studs so that they can be easily hung/installed. Be careful where the cabinets are suspended from. Do not hang from the handles. Cabinets must be installed and suspended by professional installers. All responsibility for security lies with the installation company.



Never place the safety of personnel at risk. Always check the condition of the accessories, slings etc are in good condition and the suspension point is secure and free of excess weight, vibration etc.

## 4. MAINTENANCE

### 4.1 Painture touching up

The Lynx QB series is using a high resistance water-based black paint that is more resistant and elastic than classic paint. It performs better in the difficult work conditions the professional enclosure faces but if you need to retouch the paint of a cabinet just contact your Lynx dealer. The paint is very easy to apply. Take note of the reference PN-003 and, if for whatever reason you want to repaint the enclosure, simply ask for paint PN-003. This paint is respectful to the environmental as it does not contain industrial solvents. Its natural solvent is water. Lynx pro audio uses solvent-free paint minimising the impact on the environment.

### 4.2 Guarantee

Lynx products are guaranteed against every kind of manufacturing fault 2 year after the date of sale. When products are under guarantee, the repairing and the free supplying of the device parts in order to correct any kind of defect are guaranteed by Lynx Pro Audio S.L. In the case that the product could not be returned to the factory for checking and repairing, Lynx Pro Audio would supply all the necessary parts.

Lynx Pro Audio S.L. is not responsible for any damage or defect caused during the transport or caused by an undue or improper handling y a non-authorized person during the life of this guarantee.

All our products undergo rigorous tests and quality controls. We guarantee the characteristics described here within and their quality against any fabrication defect.

The user loses all warranty rights if he incorporates or carries out any modification to the product, if he uses it outside of the stated safe working loads or does not secure the system properly using all the pins in their corresponding holes.

For any question regarding the product, the user must quote the model and serial number.



## DECLARATION OF CONFORMITY

**LYNX Pro Audio S.L.**  
**Calle 7 - Pol. Ind. Picassent**  
**E-46220 Picassent (Valencia)**

Lynx Pro Audio S.L. declares that QB series (all models) are in conformity with the following EC directives:

Low Voltage Directive	2006/95/EC
Electromagnetic Compatibility EMC	2004/108/EC
RoHS Directive	2002/95/EC

In accordance with Harmonized European Norms:

EN 60065:2002	Audio, video and similar electronic apparatus. Safety requirements
EN 55103-1:1996	Electromagnetic compatibility. Product family standard for audio, video, audiovisual and entertainment lighting control apparatus for professional use. Part 1: Emission.
EN 55103-2:1996	Electromagnetic compatibility. Product family standard for audio, video, audiovisual and entertainment lighting control apparatus for professional use. Part 2: Immunity.

WEEE Declaration: Electrical and electronic equipment must be disposed of separately from normal waste at the end of its operational lifetime. Please dispose of this product according to the respective national regulations or contractual agreements. If there are any further questions concerning the disposal of this product please contact Lynx Pro Audio S.L.



