

# LBB 451x/00 Integrus Radiators

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Invented for life



These radiators are used to distribute infrared signals throughout the conference venue, enabling delegates to listen to the proceedings by means of personal pocket receivers.

## Functions

- Universal mains power facility allows use worldwide
- No fan - cooled by convection - resulting in quieter operation and less moving parts to wear out
- LED indicators for radiator status checking
- Communication between radiator and transmitter for easy checking by the operator
- Automatically switches on when transmitter is switched on and vice versa
- Automatic cable equalization ensures maximum transmission efficiency with different quality of cables
- Automatic cable termination simplifies installation
- Temperature protection circuitry automatically switches radiator from full- to half- power if the temperature becomes too high
- Adjustable radiator angle ensures maximum coverage
- IREDs protected by a cover plate, making the units easy to maintain and clean
- Attractive and stylish design

- ▶ LBB 4511/00 covers up to 1300 m<sup>2</sup> (one carrier, 4 standard quality channels)
- ▶ LBB 4512/00 covers up to 2600 m<sup>2</sup> (one carrier, 4 standard quality channels)
- ▶ Automatic gain control ensures the IREDs (infrared emitting diodes) function with maximum efficiency
- ▶ Power output selection for efficiency and economy
- ▶ Safety eye

## Controls and Indicators

- Two yellow LEDs: one on each radiator panel to indicate that this panel is switched on and is receiving carrier waves from the transmitter
- Two red LEDs: one on each radiator panel to indicate that this panel is in standby mode
- Red and yellow LEDs simultaneously illuminated to indicate the radiator panel is malfunctioning
- Red LED flashing and yellow LEDs to indicate the radiator panel is in temperature protection mode
- Power reduction switch to reduce the output of the radiator to half-power
- Two delay compensation switches to compensate for differences in cable lengths between transmitter and radiators

## Interconnection

- Male Euro socket for mains connection
- HF input and output connectors (2 x BNC) for connection to transmitter and loop-through to other radiators

## Parts included

Quantity	Component
1	LBB 451x/00 Integrus Radiator
1	Mains cable

- 1 Bracket for mounting unit on ceiling
- 2 Plates for mounting unit on floor stand

### Technical specifications

#### Electrical

Mains voltage	100-240 Vac, 50-60 Hz
Power consumption	
LBB 4511, operating	100 W
LBB 4511, standby	8 W
LBB 4512, operating	180 W
LBB 4512, standby	10 W
Number of IREDS	
LBB 4511	260
LBB 4512	480
Total optical peak intensity	
LBB 4511	12 W/sr
LBB 4512	24 W/sr
Angle of half intensity	± 22°
HF input	nominal 1 Vpp, minimum 10 mVpp

#### Mechanical

Mounting	Suspension bracket for direct ceiling mounting Mounting plates for floor stands with M10 and 1/2 in Whitworth thread Optional wall mounting bracket (LBB 3414/00) available
Dimensions (H x W x D)	
LBB 4511 without bracket	200 x 500 x 175 mm (7.9 x 19.7 x 6.9 in)
LBB 4512 without bracket	300 x 500 x 175 mm (11.0 x 19.7 x 6.9 in)
Radiator angle	
floor-stand mounting	0, 15, and 30°
wall/ceiling mounting	0, 15, 30, 45, 60, 75 and 90°
Weight	
LBB 4511 without bracket	6.8 kg (15 lb)
LBB 4511 with bracket	7.6 kg (17 lb)
LBB 4512 without bracket	9.5 kg (21 lb)
LBB 4512 with bracket	10.3 kg (23 lb)
Color	bronze

### Ordering information

#### LBB 4511/00 Integrus Radiator

Integrus medium-power radiator to cover up to 1300 m<sup>2</sup> (13993 ft<sup>2</sup>).

Order number **LBB4511/00**

#### LBB 4512/00 Integrus Radiator

Integrus high-power radiator to cover up to 2600 m<sup>2</sup> (27986 ft<sup>2</sup>).

Order number **LBB4512/00**

#### LBB 4511/00-US Integrus Radiator (US)

Integrus medium-power radiator to cover up to 1300 m<sup>2</sup> (13993 ft<sup>2</sup>). US version.

Order number **LBB4511/00-US**

#### LBB 4512/00-US Integrus Radiator (US)

Integrus high-power radiator to cover up to 2600 m<sup>2</sup> (27986 ft<sup>2</sup>). US version.

Order number **LBB4512/00-US**

#### Accessories

##### LBB 3414/00 Wall Mounting Bracket

LBB 3414/00 Wall Mounting Bracket for radiators.

Order number **LBB3414/00**

##### INT-FCRAD Flight Case for Radiator

INT-FCRAD Flight Case for 1 radiator.

Order number **INT-FCRAD**

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