

LSP 500 PRO

Wireless Integrated PA System

FEATURES

- Complete wireless integrated PA system
- Wireless control for up to 20 LSP 500 PRO via iPad or Windows device
- Integrated Bluetooth audio streaming
- Integrated USB player/recorder
- Mixing function for:
 - up to 3 wireless microphones
 - USB player
 - Bluetooth audio input
 - 2 wired audio inputs
- Professional 2-way speaker
- Battery powered
- 3 slots to integrate ew G3 wireless microphone receivers



The **LSP 500 PRO** is a wireless two-way audio system for professional use. It has been designed to address audiences at indoor and outdoor events without the need of any power or audio cables. The LSP 500 PRO allows you to install up to three receivers for wireless microphones. You can also play music wirelessly via a Bluetooth connection. Alternatively, you can use the integrated media player to play music from your USB storage device. For larger events you can send the sum signal of one LSP 500 PRO via a wireless transmitter to other LSP 500 PRO devices. The LSP 500 PRO is remote controllable via iPad App or Windows Remote Control Software, which serves as a mixing console and permits the control of up to 20 LSP 500 PRO simultaneously.

ARCHITECT'S SPECIFICATION

The wireless integrated PA system shall be a portable professional sound system for meetings, conferences, events, etc. It shall be a 2-way system featuring an 8" woofer, a $\frac{3}{4}$ " compression driver and a passive crossover. Sound pressure level shall be 110 dB SPL (10 % THD, fullspace). Frequency response shall range from 65 – 18,000 Hz (-10 dB). Dispersion (H x V) shall be 80° x 60°. The PA system shall feature a Class D amplifier with 55 W continuous output power (120 W peak) and shall include a 3-band semi-parametric equalizer.

The PA system shall provide three $\frac{1}{2}$ 19" slots for accommodating rack-mount receivers of the Sennheiser ew G3 series. Slot 1 shall also be capable of accommodating an ew G3 rack-mount transmitter. Each slot shall have a cable with DC connector to supply the ew G3 devices with power. In addition, each slot shall provide audio connection cables with a $\frac{1}{4}$ " (6.3 mm) jack plug.

The PA system shall have a Bluetooth interface for wireless connection to audio sources (e.g. iPod, smartphone). A mic input for connecting wired audio sources shall be provided and shall utilize an XLR-3F/ $\frac{1}{4}$ " (6.3 mm) jack combo socket. The mic input shall provide switchable 48 V phantom power (switchable via operating menu). The PA system shall feature an RCA input for connecting wired audio sources and an RCA output for outputting audio to an external device (e.g. recording device). A USB 2.0 port shall be provided to allow recording of the audio sum signal on a connected USB storage device. The USB 2.0 port shall also be capable of playing audio files from storage media. Furthermore, the PA system shall have an XLR-3M output for outputting audio to an additional PA system or active subwoofer and an XLR-3F input for connection to the "Link" output of an additional PA system. The PA system shall be menu-driven and shall have a graphical OLED display.

With the Remote Control app for iPad or the Windows Remote Control Software for Windows devices, up to 20 PA systems shall be remote controllable via WLAN.

The PA system shall have the option of being mains operated (100 – 240 V AC at 50 – 60 Hz) or battery powered. Battery power shall be supplied by Sennheiser LBA 500 rechargeable Li-Ion battery packs. The PA system shall provide two battery compartments but only one battery pack shall be required for powering, allowing a discharged battery pack to be replaced during operation.

Architect's Specification continued

Battery voltage shall be 14.4 V, nominal charge shall be 4.4 Ah. Operating time shall be approximately 6 hours, charging time shall be approx. 5 hours.

The PA system shall have a rugged plywood housing with polyurethane coating. The bottom of the housing shall provide a 36 mm (1.42") pole mount with 13.5° tilt option (adjustable in 4.5° steps). Dimensions shall be 290 x 550 x 320 mm (11.42" x 21.65" x 12.60"). Weight (with battery packs, without ew G3 devices) shall be approximately 13.6 kg (30.0 lbs.). Operating temperature shall range from 0 °C to +50 °C (+32 °F to +122 °F). The wireless integrated PA system shall be the Sennheiser LSP 500 PRO.

Remote Control app for iPad and Windows Remote Control Software

The software shall be designed to convert an iPad with iOS 6.0 or later or a Windows device with Windows 7 or 8 desktop version into a mobile mixing console for the LSP 500 PRO. When the iPad or Windows device and the LSP 500 PRO are connected to an existing wireless network, the software shall allow the user to configure and control all functions and inputs of the LSP 500 PRO and to simultaneously remote control up to 20 LSP 500 PRO directly from the device. When an LSP 500 PRO is used in conjunction with Sennheiser ew 300/500 G3 receivers, the software shall provide information on the battery and mute status of the associated ew G3 transmitters. The software shall be the Sennheiser Remote Control app for iPad or Windows Remote Control Software for Windows devices.

LAP 500 protective cover

The rugged, heavy-duty and weatherproof cover shall be designed to protect the LSP 500 PRO from wear and tear and shall make it suitable for outdoor use. The cover shall be made from lightweight nylon and shall include an extra padding for additional protection during transport. The front of the cover shall be acoustically transparent; openings for easy access to the operating elements of the LSP 500 PRO shall be provided at the cover's back. The protective cover shall be the Sennheiser LAP 500.

LAS 500 slip cover

The slip cover for the LSP 500 PRO shall be made from white stretch fabric. It shall be acoustically transparent to allow the full sound spectrum of the LSP 500 PRO to pass through. The slip cover shall be the Sennheiser LAS 500.

LAB 500 trolley bag

The padded, heavy-duty trolley bag shall be designed for optimum protection and convenient transport of the LSP 500 PRO. A telescopic handle shall be provided for easy maneuvering and additional pockets on the outside of the bag shall allow for easy organization of accessories. The trolley bag shall be the Sennheiser LAB 500.

LAH 500 speaker clamp

The heavy-duty speaker clamp shall be designed for stationarily mounting the LSP 500 PRO. It shall have different holes to attach standard brackets and spigots (not included in the delivery). The speaker clamp shall be the Sennheiser LAH 500.

SPECIFICATIONS

Housing

Dimensions (W x H x D)	290 x 550 x 320 mm (11.42" x 21.65" x 12.60")
Housing material	crosswise glued plywood, polyurethane coating
Front Design	acoustic foam, black
Bottom plate	impact protection plastic shield with rubber feet
Handle	integrated plastic coated carry handle
Pole mount	36 mm (1.42"), angle adjustable up to +/-13.5° in steps of 4.5°
Weight (without wireless receivers, with battery packs)	approx. 13.6 kg (30 lb.)
Color	black

Acoustics

Acoustic design	2-way system, closed box design
Drivers	8"
· woofer	3/4" compression driver
· tweeter	
Sound pressure level	max. 110 dB SPL (fullspace)
Frequency response	65 Hz to 18 kHz (-10 dB)
Dispersion (h x v)	80° x 60° (-6 dB)

Sound processing

Amplifier	Class D
Output power	55 W continuous, 120 W peak
Equalizer	semi-parametric, 3-band

Connectivity

MIC input	XLR-3F/1/4" (6.3 mm) jack combo socket, switchable phantom power 48 V
AUX IN input	RCA stereo socket
LINE OUT output	RCA stereo socket
LINK IN input	XLR-3F
LINK OUT output	XLR-3M
USB port	USB 2.0

USB file formats

- playback mp3, wav, aac, flac
- recordings wav

Bluetooth interface

A2DP with aptX®

WLAN interface

IEEE 802.11b/g

Encryption

WPA2

Slot 1/2/3

for receiver

DC connector: hollow jack plug
(pin 1.7 mm, sleeve 5.5 mm)

output connector

1/4" (6.3 mm) plug,
data connector: RJ-45

Optional:

Slot 1

for transmitter

DC connector: hollow jack plug
(pin 1.7 mm, sleeve 5.5 mm)

input connector

1/4" (6.3 mm) plug

Power supplyMains voltage / mains
frequency

100 to 240 V~, 50/60 Hz

Battery packs

2x Sennheiser LBA 500, Li-Ion

Battery voltage / nominal
charge

14.4 V / 4.4 Ah

Operating time

approx. 6 h speech
(approx. 3 h per battery pack)

Charging time

approx. 5 h
(approx. 2.5 h per battery pack)**Temperature**

Operation

0 °C to 50 °C
(32 °F to 122 °F)

Storage

-20 °C to 70 °C
(-4 °F to 158 °F)**Relative air humidity**

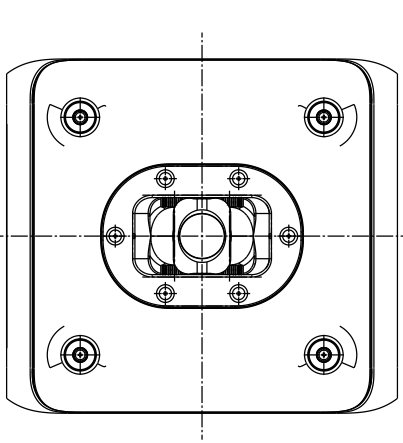
Operation

10 to 80 %

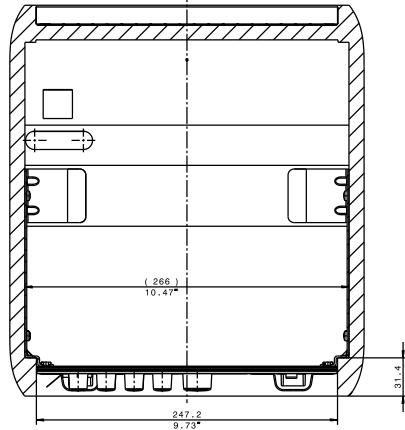
Storage

10 to 90 %

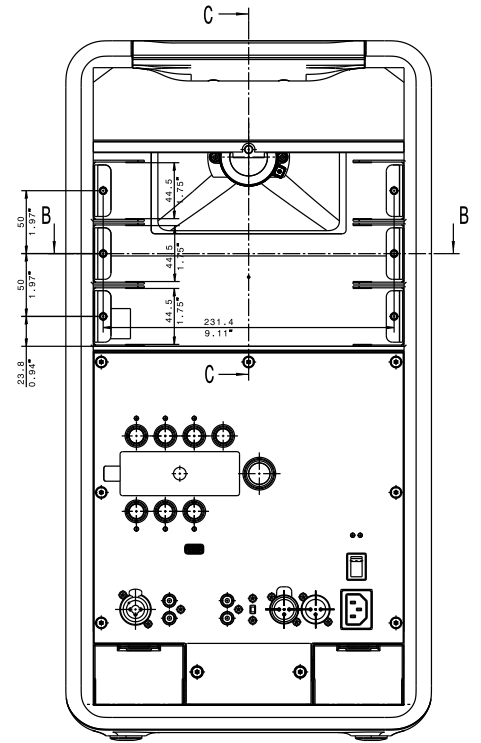
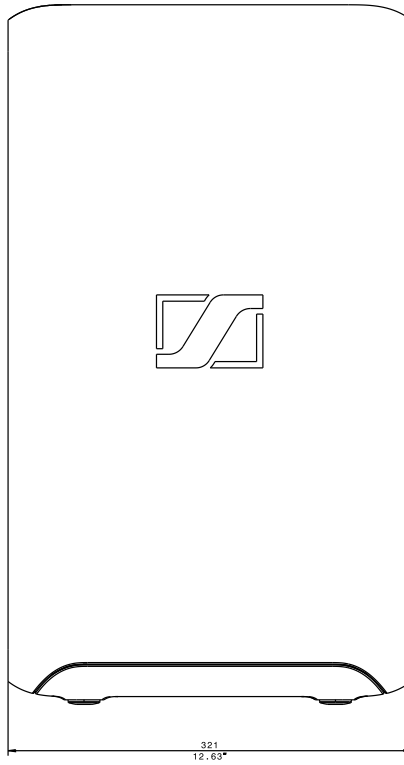
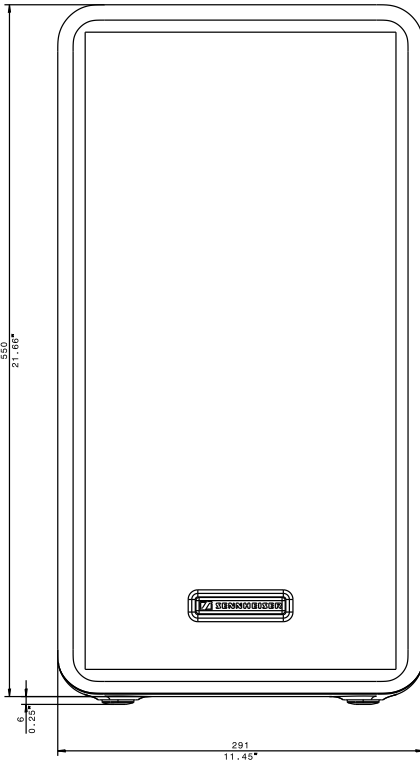
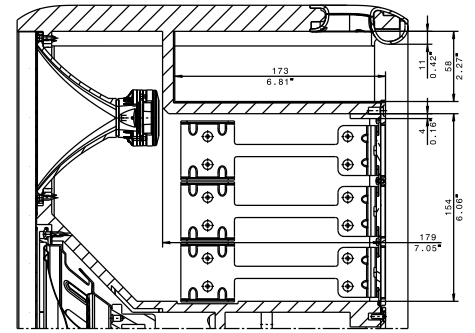
DIMENSIONS



Section view B-B
Scale: 1:2



Section view C-C
Scale: 1:2



ACCESSORIES

**Remote Control app for iPad**

Sennheiser's remote control app for the LSP 500 PRO professional wireless PA system turns the iPad into a mobile mixing console. You only need to connect the iPad and the Sennheiser LSP 500 PRO with an existing wireless network and you can start operating your LSP 500 PRO directly from the iPad. The app allows to configure all functions and inputs of the LSP 500 PRO. Using Sennheiser evolution wireless receivers for wireless microphones of ew 300/500 G3 series, the iPad app gives information about battery and mute status of the connected wireless microphone transmitters. The functionality of the iPad app includes the control and configuration of up to 20 LSP 500 PRO at the same time. That provides a completely wireless operation of a large sound setup at large events.

**Windows Remote Control Software**

The Windows Remote Control Software allows the control of up to 20 LSP 500 PROs wirelessly with Windows devices. The software is available via download from the Sennheiser web page and can be easily installed on Windows PCs, laptops and tablets running windows 7 or 8 desktop version (Windows RT is not supported).

The Windows Remote Control Software offers the same features and functionality as the iPad Remote Control App. The look and feel is more or less the same. This makes it easy for users who are working with both iPad and Windows devices.

**Protective cover**

The LSP 500 protective cover protects your LSP 500 PRO from wear and tear. The rugged, heavy-duty and weatherproof protective cover is made from lightweight nylon, which protects the LSP 500 PRO and also makes it suitable for outdoor use. An extra padding provides additional protection during transport. The front of the protective cover is acoustically transparent. For easy access to the operating elements of the LSP 500 PRO, the protective cover has openings at the back.

**Slip cover**

The lightweight slip cover is made from white stretch material and gives your LSP 500 PRO an unobtrusive look, so the audience can focus on the actual event and the attention is not drawn on the sound system. The acoustically transparent material of the cover allows the full sound spectrum of the LSP 500 PRO to pass through.

**Trolley bag**

The heavy-duty trolley bag has been designed for protection and convenient transport of the LSP 500 PRO. The padded and robust trolley bag with a telescopic handle keeps the LSP 500 PRO safe during transport and allows comfortable handling. The black trolley bag with the white embroidered Sennheiser logo has extra pockets on the outside for stowing further accessories.

ACCESSORIES



LAH 500

The LAH 500 is a speaker clamp for rigging an LSP 500 PRO. To attach the LSP 500 PRO to a truss use the LAH 500 in conjunction with a TV Pin/ TV spigot (not included in the delivery).



PRODUCT VARIANTS

LSP 500 PRO EU	Art. No. 505476
LSP 500 PRO US	Art. No. 505692
LSP 500 PRO UK	Art. No. 505693
LSP 500 PRO CN	Art. No. 505787

RECOMMENDED ACCESSORIES

LAP 500 protective cover - black	Art. No. 505478
LAS 500 slip cover - white	Art. No. 505666
LAB 500 trolley bag	Art. No. 505479
LBA 500 battery pack	Art. No. 505596
LAH 500 speaker clamp	Art. No. 505992