

Troubleshooting Guide

Having trouble with the sound system?

Condition

No sound (power LED not lit):

Possible Solution

- turn POWER switch ON
- charge battery

No sound (power LED lights):

- check for output from source
- make sure all cables are completely plugged in
- increase volume control on input used
- check speaker cable for faults

Shortened battery life:

- reduce volume to eliminate distortion
- charge battery fully before use
- replace worn battery

Distorted sound:

- check input cable connection
- lower input signal level

Excessive hum or noise:

- use shielded input cable
- use a balanced microphone

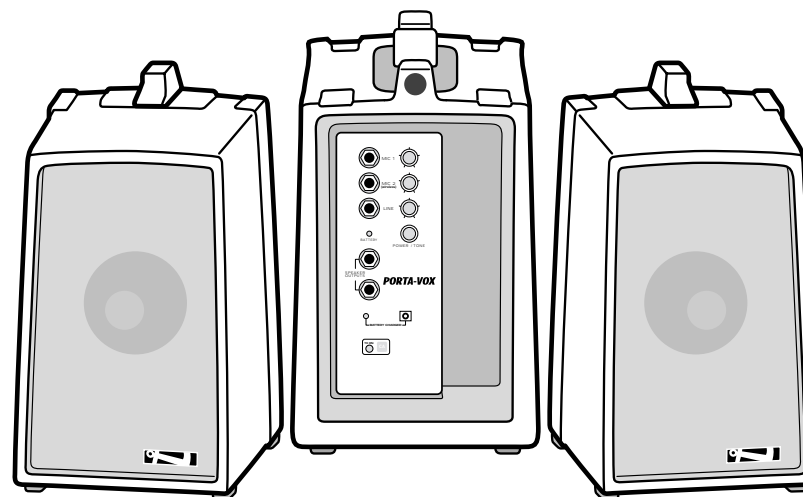
Having trouble with the wireless system? (PB-500W only)

Condition

No sound:

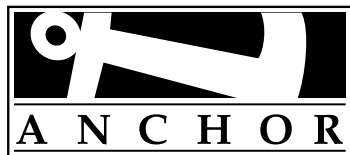
Possible Solution

- set mute switch to ON
- turn up Mic 2/Wireless volume control
- plug microphone into body-pack transmitter
- unplug any other mic from Mic 2 input
- turn sound system ON
- confirm transmitter power switch is set to PWR
- replace mic/transmitter battery



PortaVox

Owner's Manual



ANCHOR Audio, Inc. (310) 784-2300
100-0007-000 / Revision D, 08/97



Thank you for choosing an Anchor Audio portable sound system. Our products incorporate state-of-the-art design and the finest quality of materials and workmanship. We're proud of our products and appreciate the confidence which you have shown by selecting an Anchor system.

I hope you'll take a few of minutes to review this manual. We've incorporated several unique features into our products, and your knowledge of how to use them will enhance the performance and your enjoyment of the system.

David Jacobs, President on behalf of all Anchor employees

Quick Use Guide

PortaVox is an easy-to-use portable sound system that will run for many hours on its built-in battery. You'll need a microphone or other input source before you begin.

Make sure the battery is fully charged before use (see page 9).

Here's how easy it is to use:

1. Unhook the two speaker units from the center console and set them in front of your audience on the ground or on speaker stands.
2. Plug the cable attached to each speaker into the jacks on the console labeled SPEAKER OUTPUT.
3. Plug a microphone into the MIC 1 or MIC 2 input, or plug an audio source into the LINE input.
4. Set all input level controls to minimum, then turn the power switch ON. Increase the level control adjacent to the input used until desired volume is reached.
5. Adjust the tone control (also the power switch) for desired sound quality.

To operate the wireless mic system on model PB-500W see "Wireless Operation" on pages 7 - 9. And for more detailed instructions, see the "Operation" section beginning on page 5.

Problems?
Consult the troubleshooting section on the back page of this manual.



Specifications

Rated power output:	2 x 20 watts @ 3Ω
Max SPL @ rated power:	123 dB @ 1 meter
Frequency response:	250 Hz - 10 kHz ± 4 dB
Speaker type (2)	reentrant horn
Inputs	
Mic 1:	Lo-Z, unbalanced, 1/4"-phone
Mic 2:	Lo-Z, unbalanced, 1/4"-phone (used for wireless on PB-500W)
Line input:	Hi-Z, unbalanced, 1/4"-phone
Speaker outputs (2):	supports a maximum of 2 PortaVox speakers each.
Battery:	12 volt rechargeable, 7.0 AH
Charger (120 Volts):	16 volts AC, 1.5A, 60Hz (use RC-16 only)
Charger (220 Volts):	16 V~, 1.5A, 50/60Hz (RC-16/220 only)
Dimensions:	27 x 9.5 x 14", 69 x 24 x 35 cm
Weight:	30 pounds, 13.5 Kg.

Specifications subject to change without notice.

Date of Manufacture

The date of manufacture of this Anchor Audio product can be determined by the seven or eight digit serial number code. The fifth and sixth digits from the right denote the year, the seventh digit (letter) from the right denotes the month (A=Jan, B=Feb, etc.) Example: "XD960083" states that the unit was manufactured in April of 1996. An "X" may or may not exist as the eighth digit (letter) and has no significance in the serial number or date code.



Accessories

SP-500 Companion Speaker Pack

Extends the coverage of your sound system—includes two PortaVox speakers, cables, and a center storage unit.

SS-250 Speaker Stand

Adjustable stand made of black, anodized aluminum. Fits PortaVox and SP-500 speakers.

VL-500 Storage Cover

Heavy duty cover for PortaVox.

MIC-90P Handheld Microphone

Anchor's dynamic, balanced, low impedance microphone with a unidirectional pick-up pattern. Comes with a 20' cable with 1/4" -phone plug and mic clip.

MSB-201 Microphone Stand and Boom

Microphone floor stand with 33" adjustable boom.

SC-50EX 50' Speaker Cable Extension

Heavy duty speaker cable with a male 1/4" phone plug on one end and female phone connector on other end.



Getting Started

Inspection and inventory of your system

Check unit carefully for damage which may have occurred during transit. Each Anchor product is carefully inspected at the factory and packed in a special carton for safe transport.

Inventory

- PortaVox sound system (1 control unit & two speakers)
- MIC-50 Microphone
- RC-16 charging transformer (RC-16/220 for export)
- Warranty and registration card

All damage claims must be made with the freight carrier.

Notify the freight carrier immediately if you observe any damage to the shipping carton or product. Repack the unit in the carton and await inspection by the carrier's claim agent. Notify your dealer of the pending freight claim.

Returning your unit for service or repairs

Should your unit require service, contact your dealer or our Customer Service Department at (310) 784-2300 to obtain a Return Authorization (RA) number. All shipments to Anchor must include an RA number and must be shipped prepaid. *C.O.D. shipments will be refused and returned at your cost.*

Warranty registration

Please fill out the warranty card and return it with a copy of your invoice to Anchor's Customer Service Department. This will activate your limited two year warranty.

Save the shipping carton and packing materials. They were specially designed to ship your unit safely.

Feedback Information

What causes feedback?

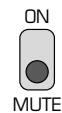
Feedback is a ringing, howling, or shrill sound that is self-generated by the sound system. It is the result of sound from the speakers being picked up by the microphone(s) in use and then re-amplified by the system. This can form a self-sustaining loop that can damage the sound system if allowed to continue.

How to prevent feedback

ALWAYS STAND BEHIND THE SPEAKER
WHEN USING A MICROPHONE.

CAUTION: *Feedback can damage your equipment and may be hazardous to your hearing. To avoid feedback, always make sure volume controls are at minimum before turning unit on. If feedback occurs, immediately reduce the volume.*

Battery Operation



(wireless continued!)

Using the microphone ON/MUTE switch.

When set to the “ON” position the mic operates normally. To prevent unwanted sounds from being picked up without turning the transmitter off, move switch to “MUTE” position.

(The handheld mic/transmitter comes with a protective sleeve which fits over the power and mute switches to prevent accidental movement during use. To install it, unscrew the battery cover and slide the sleeve onto the microphone handle. Replace the cover.)

About the battery protect circuit

The automatic battery protection circuit turns the unit off when the battery approaches its ‘critical discharge point’ to prevent damaging the battery.

When the Battery LED begins flashing, this indicates the battery is low and the unit will shut off in 15 - 30 minutes.

Expected service time from the battery

The service time per charge will vary depending on the volume level, type of program usage and if companion speakers are used with the system.

Service time per charge (continuous music input).

medium volume	8 to 12 hours
full volume (before clipping)	4 to 6 hours

Charging the battery

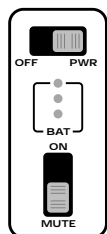
Plug the RC-16 charger (RC-16/220 for export) into an AC outlet and into the charger input (the Charger LED will light, indicating the battery is being charged). The charger will automatically charge the battery for optimum recovery.

When the battery is charged (about 12 hours), the Charger LED will flash. This indicates the charger has switched to the maintenance charge rate—the charger may be left plugged in to maintain a full charge without damaging the battery.

IMPORTANT: For longer battery life, always store the unit with the battery in a fully charged condition.



Wireless Operation (PB-500W only)



Operating times determined using a fresh 9 volt alkaline battery *Duracell MN1604 or equivalent.

About the transmitter battery gauge/indicator

Assuming a battery is installed in the transmitter, you can estimate the remaining operating time by sliding the power switch to the PWR position (*first turn the sound system off, or set the transmitter mute switch to the MUTE position*).

Observe the color of the LED indicator(s) that light up:

Battery LED Indicator	Operating Time
green	6 - 20 hours
green & amber	4 - 6 hours
amber	2 - 4 hours
red	< 1 hour

Replacing the transmitter battery

Note: The transmitter power switch must be in the OFF position!

HANDHELD: Unscrew the battery compartment cover on the lower end of mic (see diagram on previous page). Install a fresh 9 Volt alkaline battery* and replace the cover.

BODY-PACK: Press the end of the battery cover labeled OPEN, slide it back and lift the cover. Install a fresh 9 Volt alkaline battery* being sure to observe proper polarity. Close the cover.

Operating the wireless microphone system

The audio signal from the built-in wireless receiver is fed to the Mic 2/Wireless input. Unplug any other mic from the MIC 2 input when using the wireless system.

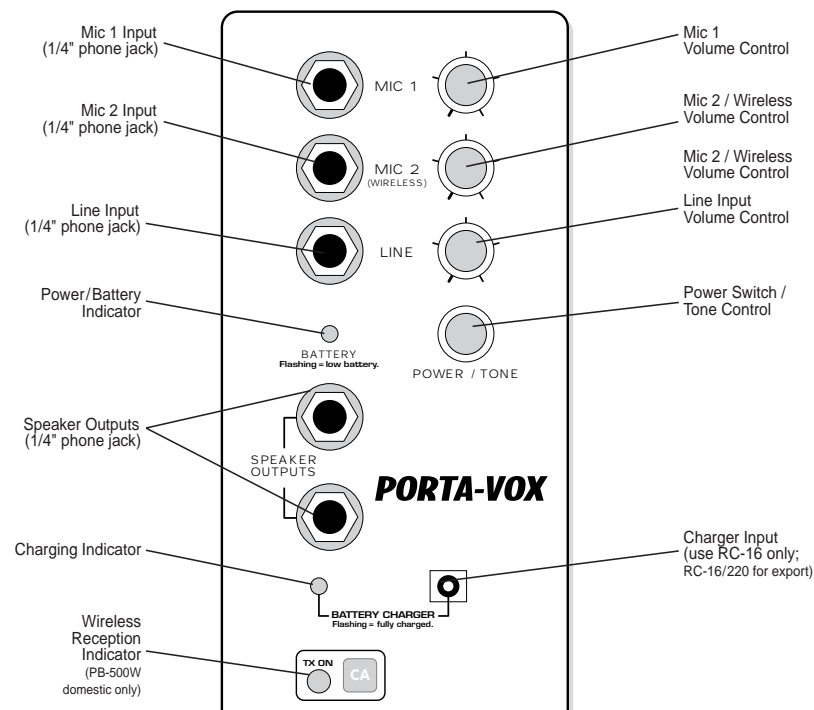
Operating the wireless microphone system:

1. Extend the antenna on the PortaVox unit.
2. If you're using the body-pack transmitter, insert the plug from the mic into the jack on the transmitter.
3. Set the Mic 2/Wireless volume control to minimum.
4. Turn the sound system power switch ON.
5. Set the transmitter power switch to PWR and the mute switch to ON. *Note: The domestic version of the PB-500W has a TX-ON indicator to indicate wireless signal (RF) is being received.*
6. Adjust the Mic 2/Wireless control to desired volume.

Caution: Harmful feedback may occur when walking in front of a sound system or speaker with a wireless microphone. Always point mic away from speakers.

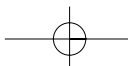


Operation



Operating the sound system

1. Unhook the two speakers from the center console and set them in front of your audience. *For best results, use stands to elevate the speakers 4-6 feet above ground level.*
2. Plug the cable attached to each speaker into the jacks on the console labeled SPEAKER OUTPUT.
3. Plug a microphone into the MIC 1 or MIC 2 input, or plug an audio source into the LINE input.
4. Set all input controls to minimum, then turn the power switch "ON." (LED next to switch will light). *If the LED flashes or does not light, the battery must be charged (see page 9).*
5. Increase the level control adjacent to the input used to desired volume.
6. Adjust the tone control for desired sound quality. **5**



Operation



MIC 1

Mic 1 Input

An unbalanced, low impedance microphone input. For use with the MIC-50 or other mics that have a 1/4" phone plug.

MIC 2
(WIRELESS)

Mic 2 Input

An unbalanced, low impedance microphone input. For use with mics that have a 1/4" phone plug.

On PB-500W (wireless) models, the built-in receiver is connected to this input. Use the Mic 2 control to adjust the wireless mic volume. *(Inserting a plug into the Mic 2 input disconnects the wireless input—to use a wired and wireless mic simultaneously, plug the wired mic into the Mic 1 Input.)*

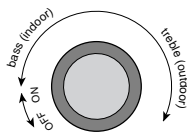


LINE

Line Input

The line input (1/4"-phone jack) is used for playback of a tape or CD player, musical instrument, VCR or similar source. It may be used simultaneously with the mic inputs for a composite output.

Note: *All connections must be made with shielded cable to avoid hum, buzzing, or radio interference.*



POWER / TONE

Power Switch / Tone Control

The PortaVox uses a combination power switch / tone control. The on/off switch is located at approximately the 7-o'clock position.

Use the tone control to adjust for sound quality. Rotate the knob fully clockwise for maximum outdoor projection.

Speaker Outputs

Connect the PortaVox speakers to the speaker output jacks.

To increase the capacity of the PortaVox, connect external speakers from Anchor's optional SP-500 speaker pack to the jacks on the back of the PortaVox speakers.

NOTE: *Battery service time per charge will decrease when additional speakers are used with the PortaVox.*

Wireless Operation (PB-500W only)



Setting up the wireless system

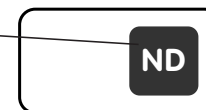
Checking the Frequency Code.

Before proceeding, you must first verify that the wireless frequency of your transmitter matches the frequency of the receiver installed in your sound system.

1. The control panel of the PortaVox sound system has the following label:

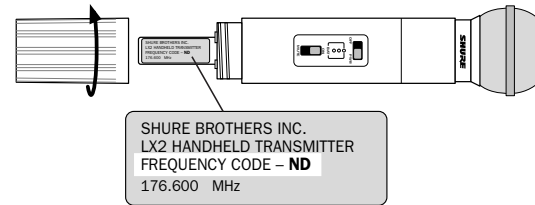
Frequency Code label

(Shure designates a one- or two-letter code which corresponds to the wireless frequency at which the component operates.)

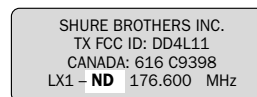


2. The frequency code must match the code found on the transmitter as described below:

HANDHELD: Unscrew the battery compartment cover on lower end of the microphone. Remove the battery (if installed) and check the code on the label.



BODY-PACK: Check the code on label located behind the belt clip.



label on **body-pack** transmitter

3. If the frequency codes don't match, locate the correct transmitter whose code matches the sound system.