

Before using this unit, carefully read "USING THE UNIT SAFELY" and "IMPORTANT NOTES" (the leaflet "USING THE UNIT SAFELY"). After reading, keep the document(s) where it will be available for immediate reference.

**Stable wireless communication with no dropouts (Auto Wireless Connection)**

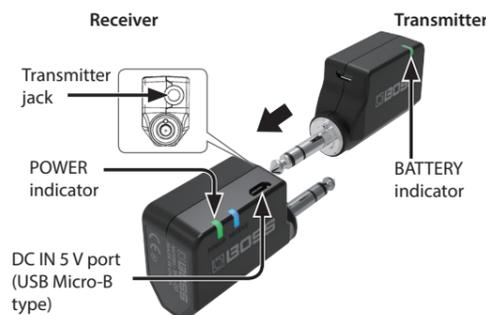
Simply connect the transmitter with the receiver; the receiver scans the local state of the wireless spectrum and automatically chooses the optimal channel.

**Switches to standby mode when silence continues**

When one hour passes without you playing your guitar (musical instrument), the transmitter enters standby mode and ends the connection with the receiver. When one hour passes after the connection with the transmitter has ended, the receiver enters standby mode.

**Charging Both the Receiver (WL-20 / WL-20L) and Transmitter (WL-T)**

1. Connect the included USB cable and a commercially available USB AC adaptor (5 V/0.5 A or higher) to the receiver's DC IN 5 V port.
2. Insert the transmitter into the TRANSMITTER jack so that the transmitter also charges.



**NOTE**

Insert only the BOSS WL-T transmitter into the TRANSMITTER jack. If you connect headphones, high-volume sound might be emitted, or the headphones might be damaged.

| POWER indicator    |   |
|--------------------|---|
| Lit orange         | Charging.   |
| Blinking green     | Charging is completed, and the transmitter is in standby mode.                      |
| Rapid blinking red | A charging error occurred. Contact your dealer or a Roland customer service center. |

| BATTERY indicator |   |
|-------------------|---|
| Blinking orange   | The system is monitoring the local state of the 2.4 GHz wireless spectrum for 10 seconds, and automatically making adjustments so that the receiver and transmitter can connect with optimal stability (Auto Wireless Connection).  |
| Lit orange        | Charging (Auto Battery Charge).<br>* The charging time differs depending on the remaining battery charge and on the charging environment.   |
| Blinking green    | Charging is completed.<br>* We recommend that you disconnect the transmitter after charging is completed. If you leave it connected, a small amount of power is used from the battery, and the indicator blinks green once every eight seconds.<br>* If you have not used the transmitter for a long time, one charge might not be sufficient. Disconnect and reconnect the transmitter to complete charging. |
| Lit green         | When five hours have passed since charging started, charging automatically stops in order to protect the rechargeable lithiumion battery, even if charging was not completed. To charge completely, disconnect and reconnect the transmitter.   |
| Blinking red      | A charging error occurred.<br>➔ "Troubleshooting."  |

**Charging only the transmitter**

Connect the included USB cable and a commercially available USB AC adaptor (5 V/0.5 A or higher) to the DC IN 5 V port.

\* When charging from the DC IN 5 V port, the wireless connection does not operate.

DC IN 5 V port (USB Micro-B type)



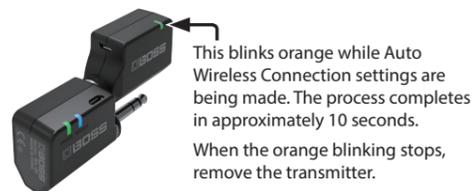
**Other parts and their function**



**Making Wireless Settings (Auto Wireless Connection)**

\* Execute the following operation before you play your guitar (musical instrument). In particular when you're playing live or in a session, the wireless conditions might change between the rehearsal and the actual event, so you should execute the following operation once again before the actual event.

1. Insert the transmitter into the TRANSMITTER jack.



**For stable wireless communication**

If audio dropouts occur, it might be that the local state of the wireless spectrum has changed. Execute the Auto Wireless Connection operation once again.

Since the WL-20 / WL-20L uses a 2.4 GHz wireless system, we recommend that you place the receiver at least three meters away from a Wi-Fi router or other wireless device.

Using a microwave oven might also cause audio dropouts due to wireless interference.

**Using multiple wireless systems together**

To prevent confusion between the wireless systems, perform the following steps.

1. Power-off the BOSS wireless systems.
2. Power-on any wireless systems not made by BOSS, and set them up so that there are no problems with their sound.

**First wireless system unit made by BOSS**

3. Insert the transmitter into the receiver's TRANSMITTER jack and execute the Auto Wireless Connection procedure.

4. Plug the transmitter into your guitar (musical instrument), making the BATTERY indicator light.

**Second and subsequent wireless system units made by BOSS**

5. Repeat steps 3 and 4.

**Performing**

When you plug the transmitter into your guitar (musical instrument) and plug the receiver into your amp or effect unit, the transmitter and receiver power-on automatically.

\* To prevent malfunction and equipment failure, always turn down the volume, and turn off all the units before making any connections.

| POWER/BATTERY indicator |   |
|-------------------------|---|
| Lit green               | There is sufficient remaining battery capacity.                     |
| Blinking green          | Standby mode.   |
| Lit orange              | Battery will be exhausted in less than two hours.                   |
| Lit red                 | Battery will be exhausted in less than 30 minutes. Please recharge. |

**Switches to standby mode when silence continues**

- When one hour passes without you playing your guitar (musical instrument), the transmitter enters standby mode and ends the connection with the receiver. The BATTERY indicator blinks green.
- When one hour passes after the connection with the transmitter has ended, the receiver enters standby mode. The POWER indicator blinks green.

**Note when returning from standby mode**

- When you raise the volume of your guitar (musical instrument) and play it, the transmitter returns from standby mode in approximately two seconds.
- The receiver must be disconnected and reconnected.

**When not using the system for an extended time**

Unplug the transmitter and receiver. Standby mode does consume battery power, although only very slightly.

**Turning the Power Off**

1. Minimize the volume of your guitar (musical instrument) and of output devices such as the amp, and then turn off the power.
2. Unplug the transmitter from the guitar (musical instrument).
3. Unplug the receiver.

**Troubleshooting**

| Problem   | Items to check/Action   |
|---|---|
| No sound when you play the guitar (musical instrument) in which the transmitter is inserted | Remove and reinsert the transmitter in the guitar (musical instrument).   |
|   | Is the receiver too far away from the transmitter? Alternatively, are there obstructions between them?<br>Decrease the distance between the receiver and the transmitter.   |
|   | Could you be recharging transmitter from the DC IN 5 V port?<br>Disconnect the USB cable when you're playing.   |
|   | Is the transmitter's BATTERY indicator lit?<br>If it is unlit, recharge the transmitter.  |
|   | Is the receiver's RECEIVE indicator lit?<br>If it is unlit, execute the Auto Wireless Connection procedure.   |
| The sound of a different guitar (musical instrument) is heard                               | Could there be a different receiver or transmitter nearby?<br>Execute the Auto Wireless Connection operation once again.  |
|   | If this does not solve the problem, it could be that radio-frequency congestion on the 2.4 GHz band is causing channels to conflict with another wireless system.<br>To reduce radio-frequency congestion, turn off the power of any unused Wi-Fi router, Bluetooth device, or microwave oven, and then execute the Auto Wireless Connection operation once again.  |
|   | A charging error occurred.<br>• If the transmitter's internal temperature rises, charging might pause. This occurs in order to protect the rechargeable lithium-ion battery. When the internal temperature falls, the BATTERY indicator changes to be lit orange, and charging resumes.<br>• Could the ambient temperature be above 35 °C?<br>Charging might stop for a while in order to protect the rechargeable lithium-ion battery. Use the unit in the recommended ambient temperature range of 10–30°C.<br>• If the indicator continues blinking red even though you are charging in the recommended temperature range (10–30°C) Contact your dealer or a Roland customer service center. |
| The BATTERY indicator blinks red  |   |

**Main Specifications**

BOSS wireless system: WL-20 / WL-20L

| RECEIVER                   |   |
|----------------------------|---|
| Wireless Format            | BOSS proprietary digital audio format   |
| Wireless carrier frequency | 2.4 GHz   |
| Compatible Channels        | 14 (May vary due to local conditions)   |
| Transmission Range         | 15 meters (50 feet) line-of-sight (May vary due to local conditions)  |
| Latency                    | 2.3 ms  |
| Dynamic Range              | 110 dB or greater   |
| Frequency Response         | 20 Hz–20 kHz  |
| Nominal Output Level       | -10 dBu   |
| Output Impedance           | 1 kΩ  |
| Recommended Load Impedance | 10 kΩ or greater  |
| Indicators                 | POWER<br>RECEIVE  |
| Connectors                 | Output plug: 1/4-inch TRS phone type<br>TRANSMITTER jack: 1/4-inch TRS phone type<br>DC IN 5 V port: USB Micro-B type   |
| Power Supply               | Rechargeable lithium-ion battery<br>Supplied from the DC IN 5 V port  |
| Current Draw               | While charging: 500 mA  |
| Battery charging time      | Charging only the receiver: Approximately 3 hours<br>Charging simultaneously with the transmitter: Approximately 4 hours  |
| Dimensions                 | 87 (W) x 25 (D) x 38 (H) mm<br>3-7/16 (W) x 1 (D) x 1-1/2 (H) inches  |
| Weight                     | 60 g<br>3 oz  |
| Accessories                | Owner's Manual<br>Leaflet USING THE UNIT SAFELY<br>Transmitter<br>Micro USB cable for charging (*1)<br>*1: Use a standard USB AC adaptor (5 V/over 0.5 A) for charging. |

\* 0 dBu = 0.775 Vrms

| TRANSMITTER (WL-T)    |  |
|-----------------------|--|
| Nominal Input Level   | -10 dBu  |
| Indicator             | BATTERY  |
| Connectors            | Input plug: 1/4-inch TRS phone type<br>DC IN 5 V port: USB Micro-B type  |
| Power Supply          | Rechargeable lithium-ion battery<br>Supplied from the DC IN 5 V port   |
| Battery charging time | Charging only the transmitter: Approximately 3 hours<br>Charging simultaneously with the receiver: Approximately 4 hours |
| Dimensions            | 87 (W) x 22 (D) x 36 (H) mm<br>3-7/16 (W) x 7/8 (D) x 1-7/16 (H) inches  |
| Weight                | 43 g<br>2 oz   |

\* 0 dBu = 0.775 Vrms

\* This document explains the specifications of the product at the time that the document was issued. For the latest information, refer to the Roland website.

[https://roland.cm/wl-20\\_wl-20l\\_spec](https://roland.cm/wl-20_wl-20l_spec)

