

Integrated Audio System
ISX-80
OWNER'S MANUAL







CAUTION: READ THIS BEFORE OPERATING YOUR UNIT.

- 1 To assure the finest performance, please read this manual carefully. Keep it in a safe place for future reference.
- 2 Install this sound system in a well ventilated, cool, dry, clean place away from direct sunlight, heat sources, vibration, dust, moisture, and/or cold. For proper ventilation, allow the following minimum clearances.

Top: 15 cm (6 in.), Sides: 10 cm (4 in.)

- 3 Locate this unit away from other electrical appliances, motors, or transformers to avoid humming sounds.
- 4 Do not expose this unit to sudden temperature changes from cold to hot, and do not locate this unit in an environment with high humidity (i.e. a room with a humidifier) to prevent condensation inside this unit, which may cause an electrical shock, fire, damage to this unit, and/or personal injury.
- 5 Avoid installing this unit where foreign object may fall onto this unit and/or this unit may be exposed to liquid dripping or splashing. On the top of this unit, do not place:
 - Other components, as they may cause damage and/or discoloration on the surface of this unit.
 - Burning objects (i.e. candles), as they may cause fire, damage to this unit, and/or personal injury.
 - Containers with liquid in them, as they may fall and liquid may cause electrical shock to the user and/or damage to this unit.
- 6 Do not cover this unit with a newspaper, tablecloth, curtain, etc. in order not to obstruct heat radiation. If the temperature inside this unit rises, it may cause fire, damage to this unit, and/or personal injury.
- 7 Do not plug in this unit to a wall outlet until all connections are complete.
- 8 Do not operate this unit upside-down. It may overheat, possibly causing damage.
- 9 Do not use force on switches, knobs and/or cords.
- 10 When disconnecting the power cable from the wall outlet, grasp the plug; do not pull the cable.
- 11 Do not clean this unit with chemical solvents; this might damage the finish. Use a clean, dry cloth.
- 12 Only voltage specified on this unit must be used. Using this unit with a higher voltage than specified is dangerous and may cause fire, damage to this unit, and/or personal injury. Yamaha will not be held responsible for any damage resulting from use of this unit with a voltage other than specified.
- 13 To prevent damage by lightning, keep the power cable and outdoor antennas disconnected from a wall outlet or this unit during a lightning storm.
- 14 Do not attempt to modify or fix this unit. Contact qualified Yamaha service personnel when any service is needed. The cabinet should never be opened for any reasons.
- 15 When not planning to use this unit for long periods of time (i.e. vacation), disconnect the AC power plug from the wall outlet.
- 16 Be sure to refer to the "Troubleshooting" section for common operating errors before concluding that this unit is faulty.
- 17 Before moving this unit, press Delta to set it to standby mode and disconnect the AC power plug from the wall outlet.
- 18 Condensation will form when the surrounding temperature changes suddenly. Disconnect the power cable from the outlet, then leave this unit alone.
- 19 When using this unit for a long time, this unit may become warm. Turn the power off, then leave this unit alone for cooling.
- 20 Install this unit near the AC outlet and where the AC power plug can be reached easily.

- 21 The batteries shall not be exposed to excessive heat such as sunshine, fire or the like. When you dispose of batteries, follow your regional regulations.
- 22 Excessive sound pressure from earphones and headphones can cause hearing loss.

WARNING

TO REDUCE THE RISK OF FIRE OR ELECTRIC SHOCK, DO NOT EXPOSE THIS UNIT TO RAIN OR MOISTURE.

This unit is not disconnected from the AC power source as long as it is connected to the wall outlet, even if this unit itself is turned off by \mathfrak{G} . This state is called the standby mode. In this state, this unit is designed to consume a very small quantity of power.

Radio waves may affect electro-medical devices. Do not use this unit near medical devices or inside medical facilities.

Do not use this unit within 22 cm (9 inches) of persons with a heart pacemaker implant or defibrillator implant.

Notes on remote controls and batteries

- Do not spill water or other liquids on the remote control.
- Do not drop the remote control.
- Do not leave or store the remote control in the following conditions:
- places of high humidity, such as near a bath
- places of high temperatures, such as near a heater or stove
- places of extremely low temperatures
- dusty places
- Insert the battery according to the polarity markings (+ and -).
- Change all batteries if you notice the following conditions:
 - the operation range of the remote control narrows
 - the transmit indicator does not flash or is dim
- · If the batteries run out, immediately remove them from the remote control to prevent an explosion or acid leak.
- If you find leaking batteries, discard the batteries immediately, taking care not to touch the leaked material. If the leaked material comes into contact with your skin or gets into your eyes or mouth, rinse it away immediately and consult a doctor. Clean the battery compartment thoroughly before installing new batteries.
- Do not use old batteries together with new ones. This may shorten the life of the new batteries or cause old batteries to leak.
- Do not use different types of batteries (such as alkaline and manganese batteries) together. Specification of batteries may be different even though they look the same. Danger of explosion may happen if batteries are incorrectly replaced.
- · Before inserting new batteries, wipe the compartment clean.
- Dispose of batteries according to your regional regulations.
- · Keep batteries away from children. If a battery is accidentally swallowed, contact your doctor immediately.
- When not planning to use the remote control for long periods of time, remove the batteries from the remote control.
- · Do not charge or disassemble the supplied batteries.

The user shall not reverse engineer, decompile, alter, translate or disassemble the software used in this unit, whether in part or in whole. For corporate users, employees of the corporation itself as well as its business partners shall observe the contractual bans stipulated within this clause. If the stipulations of this clause and this contract cannot be observed, the user shall immediately discontinue using the software.

For U.K. customers

If the socket outlets in the home are not suitable for the plug supplied with this appliance, it should be cut off and an appropriate 3 pin plug fitted. For details, refer to the instructions described below.

Note

The plug severed from the mains lead must be destroyed, as a plug with bared flexible cord is hazardous if engaged in a live socket outlet.

■ Special Instructions for U.K. Model

IMPORTANT

THE WIRES IN MAINS LEAD ARE COLOURED IN ACCORDANCE WITH THE FOLLOWING CODE:

Blue: NEUTRAL

Brown: LIVE

As the colours of the wires in the mains lead of this apparatus may not correspond with the coloured markings identifying the terminals in your plug, proceed as follows:

The wire which is coloured BLUE must be connected to the terminal which is marked with the letter N or coloured BLACK. The wire which is coloured BROWN must be connected to the terminal which is marked with the letter L or coloured RED.

Making sure that neither core is connected to the earth terminal of the three pin plug.

Information for Users on Collection and Disposal of Old Equipment and Used Batteries



These symbols on the products, packaging, and/or accompanying documents mean that used electrical and electronic products and batteries should not be mixed with general household waste.



For proper treatment, recovery and recycling of old products and used batteries, please take them to applicable collection points, in accordance with your national legislation and the Directives 2002/96/EC and 2006/66/EC.



By disposing of these products and batteries correctly, you will help to save valuable resources and prevent any potential negative effects on human health and the environment which could otherwise arise from inappropriate waste handling.



For more information about collection and recycling of old products and batteries, please contact your local municipality, your waste disposal service or the point of sale where you purchased the items.

[Information on Disposal in other Countries outside the European Union]

These symbols are only valid in the European Union. If you wish to discard these items, please contact your local authorities or dealer and ask for the correct method of disposal.

Note for the battery symbol (bottom two symbol examples):

This symbol might be used in combination with a chemical symbol. In this case it complies with the requirement set by the Directive for the chemical involved.

We, Yamaha Music Europe GmbH hereby declare that this unit is in compliance with the essential requirements and other relevant provisions of Directive 1999/5/EC.

Yamaha Music Europe GmbH

Siemensstr. 22-34 25462 Rellingen, Germany	
Tel: +49-4101-303-0	

CE

The name plate is located on the bottom of the unit.

Table of Contents

CAUTION: READ THIS BEFORE OPERATING YOUR UNIT......i

Introduction.....4

Supplied accessories.....4 About this manual.....4

Part name......5

Top panel.....5 Rear/side panel.....6 Front panel display.....7 Remote control.....8

Preparations.....9

Connecting FM antenna.....9 Connecting AC adaptor.....9 Installation.....10 Turning on the power.....13 Install the "MusicCast CONTROLLER" app......14 Connecting to the network......15 Connecting to the network by sharing the iOS device setting......16 Setting the clock......17

Playing network contents.....18

Listening to the songs in the computer.....19

Setting the media sharing of music files.....19 Playing back songs in the PC......20

Listening to Internet radio.....21

Presetting network contents......22

Presetting contents.....22 Selecting preset contents.....22

Listening to the Music with AirPlay.....23

Playing back songs with iPod.....23 Playing back songs with iTunes.....23

Listening to music via *Bluetooth* connection......24

Pairing a *Bluetooth* device with the unit......24 Performing pairing and playing back music......25 Connecting a paired *Bluetooth* device and playing back music......26

Listening to external sources.....27

Listening to FM radio stations......28

Tuning in FM stations.....28 Presetting FM stations.....29 Selecting preset FM stations.....29

Using the alarm function......30

3 types of alarms......30 Source......30 Snooze......30 Setting the alarm time with the unit......31 Turning the alarm on/off......33 Stopping the alarm for a short time (snooze)......33 Turning the alarm off......33 Using the sleep timer......34

Adjusting brightness of front panel display......35

Updating the firmware......36 Updating with a mobile device......36 Updating with the unit......36

Disabling the Wi-Fi function......37 Disabling the *Bluetooth* function......37

Troubleshooting......38

General.....38 Network.....39 *Bluetooth*.....41 FM reception.....42

Supported devices/media and file formats.....43

Specifications.....44

Trademarks.....45

Shelf style 10

Musical space around shelf

2 types of installation styles

Wall style 11

Musical interior in Harmony with wall



Introduction

Confirm the package contents and useful points of this manual.



About this manual

- How to operate this unit is described mainly using the remote control.
- iOS and Android mobile devices are collectively referred as "mobile devices." The specific type of mobile device is noted in explanations as needed.
- "iPod" described in this manual may also refer to "iPhone" or "iPad."
- Illustrations may differ from actual item depicted.
- Symbols:

Indicates precautions for use of the unit and its feature limitations.



Indicates supplementary explanations for better use.

C → Indicates the corresponding reference page(s).

Part name

Familiarize yourself with all parts and these functions.

Top panel



1) Wi-Fi indicator (& P.15)

(2) Bluetooth indicator (~ P.25, 26)

③ ⓓ (Power)/CONNECT (☞ P.15)

(4) SOURCE (~ P.31)

(5) VOLUME-/+ Controls the volume.

⑥ PRESET (P.22, 29)

(7) ALARM (~ P.31)

Rear/side panel



(1) Hole for wall-hanging installation (\circ P.11)

(2) Screw hole for attaching safety wire (M4)

③ ANTENNA jack (P.9)

- (4) Cable-holding slit (~ P.9)
- (5) Screw hole for installing the stand (~ P.10)

6 AUX jack (~ P.27)

- 7 DC input connector (P.9)
- (8) CLOCK switch (~ P.17)

(9) Wireless antenna section



• Do not insert any foreign object such as a card or a slip of paper in the opening. Doing so may cause a fire or malfunction.

Front panel display



(1) Source indicator Shows selected source.

(2) Illumination sensor Detects ambient lighting. Do not cover this sensor.

3 Play indicator Displays the playback mode.

(4) Remote control sensor (~ P.8)

(5) Multi-function indicator

Displays various information, including the clock time or FM station.

6 Sleep timer indicator

Lights up when the sleep timer is set ($rac{P.34}$).

⑦ Alarm indicator

Turns on if the alarm has been set (**~** P.31).



Adjusting display brightness

You can adjust the brightness of the front panel display by pressing **DIMMER** on the remote control (\checkmark P.35).

Remote control



(1) Infrared signal transmitter

2 🛈 (Power) (🗢 P.13)

3 Source buttons Switch the audio source to be played.

- (4) DIMMER (~ P.35)
- (5) CLOCK SETUP (∽ P.17)
- 6 ALARM (P.31, 33)
- ⑦ SNOOZE/SLEEP (∽ P.33, 34)
- () ►II (∽ P.20)
- 🔟 PRESET 1 6 (🗢 P.22, 29)
- (1) VOLUME +/-Controls the volume.

12 MUTE

Turns mute on or off. During mute, VOLUME –/+ blinks on the unit.

* Remove the insulation sheet of the remote control before using.

Controlling with the remote control

Point the remote control at the remote control sensor on the unit.



Replacing the battery

- Check the "+" of the battery and insert it the correct way around.
- While pushing the release tab in direction (), slide out the battery holder in direction ().



Preparations

Connect FM antenna or AC adaptor and turn the unit on.

Do not connect the power cable of the unit until you have finished connecting all cables.

Connecting FM antenna

- 1 Connect the supplied antenna to the unit.
- 2 Pass the antenna cable through the cable-holding slit on the back.





• If radio reception with the supplied antenna is not satisfactory, a commercially available outdoor antenna may improve reception.

Connecting AC adaptor

- Connect the AC adaptor.
- 2 Pass the cable through the cableholding slit on the back.



Installation

When installing on a shelf

1 Attach the non-skid pad to the bottom of the unit (2 places).

• Attach the provided cable clamp to the bottom, you can also put together cables clean.

2 Attach the provided stand.

3 Attach the cover.

- When using an outdoor antenna or connecting to the AUX jack, the cover may not be able to be attached. In that case, you can use the unit without the cover.
- 4 Install FM antenna with pins where the unit can obtain good reception.
- 5 Connecting the power cable to the AC adapter.



• Spread a soft cloth or other protective mat over the table before installation.

When hanging the unit on the wall

1 Attach the cover.

• When using an outdoor antenna or connecting to the AUX jack, the cover may not be able to be attached. In that case, you can use the unit without the cover.

2 Attach the non-skid pad to the rear of the unit (2 places).

3 Insert a screw into the wall.

- Prepare a commercially available tapping screw (screw diameter 3.5 mm to 4 mm (1/8 in. to 3/16 in.)).
- Do not mount the unit on thin plywood or on a wall made of soft material. Otherwise, the screw may pull out of the surface and the unit may fall, possibly damaging it or causing personal injury.
- Do not mount the unit on a wall using nails, adhesives, or unstable hardware. Long term use and vibration may cause the unit to fall.

Continue to the next page →





• Secure installation is the owner's responsibility. Yamaha shall not be liable for any accident caused by improper installation. If you are uncertain about the wall strength, please consult an installation specialist.

4 Hook the hole for wall-hanging installation onto the screw head.

- Make sure that the screw is securely caught by the narrow part of the hole.
- To prevent the unit from falling down, it is recommended to attach a commercially available safety wire. Use a commercially available screw (M4 x 8 mm (5/16 in.)) to attach it.
- 5 Install FM antenna with pins where the unit can obtain good reception.
- 6 Connect the power cable to the AC adapter.
 - Place the cable so that a hand or foot is not caught by it.



Turning on the power

Plug the power cable into the wall outlet and press 0.

- The unit turns on.
- Press 🕁 again to turn off (standby mode).
- By setting the CLOCK switch on the side (
 P.6), when the clock display is on or off, the status is "Standby" or "Eco standby," respectively (see the table on the right).

Auto standby

Auto standby can be turned on /off in the following procedure.

- 1 While pressing SOURCE of the unit, plug the power cable into an outlet.
- 2 Press and hold SOURCE.
 - The front panel display shows "ON" or "OFF."



Status in standby/eco standby

Standby	Eco standby
Yes	No
	Yes Yes Yes Yes Yes

- Set the CLOCK switch to "ON" when you use the "MusicCast CONTROLLER" app.
- When the auto standby is on (default setting), the unit will automatically go into the standby state under the following conditions.
 - When the unit produces no sound of audio input and is not operated for about 20 minutes at selecting Bluetooth or NET as the source.
 - When the unit has passed for 8 hours in the absence of operation regardless of the audio input.

Install the "MusicCast CONTROLLER" app

To connect the unit to a network and play the content of streaming services or the Internet radio, you must use the free dedicated "MusicCast CONTROLLER" app for mobile device. For details, search App Store or Google PlayTM for "MusicCast CONTROLLER."

• The application supports iPhone/iPad/iPod touch and Android mobile devices.

"MusicCast CONTROLLER" capabilities

- Perform the network settings of this unit, and connect to the Wi-Fi network
- Play songs stored on computers (servers)
- Select an Internet radio station
- Distribute and receive audio between the unit and other Yamaha MusicCast devices
- Set the clock
- Set the alarm
- Adjust sound tone

See "MusicCast Setup Guide" for details.

Connecting to the network

You can play back music files stored on your PC, mobile devices, DLNA^{*}-compatible NAS, or audio contents on the Internet, by connecting this unit to the network. You can also operate the unit with your mobile device.

* Digital Living Network Alliance

1 Start "MusicCast CONTROLLER."

- 2 In "MusicCast CONTROLLER," start setting the network.
- 3 Follow the instruction of "MusicCast CONTROLLER" to press and hold the CONNECT of this unit.
 - The unit will become ready to be connected to the network and the Wi-Fi indicator (∽ P.5) blinks.

Set the network by following the indication of "MusicCast CONTROLLER."

• When the unit is connected to the network, the Wi-Fi indicator (☞ P.5) lights up.





- For network connection, "MusicCast CONTROLLER" is required. Before making connection, connect the mobile device where "MusicCast CONTROLLER" has been installed to the wireless router (access point) you will use.
- For details on Internet connection, refer to the owner's manuals of your network devices.
- Some security software installed on your PC or the firewall settings of network devices (such as a router) may block the access of the unit to the network devices or the Internet. In this case, change the setting of the security software or network devices.

Initializing network settings

- 1 Press 🛈 to turn the unit off.
- 2 Pull out the plug from the outlet.
- 3 While pressing $\mathbf{\Phi}$, plug the power cable into an outlet.
- After the source indicator (NET and 3) flashes for several seconds, the screen changes to the clock display.



Connecting to the network by sharing the iOS device setting

When you turn on the unit for the first time after purchase or initialization of network settings (σ P.15), the Wi-Fi indicator blinks and the unit automatically starts to search iOS device (such as iPhone). You can easily setup a wireless connection by applying the network settings on iOS devices.

Before proceeding, confirm that your iOS device is connected to a wireless router (access point).

Display the Wi-Fi setup screen on the iOS device and select the unit from "SETUP A NEW AIRPLAY SPEAKER...".

• Follow the on-screen instructions displayed on the iOS device.



- You need iOS device with iOS 7.1 or later.
- The network settings on iOS devices cannot be applied to the unit to establish a wireless connection if your wireless router (access point) uses WEP encryption.

Setting the clock

Once the clock is set, the alarm function will be available.



• The clock display flashes.



2 Set the clock with (*)/*).
3 Press (*) to finish the setting.





- The clock setting will be lost if you disconnect the power cable from the wall outlet for about a week. Set the clock again.
- The clock format (12-hour/24-hour) can be changed if you press the **SNOOZE/SLEEP** button while setting the clock.
 - The "AM" or "PM" is displayed only when 12-hour format is selected.
 - To cancel the setting, press 🕁
 - You can use the CLOCK switch to set whether or not to display the clock during the standby status.
 ON: clock display on (standby)
 OFF: clock display off (eco standby)

Playing network contents

This unit allows you to play back music files such as MP3, WMA, or FLAC (lossless audio data compression format) files stored in the computer (server) connected to the network or NAS. You can also listen to world-wide radio stations via the Internet.



1) Play back the Internet radio (~ P.21)

(2) Play back music files stored on your PC (~ P.19)

③ Play back music files stored on your NAS (~ P.19)

(4) Play back your iPod with AirPlay (~ P.23)

Listening to the songs in the computer

This unit allows you to play back music files such as MP3, WMA, or FLAC (lossless audio data compression format) files stored in the computer (server) connected to the network or NAS.

Setting the media sharing of music files

To play back music files in your computer with this unit, you need to make the media sharing setting between the unit and computer (Windows Media Player 11 or later). In here, setting with Windows Media Player 12 in Windows 7 is taken as an example.

- 1 Start Windows Media Player 12 on your PC.
- 2 Select "Stream," then "Turn on media streaming."
 - The control panel window of your PC is shown.
- 3 Click "Turn on media streaming."
- 4 Select "Allowed" from the drop-down list next to the unit's model name.
- 5 Click "OK" to exit.

00.1	ibrary 🕨 N	/lusic → Album →		
Organize •	Stream 👻	Create playlist 👻		
Dibrary Playlists	Allow	Internet access to home med remote control of my Player, matically allow devices to play		st.
Artis		on media streaming		ltzmar
 Genre Videos Pictures Recorded 		N Ninja Tuna Other Unknown	Mr. Scruff Unknown	



• For details on media sharing settings, refer to Windows Media Player help.

For a PC or a NAS with other DLNA server software installed

Refer to the owner's manual of your device or software and configure the media sharing settings.





Playing back songs in the PC

Use the "MusicCast CONTROLLER" installed in a mobile device.

- 1 In the "MusicCast CONTROLLER," select "Server."
- 2 Play back songs by following the indication of "MusicCast CONTROLLER."





• You can use the remote controller for the following operations:

►II	Play/pause

Move to the next or previous song in the folder.

• You can store your favorite songs beforehand (☞ P.22).

Listening to Internet radio

You can listen to Internet radio stations from all over the world. Use the "MusicCast CONTROLLER" installed in a mobile device to listen to Internet radio. Make sure that the unit is connected to the Internet properly (\sim P.15).

1 Use "MusicCast CONTROLLER" to select "Net Radio."

2 Play the radio by following the indication of "MusicCast CONTROLLER."



• You can store your favorite stations beforehand (☞ P.22).

Presetting network contents

Up to 6 contents can be registered with the unit; and up to 40 contents with "MusicCast CONTROLLER." You can easily play back contents after registered.

Presetting contents

- 1 Use "MusicCast CONTROLLER" to play back the content you want to register.
- 2 With the content selected, press and hold any of the PRESET button, $1 \frac{1}{8}$.
 - Preset number blinks on the front panel display.

Selecting preset contents

Press (NT).
 Press the PRESET button, (1)-(6).







Operation with buttons on the unit

- Presetting contents
- 1 Use "MusicCast CONTROLLER" to play back the content you want to register.
- 2 With the content selected, press and hold **PRESET**.
- 3 Press **PRESET** to select the desired preset number.
- 4 Press and hold **PRESET**.
- Selecting preset contents
- 1 Press SOURCE to select "NET."
- 2 Press **PRESET** to select the content.

Using "MusicCast CONTROLLER" to register content

- 1 Use "MusicCast CONTROLLER" to play back the content you want to register.
- 2 Register the content by following the indication of "MusicCast CONTROLLER."

Listening to the Music with AirPlay

The AirPlay function allows you to play back iTunes/iPod music on the unit wirelessly via a network. Make sure that the unit and your PC or iPod are connected to the same router (\circ P.15).

Playing back songs with iPod

Turn on the unit and display the playback screen on the iPod.

- If the iPod recognizes the unit, 🗔 is shown on the screen of the iPod.
- 2 Tap 🗔 and select the unit's name.
 - The source automatically switches to [AirPlay] and playback starts (except in the eco standby mode).

Playing back songs with iTunes

- 1 Turn on the unit and start iTunes.
 - If the iTunes recognizes the unit, is shown on the screen of iTunes.
- 2 Click 🗔 and select the unit's name.
 - The source automatically switches to [AirPlay] (except in the eco standby mode).
- 3 Play back songs with iTunes.



d touch
SX-80 ✓

!

- For an iPod with iOS7/iOS8 installed, is displayed within the control center. To display the control center, swipe the iPod screen in an upward direction.
- You can also use the unit and remote control to play back, pause, stop, and skip songs.

Clearing AirPlay

• Tap/click (on the iPod/iTunes screen and select a device other than the unit from the speaker list. Or, change the source to other than AirPlay.



Listening to music via Bluetooth connection

You can listen to sound wirelessly from a *Bluetooth* compatible device.

Pairing a *Bluetooth* device with the unit

When connecting a *Bluetooth* device to the unit for the first time, the device is required to be registered to the unit. This process is called "pairing." Once pairing is completed, subsequent connection can be made with a couple of easy steps.

Perform paring and Connecting via Bluetooth playing back music (~ P.25) playing back music (~ P.26)







 If pairing information for a device is deleted, you will need to perform pairing of that device again in order to connect it again.

Performing pairing and playing back music

- Press (1) to set the source to Bluetooth.
- 2 Turn on the *Bluetooth* function on your device.
- 3 In the *Bluetooth* setting of the device, select the unit (network name of the unit).
 - After pairing is complete, the *Bluetooth* indicator (∽ P.5) lights up when a *Bluetooth* connection is established.
 - If the device does not connect to the unit automatically after the pairing is completed, select the unit (network name of the unit) again in the *Bluetooth* setting on your device.
 - For details, see the owner's manual of your device.

4 Play back music on your device.





- If another device is already connected to the unit, press and hold to terminate the *Bluetooth* connection, then perform pairing with the new device.
- You can check or change the network name of this unit with "MusicCast CONTROLLER."
- If a passkey is required during the pairing operation, enter the number "0000."

Connecting a paired Bluetooth device and playing back music

If the unit is connected to another device via *Bluetooth* connection, terminate that connection (see "Terminating the *Bluetooth* connection" on the right) before connecting to the target device.

Perform *Bluetooth* connection.

- Connecting from the unit: Press
- Connecting from the *Bluetooth* device: Turn on the *Bluetooth* function of the connected device, and select the unit (network name of the unit) from the available device list.
- The *Bluetooth* indicator (*P*.5) lights up when a connection is established.

2 Play back music on the connected device.







 Decrease the volume of the unit before playback. Otherwise, playback volume may be too loud.



 If connecting from the unit, the unit searches for the *Bluetooth* device connected the last time. In this case, make sure that device's *Bluetooth* function is turned on.

Terminating the Bluetooth connection

Bluetooth connection can be terminated by either one of the following.

- Press and hold 🚷.
- Set the unit to standby mode.
- Terminate the *Bluetooth* connection from the connected device.
- Change to another input source.

Listening to external sources

This unit allows playback of external devices, such as a mobile music player. For the connection of each external device, refer to its supplied owner's manual.

- 1 Unplug the power cable of the unit.
- 2 Remove the back cover of the unit and connect the external device to the unit.
 - Prepare commercially available cables for connection.
- 3 Pass the cable through the cableholding slit on the back.
- 4 Attach the cover.
- 5 Plug the power cable of the unit back into the wall outlet and press (b) to turn the unit on.
- 6 Press (AUX).
- Play back the connected external device.
 - For details on playback, refer to the owner's manual supplied with the external device.





Decrease the volume of the unit and the external device before connection. Otherwise, playback volume may be too loud.

Listening to FM radio stations

To listen to FM radio stations, connect the supplied FM antenna. See "Connecting FM antenna" (P.9) for connecting the antenna to the unit.

Tuning in FM stations



- 2 Press and hold (**)/(**).
 - Automatic tuning starts, then stops automatically when a station is tuned in.







 If station reception is weak, you can tune into a station manually by pressing the Idd/bbi button repeatedly.

Presetting FM stations

Up to 6 contents can be registered with the unit; and up to 30 contents with "MusicCast CONTROLLER."

- 1 Tune into a station you want to store ([∞] P.28).
- 2 Press and hold any of the PRESET button, 1 6.
 - Preset number blinks on the front panel display.



Selecting preset FM stations

1 Press [™].

2 Press the PRESET button, 1 - 6.





2

6

Operation with buttons on the unit

- Presetting FM stations
- 1 Tune into a station you want to store.
- 2 Press and hold **PRESET**.
- 3 Press **PRESET** to select the desired preset number.
- 4 Press and hold **PRESET**.
- Selecting preset FM stations
- 1 Press SOURCE to select "FM."
- 2 Press **PRESET** to select the station.

Using "MusicCast CONTROLLER" to register content

- 1 Use "MusicCast CONTROLLER" to play back the content you want to register.
- 2 Register the content by following the indication of "MusicCast CONTROLLER."

Using the alarm function

The unit includes an alarm function (IntelliAlarm) that plays back music sources or set of beeps (built-in alarm) at the set time in a variety of different methods. The alarm function has following features.

3 types of alarms

Use "MusicCast CONTROLLER" to make setting. Select from 3 alarm types, combining music and beep sounds. Follow the indication of "MusicCast CONTROLLER" to make setting.

BEEP Only beep sound is played back at the set time.	
SOURCE	The selected audio source is played at the set time. The volume fades in gradually and increases to the set volume.
SOURCE+BEEP	The selected audio source and beep sound are played at the set time. This mode is recommended for the best possible start to the day. 3 minutes before the set time: the source music begins to fade in and the volume gradually increases as the alarm time approaches. Alarm time: a beeping sound also begins playing.



Network contents and radio can be selected. The following can also be selected depending on the audio source.

Source	Playback method	Function
Network contents	Preset	Plays back the specified network content.
	Resume	Plays back the last network content played back.
FM radio	Preset	Plays the selected preset radio station.
	Resume	The radio station you listened to last time is played back.



• External devices connected to the AUX jack or devices connected via *Bluetooth* cannot be used as music source.

Snooze

The snooze function can be enabled to replay the alarm after 5 minutes.

Setting the alarm time with the unit

Press and hold (ALARM).

• (()) and set alarm time will flash.



- Press ()) to set the alarm time.
- 3 (when alarm types other than BEEP are selected) Press either (NET) or (FM) to select music source.
 - Depending on the circumstances of the source selected at the alarm time, sound may not be output.

Continue to the next page





- The alarm setting will be erased if the system enters standby mode without properly completing it.
- Set the alarm type by using "MusicCast CONTROLLER."



- You can use buttons on the unit to set the alarm.
- Press and hold ALARM.
- 2 Press VOLUME -/+ to set the alarm time.
- 3 (When selecting an alarm type other than BEEP) Press either of the **SOURCE** buttons to select the source to play back.
- 4 (When selecting an alarm type other than BEEP) Use **PRESET** to specify the song/radio station to play back.
 - Pressing the button once will resume the content.
- To specify the track or ratio station to play back, press the button repeatedly until the specified preset number is displayed.
- 5 Press **ALARM** to finish the alarm setting.

- 4 (when alarm types other than BEEP are selected) Press PRESET 1-6 to specify the content or radio station to be played.
 - Pressing again the same **PRESET 1-6** button will resume the content.
 - Preset contents and radio stations you want to play back (\$\vec{P}\$ P.22, 29).
- $5 \quad \text{Press VOLUME} \quad (-)/(+) \text{ to set the alarm volume.}$
- 6 Press (ALARM).
 - The alarm will be set, and (()) will light up.



Turning the alarm on/ off

Press ALARM.

 When the alarm is turned on, (() lights up, and the alarm time is shown for a while. When (() is turned off by pressing again, the alarm is turned off.

Stopping the alarm for a short time (snooze)

Press (NOTE) during the alarm playback.

• SNOOZE will stop the alarm and resume again in 5 minutes.

Turning the alarm off

Press (ARRANG) or (b) during the alarm playback.





• The alarm setting will be saved even if the alarm is turned off. If the alarm is turned on again by pressing **ALARM**, the alarm will sound with the previous alarm settings.



SNOOZE

/SLEEP

- When SOURCE + BEEP is set, press SNOOZE/ SLEEP once to stop the beep sound, and twice to stop the audio source. 4 minutes after the audio source is stopped, it will start fading in again and after another minute the beep sound will resume.
 - The alarm indicator will blink when the snooze function is activated.

-)

- The alarm stops automatically after 60 minutes unless you stop the alarm.
- The alarm setting will be saved even if the alarm is turned off. If the alarm is turned on again by pressing **ALARM**, the alarm will sound with the previous alarm settings.



Using the sleep timer

You can set the time to elapse which the unit automatically enters to standby mode.

Press several times to select the time.

- Time can be selected from 30/60/90/120 min., or OFF.
- 🔁 lights up shortly after the time is selected, and the sleep timer is set.



• To cancel the sleep timer, press **SNOOZE/SLEEP** again.


Adjusting brightness of front panel display

Press ^(mme) several times to select the brightness.

- AUTO (A): adjusts the brightness automatically to match the surroundings.
- 3: brighter.
- 2: between 1 and 3.
- 1: darker.





 When AUTO is set, the brightness of the front panel display is adjusted automatically with the illumination sensor (
 • P.7). Ensure that the sensor is not covered.

Updating the firmware

When new firmware is detected from the network, "UP" will be shown on the front panel display (press any button to turn off the "UP" indication on the front panel display). There are two ways to updating the firmware.

Updating with a mobile device

You can use "MusicCast CONTROLLER" to update the firmware. Follow the indication of "MusicCast CONTROLLER" to update the firmware.

Updating with the unit

- Press 🕁 to turn the unit off.
- 2 Pull out the plug from the wall outlet.
- 3 While pressing PRESET, plug the power cable into the wall outlet.
 - PRESET and the "UP" indications flash on the unit.

4 Press PRESET.

• The firmware starts being updated, and when the update is completed, the "100 UP" indication flashes.



5 Press **(b)** to check that the normal display is returned.





Do not operate the unit or disconnect the power cable while updating.



• When Internet speed is not fast enough or the unit is connected to the wireless network via a wireless network adapter, network update may not be possible depending on the condition of the wireless connection. If the firmware update fails, the "Er" indication flashes. In that case, try updating again after a while.

Disabling the wireless function

Wireless functions (Wi-Fi, Bluetooth) of the unit can be disabled.

Disabling the Wi-Fi function

When the unit is in the standby state, press (NET) of the remote control while holding down SOURCE of the unit.

- "OFF" will be shown on the front panel display when you disable the Wi-Fi function.
- To enable the Wi-Fi function, follow the procedures in "Connecting to the network" (♥ P.15) and reconnect the unit to the network.
- When the source is switched to the network contents under the Wi-Fi function disabled, "OFF" will be shown on the front panel display.

Disabling the *Bluetooth* function

When the unit is in the standby state, press of the remote control while holding down SOURCE of the unit.

- Each time the operation is repeated, this function switches to enable/disable, and "ON"/"OFF" will be shown on the front panel display.
- When the source is switched to Bluetooth under the Bluetooth function disabled, "OFF" will be shown on the front panel display.





• Set the side panel CLOCK switch to "ON." It is not possible to change the setting in "OFF."



• The wireless function is enabled, when you connect to the network or the network setting is initialized.

Troubleshooting

Refer to the table below when the unit does not function properly. If your problem is not listed below or if the instruction below does not help, turn off the unit, disconnect the power cable, and contact the nearest authorized Yamaha dealer or service center.

First, check that the connectors of each cable are securely inserted in to jacks on each device.

General

Problem	Cause	Solution	
The unit enters the standby mode soon	The power cable is not properly connected.	Connect the power cable firmly.	
after the power is turned on. The unit does not operate properly.	The unit got a strong electric shock from an outside source, such as lighting or excessive static electricity.	Unplug the power cable from the outlet, and plug it again after about 30 seconds.	
	No appropriate source has been selected.	Select an appropriate source with SOURCE on the unit or the source buttons on the remote control (\bigcirc P.5, 8).	
No sound.	The volume is minimum or mute.	Turn up the volume.	
	The power is off.	Ture on the unit and play the reveal ends	
	Auto Standby function is activated.	– Turn on the unit and play the music again.	
Sound is cracked/distorted or there is abnormal noise.	The volume of the input music source is high. Or the volume of the unit is set to a high level.	Adjust volume with VOLUME.	
	The sleep timer may be set (P.34).	T	
The power is suddenly turned off.	Auto Standby function is activated (P.13).	– Turn on the unit and play the source again.	
The selected source does not play back at the alarm time.	The alarm type is set to BEEP.	Follow the indication of "MusicCast CONTROLLER" to set the alarm type to SOURCE + BEEP or SOURCE.	
	The selected content is not currently provided.	There may be a network problem, or the service may have been stopped. Select another content.	
	The selected content is playing back silence.	Some content silence at certain of times of the day. In this case, no sound is output even if the content is received. Select another content.	
The clock display does not appear in the standby state.	The CLOCK switch on the unit is set to "OFF."	Set the CLOCK switch on the unit to "ON."	

Problem	Cause	Solution
The front display becomes dim.	The front display setting is set to AUTO.	Set the brightness of the front panel display to a setting other than AUTO. Or, do not cover the illumination sensor.
The clock setting has been cleared.	The power cable of the unit was unplugged from the outlet. Or an outage occurred.	Connect the power cable, and set the clock again (\checkmark P.17).
There is noise interference from digital or high-frequency equipment.	This unit is too close to the digital or high-frequency equipment.	Place this unit farther away from such equipment.
	The remote control may be operated outside its operation range.	Operate the remote control within its operation range (${f \sim}$ P.8).
The remote control does not work or does not function properly.	The remote control sensor on this unit may be exposed to direct sunlight or strong lighting such as an inverter type fluorescent lamp.	Change the orientation of lighting or the unit, or location of the unit.
	The battery in the remote control may be worn out.	Replace the batteries with new ones (\backsim P.8).
	There are obstacles between the sensor of this unit and the remote control.	Remove the obstacles.

Network

Problem	Cause	Solution
The network feature does not function.	The network parameters (IP address) have not been obtained properly.	Enable the DHCP server function of the router. For details on how to set the router, contact the manufacturer of the router.
Playback stops (songs cannot be played back continuously).	There are unsupported files in the server.	Remove the files (including image files or hidden files) which the unit does not support, from the folder being played back.
	The media sharing setting of the PC is not correct.	Configure the sharing setting of the PC and select the unit as a device to which music contents are shared (σ P.19).
The unit does not detect the PC.	Some security software installed on your PC is blocking the access of the unit to your PC.	Check the setting of the security software installed in your PC.
	The unit and PC are not in the same network.	Check the network connections and your router settings, and then connect the unit and the PC to the same network.

Problem	Cause	Solution
The files in the PC cannot be viewed or played back.	The files are not supported by the unit or the media server.	Use the file format supported by both the unit and the media server (σ P.43).
The Internet radio cannot be played.	The selected Internet radio station is currently not available.	There may be a network problem at the radio station, or the service may have been stopped. Try the station later or select another station.
	The selected Internet radio station is currently broadcasting silence.	Some Internet radio stations broadcast silence at certain of times of the day. In this case, no sound is output even if the radio waves are received. Try the station later or select another station.
	Access to the network is restricted by the firewall settings of your network devices (such as the router).	Check the firewall settings of your network devices. The Internet radio can be played only when it passes through the port designated by each radio station. The port number varies depending on the radio station.
The "MusicCast CONTROLLER" app does not detect the unit.	The unit and mobile devices are not in the same network.	Check the network connections and your router settings, and then connect the unit and the PC to the same network.
Update of the firmware failed.	The network connection is unstable.	Try updating again after a while.
The unit cannot connect to the Internet via a wireless router (access point).	The wireless router (access point) is turned off.	Turn on the wireless router (access point).
	The unit and the wireless router (access point) are too far apart.	Place the unit and the wireless router (access point) closer to each other.
	There is an obstacle between the unit and the wireless router (access point).	Place the unit and the wireless router (access point) without any obstacle between them.
Wireless network is not found.	Wireless communication is interrupted by the electromagnetic waves emitted from a microwave oven or other wireless devices.	When using the unit via wireless connection, place it away from devices emitting electromagnetic waves.
	Access to the network is restricted by the firewall settings of your wireless router (access point).	Check the firewall setting of the wireless router (access point).
The iPod does not recognize the unit when using AirPlay.	A multi-SSID supported router is used.	The network separation function of the router may prevent the iPod from accessing the unit. When connecting an iPod, use SSID that can access the unit.

Bluetooth

Problem	Cause	Solution
	The unit is turned off.	Turn the unit on and perform the paring (\frown P.25).
	Another <i>Bluetooth</i> device is connected.	Terminate current <i>Bluetooth</i> connection, and perform pairing with the new device.
Connot make the unit pair with a Blustooth	This unit and the device are too far apart.	Pair the unit and device within a distance of 10 m (33 ft).
Cannot make the unit pair with a <i>Bluetooth</i> device.	There is a device (microwave oven, wireless LAN, etc.) that outputs signals in the 2.4 GHz frequency band nearby.	Move this unit away from the device that is emitting radio-frequency signals.
	A <i>Bluetooth</i> adapter, etc., that you want to pair with this unit has a passkey other than "0000."	Use a device whose passkey is "0000."
	The <i>Bluetooth</i> device does not support A2DP.	Perform pairing with a device which supports A2DP.
	The unit is turned off.	Turn the unit on.
	Another <i>Bluetooth</i> device is connected.	Terminate current connection, then establish a connection with that device again.
	The <i>Bluetooth</i> function of the device is turned off.	Turn on the <i>Bluetooth</i> function of the device.
Cannot make a <i>Bluetooth</i> connection.	The pairing information has been deleted.	Perform pairing again (P.26). This unit can be paired with 20 devices. If pairing with a 21st device is performed, the pairing information with the earliest connection date will be deleted.
	This unit is not registered on the device's <i>Bluetooth</i> connection list.	Perform pairing again (~ P.26).

Problem	Cause	Solution	
	The volume of the connecting device is set too low.	Turn up the volume of the connecting device.	
	The connecting device is not set to send <i>Bluetooth</i> audio signals to the unit.	Switch the output of <i>Bluetooth</i> audio signals of the connecting device to the unit.	
	The <i>Bluetooth</i> connection of the unit with the device has terminated.	Perform <i>Bluetooth</i> connection operations again (~ P.26).	
No sound is produced, or the sound is interrupted during playback.	There is a device (microwave oven, wireless LAN, etc.) that outputs signals in the 2.4 GHz frequency band nearby.	Move this unit away from the device that is emitting radio-frequency signals.	
	This unit and the connecting device are too far apart.	Move the connecting device to within 10 m (33 ft) of the unit.	
	The <i>Bluetooth</i> function of the device is turned off.	Turn on the <i>Bluetooth</i> function of the device.	
	The connecting device is not set to send <i>Bluetooth</i> audio signals to this unit.	Check that the <i>Bluetooth</i> function of the connecting device is set properly.	

FM reception

Problem	Cause	Solution
	The antenna is not connected properly.	Make sure the antenna is connected properly and change the position of the antenna (${\bf r}$ P.9).
FM stereo reception is noisy.	The radio station you selected may be far from your area, or the antenna input is poor.	Use a commercially available outdoor antenna. For details, consult a specialist store.
Automatic tuning does not work.	The radio station you selected may be far from your area, or the antenna input is poor.	Use a commercially available outdoor antenna. For details, consult a specialist store.
		Use the manual tuning method (~ P.28).
Cannot select a preset radio station.	The preset (memory) may have been erased.	Preset radio stations again (${f \circ}$ P.29).
There is distortion, and clear reception cannot be obtained even with a good FM antenna or an outdoor antenna.	Multipath reflection or other radio interference may have occurred.	Change the height, direction, or placement of the antenna.

Supported devices/media and file formats

Supported devices/ medias

PCs

PC with Windows Media Player 11 or Windows Media Player 12 installed.

NAS

NAS compatible with DLNA version 1.5.

File format

File format the unit supporting is as follows.

DLNA

- The unit supports playback of WAV (PCM format only), MP3, WMA, MPEG-4 AAC and FLAC files (1- or 2-channel audio only).
- The unit is compatible with sampling rates of up to 192 kHz for WAV, FLAC, AIFF and ALAC files, and 48 kHz for other files.
- To play back FLAC files, you need to install server software that supports sharing of FLAC files via DLNA on your PC or use a NAS that supports FLAC files.
- Digital Rights Management (DRM) contents cannot be played back.

Specifications

Input connector

AUX IN	3.5 mm stereo mini jack
Tuner	
FM tuning range	87.5 MHz to 108.0 MHz
Bluetooth	
Bluetooth version	Ver. 2.1+EDR
Supported profile	A2DP, AVRCP
Compatible codecs	SBC, AAC
Wireless output	Bluetooth Class 2
Maximum communication range	10 m (33 ft) (without obstructions)

Network

Connection method	Wi-Fi connection
Radio frequency band	2.4 GHz
Wireless network standards	IEEE802.11 b/g/n
Available security method	WEP, WPA2-PSK (AES), Mixed Mode
PC client function	DLNA ver.1.5 supported (DMP/DMR function)
Internet radio	vTuner supported
AirPlay	AirPlay supported

Amplifier

Maximum output power	15 W + 15 W (6 Ω, 1 kHz, 10% THD)

General

Power supply	AC 100 to 240 V, 50/60 Hz	
Power consumption	20 W	
Power consumption in the standby mode (clock display on)	3.0 W or less	
Power consumption in the eco standby mode (clock display off)	0.5 W or less	
Dimensions (W \times H \times D)	302 × 302 × 65 mm (11-7/8 × 11-7/8 × 2-1/2 in.)	
Weight	3.3 kg (7.3 lbs.)	

Specifications are subject to change without notice.

Bluetooth

• Bluetooth is a technology for wireless communication between devices within an area of about 10 meters (33 ft) employing the 2.4 GHz frequency band, a band which can be used without a license.

Handling Bluetooth communications

- The 2.4 GHz band used by *Bluetooth* compatible devices is a radio band shared by many types of equipment. While Bluetooth compatible devices use a technology minimizing the influence of other components using the same radio band, such influence may reduce the speed or distance of communications and in some cases interrupt communications.
- The speed of signal transfer and the distance at which communication is possible differs according to the distance between the communicating devices, the presence of obstacles, radio wave conditions and the type of equipment.
- Yamaha does not guarantee all wireless connections between this unit and devices compatible with Bluetooth function.

Trademarks

AirPlay, iPad, iPhone, iPod, iPod touch, and iTunes are trademarks of Apple Inc., registered in the U.S. and other countries.

AirPlay works with iPhone, iPad, and iPod touch with iOS 4.3.3 or later, Mac with OS X Mountain Lion or later, and Mac and PC with iTunes 10.2.2 or later. (as of August, 2015)

DLNA[™] and DLNA CERTIFIED[™] are trademarks or registered trademarks of Digital Living Network Alliance. All rights reserved. Unauthorized use is strictly prohibited.





CERTIFIED

The Wi-Fi CERTIFIED logo is the certification mark of Wi-Fi Alliance.

The Wi-Fi Protected Setup Identifier Mark is a mark of Wi-Fi Alliance.

Wi-Fi, Wi-Fi Alliance, Wi-Fi CERTIFIED, Wi-Fi Protected Setup, WPA and WPA2 are trademarks or registered trademarks of Wi-Fi Alliance.

Bluetooth°

 $\textit{Bluetooth}^{\circ}$ word mark and logos are registered trademarks owned by Bluetooth SIG, Inc. and any use of such marks by Yamaha Corporation is under license.

Bluetooth protocol stack (Blue SDK)

Copyright 1999-2014 OpenSynergy GmbH All rights reserved. All unpublished rights reserved.

Explanations regarding GPL

This product utilizes GPL/LGPL open-source software in some sections. You have the right to obtain, duplicate, modify, and redistribute this open-source code only. For information on GPL/LGPL open source software, how to obtain it, and the GPL/LGPL license, refer to the Yamaha Corporation website (http://download.yamaha.com/sourcecodes/musiccast/).

Windows™

Windows is a registered trademark of Microsoft Corporation in the United States and other countries

Internet Explorer, Windows Media Audio, and Windows Media Player are either registered trademarks or trademarks of Microsoft Corporation in the United States and/or other countries

Android™

Android and Google Play are trademarks of Google, Inc.

MusicCast

MusicCast is a trademark or registered trademark of Yamaha Corporation.

AVEEA71102A



Important Notice: Guarantee Information for customers in EEA* and Switzerland

For detailed guarantee information about this Yamaha product, and Pan-EEA* and

Switzerland warranty service, please either visit the website address below (Printable file is available at our website) or contact the Yamaha representative office for your country. * EEA: European Economic Area

http://europe.yamaha.com/warranty/



© 2015 Yamaha Corporation

YAMAHA CORPORATION Printed in Malaysia ZU83020