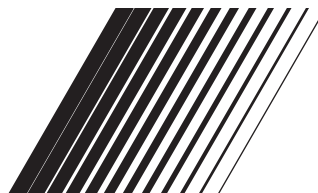
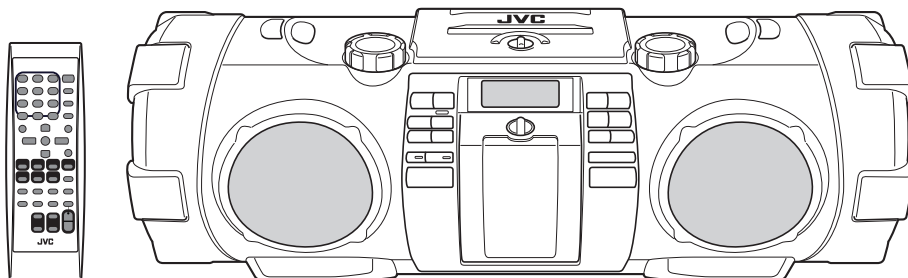


JVC



POWERED WOOFER CD SYSTEM RV-NB90B



MP3/WMA

Made for
iPod iPhone



INSTRUCTIONS

For customer use:

Enter below the Model No.
and Serial No. which are
located either on the rear,
bottom or side of the cabinet.
Retain this information for
future reference.

Model No.

Serial No.

LVT2347-002A

[J]

Introduction

Auto power save function

When no operation is done in certain situations for 30 minutes, the System turns off automatically. This function is on at the initial setting. For details, refer to "Auto power save mode." (page 11)

In this manual...

- The remote control buttons are used for explaining the operations unless mentioned otherwise. However, if the System has buttons with the same or similar names, they can also be used for the operations.
- In this manual, "iPod" means iPod, iPod touch and iPhone device. When iPod touch or iPhone device is specifically referred to, "iPod touch" or "iPhone" is used.
- In this manual, "file" and "track" are used interchangeably.

Notes on using the System

- Do not leave the front door open.
- Do not press down on the front door when it is open as the System could fall and possibly cause an injury.

Notes on installation

- Select a place which is level, dry and neither too hot nor too cold—between 5°C and 35°C (41°F and 95°F).

Caution: Proper Ventilation

To avoid risk of electric shock and fire, and to prevent damage, locate the apparatus as follows:

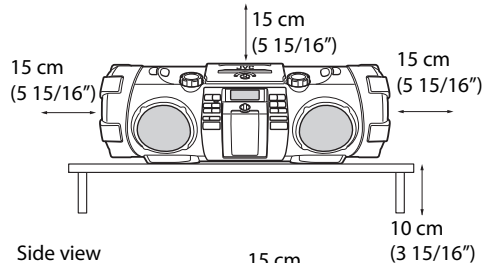
- 1 Front:
No obstructions and open spacing.
- 2 Sides/ Top/ Back:
No obstructions should be placed in the areas indicated by the dimensions in the illustration below.
- 3 Bottom:
Place on a level surface. Maintain an adequate air path for ventilation by placing on a stand with a height of 10 cm or more.

Attention: Aération correcte

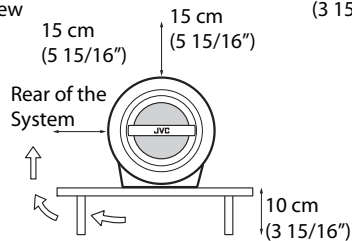
Pour prévenir tout risque de décharge électrique ou d'incendie et éviter toute détérioration, installez l'appareil de la manière suivante:

- 1 Avant:
Bien dégagé de tout objet.
- 2 Flancs/ Dessus/ Arrière: Aucun obstacle ne doit être placé dans les zones indiquées par les dimensions dans l'illustration.
- 3 Dessous:
Posez l'appareil sur une surface plane et horizontale. Veillez à ce que sa ventilation correcte puisse se faire en le plaçant sur un support d'au moins dix centimètres de hauteur.

Front view



Side view



Rear of the System

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Preparation

Accessories

Check that you have all the following items, which are supplied for the system.

- Power cord (1)
- Remote control (1)
- Shoulder strap (1)
- Buckle (2)
- Stopper (2)

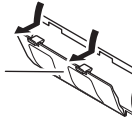
If any of these items are missing, contact your dealer immediately.

Inserting batteries

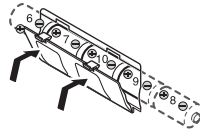
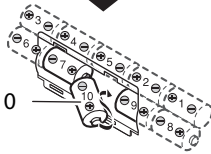
Main unit

Match the polarities (+ and -) of the batteries.

Battery compartment



R20 (SUM-1)/D (13D) x 10
(not supplied)

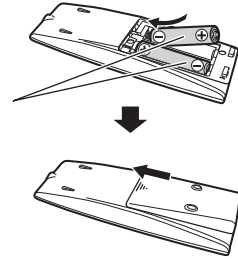


Remote control

Match the polarities (+ and -) of the batteries.



R6P (SUM-3)/AA (15F)
(not supplied)



- If the range or effectiveness of the remote control decreases, replace the batteries.

NOTE

- Store the battery in a place where children cannot reach. If a child accidentally swallows the battery, consult a doctor immediately.
- The power will not be supplied through the batteries when the power is supplied through the AC outlet on the System.
- The battery is consumed more quickly than usual when operating the System continuously or operating it in a cold place.
- When the power is supplied using the batteries, the display will be blank and STANDBY indicator will turn off when the System is turned off (on standby).

CAUTION

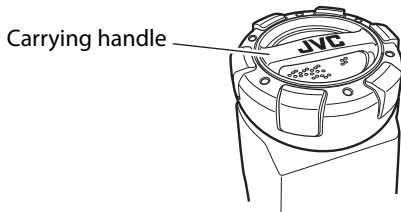
To avoid battery leakage or explosion, handle batteries properly.

- If you are not going to use this System for a month or more, remove the batteries from the battery compartment.
- Dispose of batteries in the proper manner, according to federal, state, and local regulations.
- Do not mix with batteries of different types or with new and old ones.
- Do not attempt to charge any batteries other than rechargeable ones.
- Discard leaky batteries immediately. Battery leakage can cause skin burns or other personal injuries.
- If chemicals leak onto the System, clean the System completely.

Carrying the System

Using the carrying handles

Be sure to hold both handles when you carry the System.
If you carry the System by only one handle, the other end may drag on the ground and be damaged.

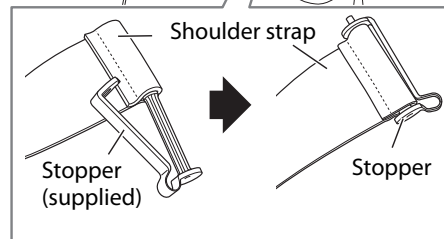
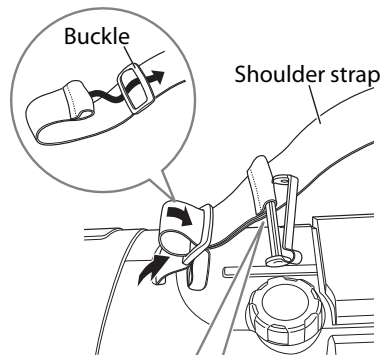
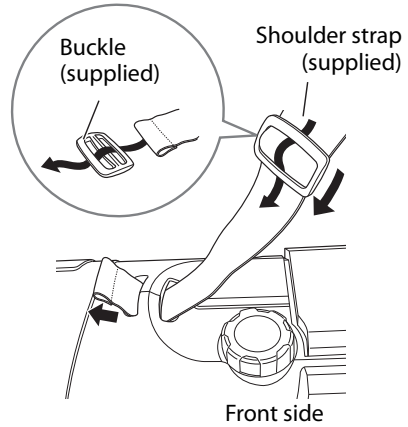


NOTE

- Remove a disc, USB device or iPod from the System.
- Disconnect all the cords from the System.
- The System is not waterproof or dust proof.

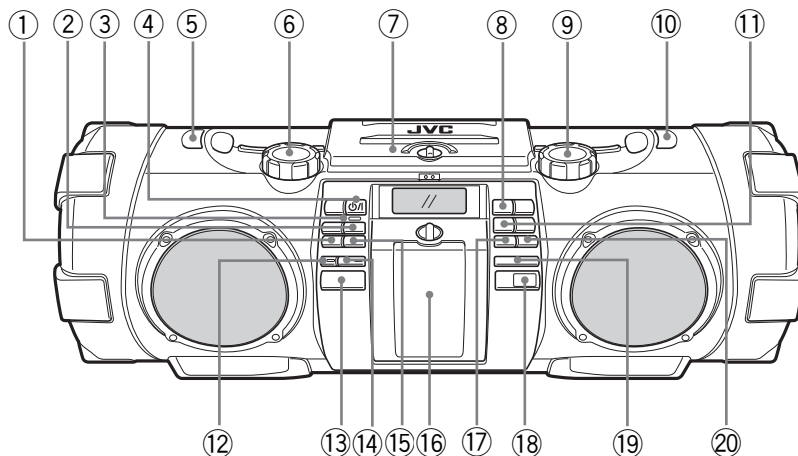
Using the shoulder strap

Attach the supplied shoulder strap (adjustable in length) to each end of the System as illustrated below.



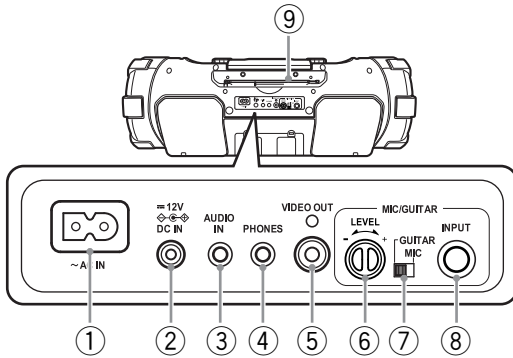
Index of parts and controls

Front of the System



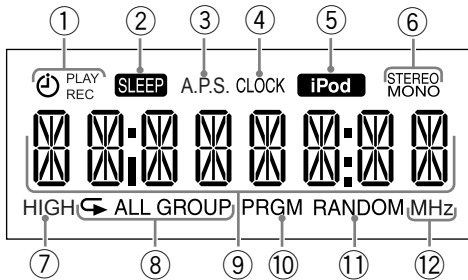
- ① TUNER/AUDIO IN button
- ② USB ►/|| button
- ③ STANDBY indicator
- ④ STANDBY/ON ⏻/I button
- ⑤ Shoulder strap hook
- ⑥ SUPER WOOFER VOLUME +/-
DISTORTION LEVEL +/-
- ⑦ Disc compartment door
- ⑧ iPod ►/|| button
- ⑨ VOLUME +/-
- ⑩ Shoulder strap hook
- ⑪ CD ►/|| button
- ⑫ REC button/REC indicator
- ⑬ USB connector/cover
- ⑭ Bluetooth PAIRING button/Bluetooth indicator
- ⑮ METRONOME ►/|| button
- ⑯ Connector for iPod/Front door
- ⑰ I◀◀/TEMPO - button
- ⑱ Remote control sensor
- ⑲ ■ button
- ⑳ ►►/TEMPO + button

Rear of the System



- ① AC IN jack
- ② DC IN jack
- ③ AUDIO IN jack
- ④ PHONES jack
- ⑤ VIDEO OUT jack
- ⑥ LEVEL +/-
- ⑦ GUITAR/MIC switch
- ⑧ INPUT jack
- ⑨ FM telescopic antenna

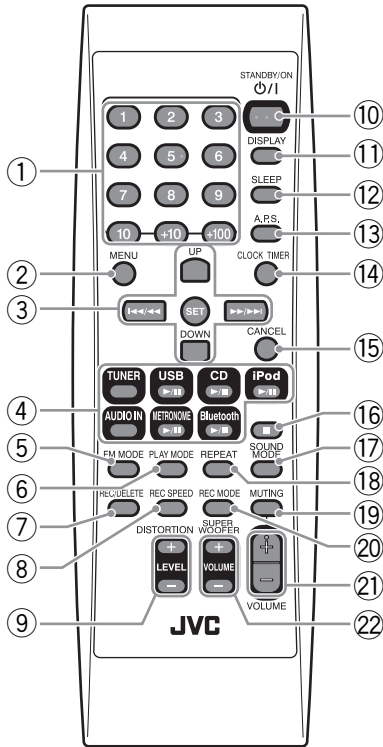
Display window



- ① Timer indicators
⏻ (timer), PLAY, REC
- ② SLEEP indicator
- ③ A.P.S. (auto power save) indicator
- ④ CLOCK indicator
- ⑤ iPod indicator
- ⑥ FM mode indicators
STEREO, MONO
- ⑦ HIGH indicator
- ⑧ Repeat indicators
↺, ↻, ↷
- ⑨ Main display
- ⑩ PRGM (program) indicator
- ⑪ RANDOM indicator
- ⑫ Frequency unit indicator

Index of parts and controls

Remote control

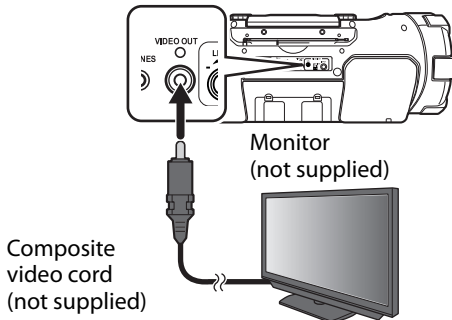


- ① Number buttons (pages 12, 13)
- ② MENU button (page 17)
- ③ Multi control buttons (pages 12-21, 23-25)
 - UP, DOWN
 - ◀◀/◀◀, SET, ▶▶/▶▶
- ④ Source buttons (pages 12-21, 23)
 - TUNER, USB ▶/■, CD ▶/■, iPod ▶/■, AUDIO IN, METRONOME ▶/■, Bluetooth ▶/■
- ⑤ FM MODE button (page 12)
- ⑥ PLAY MODE button (pages 15, 17)
- ⑦ REC/DELETE button (pages 23, 24)
- ⑧ REC SPEED button (page 23)
- ⑨ DISTORTION LEVEL +/- buttons (page 22)
- ⑩ STANDBY/ON ◻/I button (page 10)
- ⑪ DISPLAY button (page 11)
- ⑫ SLEEP button (page 25)
- ⑬ A.P.S. (auto power saving) button (page 11)
- ⑭ CLOCK/TIMER button (pages 10, 25, 26)
- ⑮ CANCEL button (pages 10, 15, 25, 26)
- ⑯ ■ button (pages 15, 21-23)
- ⑰ SOUND MODE button (page 11)
- ⑱ REPEAT button (pages 15, 17)
- ⑲ MUTING button (page 11)
- ⑳ REC MODE button (page 23)
- ㉑ VOLUME +/- buttons (page 10)
- ㉒ SUPER WOOFER VOLUME +/- buttons (page 10)

Connections

Connecting a monitor display

In order to view picture/video from iPod on a monitor display, connect a monitor display using a composite video cord (page 17).



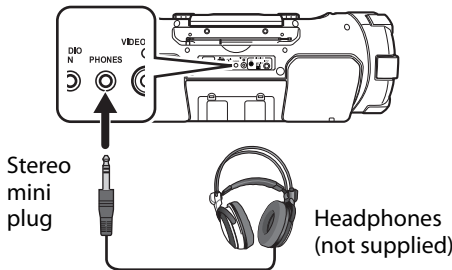
Connecting headphones

Be sure to turn down the volume before connecting or putting on the headphones.

- Connecting the headphones deactivates the speakers.

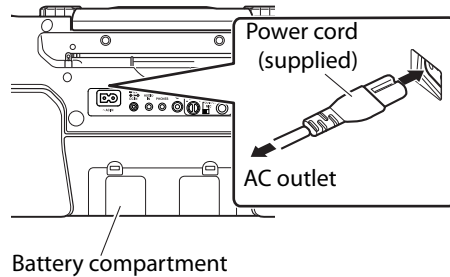
NOTE

If iPod is selected as the source, no sound is heard from headphones.



Connecting the power cord

Connect the power cord to a wall outlet only after all other connections have been made.



Unplug the AC power cord from the System to supply the power through the batteries in the battery compartment; otherwise, the System does not work.

NOTE

- The power can also be supplied through the batteries (page 4).
- When the System is turned off using the STANDBY/ON button, the standby mode is activated and the STANDBY lamp lights in red.
- A small amount of power is always consumed even while on standby.

CAUTION

- Only use JVC power cord provided for this System to avoid malfunction or damage to the System.
- Remove all the batteries when using the power cord.
- Be sure to unplug the power cord from the outlet when going out or when the System is not in use for an extended period of time.

Basic operations


Turning on the System

Press **STANDBY/ON** .



The STANDBY lamp goes off.
Press the button again to turn off the System.

NOTE

When the power is supplied using the batteries, the System is turned on by pressing  or source buttons on the main unit. You cannot turn on the System using the remote control.

Setting the Clock

1. Press **CLOCK/TIMER** repeatedly* to select the clock.



* When setting for the first time, press **CLOCK/TIMER** once.

2. Press **UP** or **DOWN** to adjust the hour.
 - When you press and hold the button, the hour digit changes continuously.
3. Press **SET**.
4. Repeat 2 and 3 to adjust the minute.
 - To go back to the hour setting, press **CANCEL**.

Displaying the clock

Press **DISPLAY**.



- Each time you press the button, the clock and normal indicator changes alternately.

NOTE

- About two hours after you disconnect the AC power cord, the set time will be reset.
- When the power is supplied through the batteries, the clock does not appear on the display when the System is turned off.

Getting started

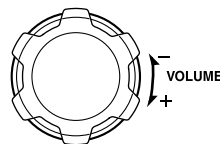
To adjust the volume

You can adjust the volume level between MIN, 1 to 29, MAX.

Remote control



Main unit



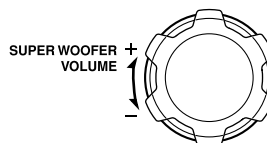
To adjust the super woofer volume

You can adjust the super woofer volume level between BASS 1 and BASS 6.


Remote control



Main unit



NOTE

If you have adjusted the distortion effect before, press and hold  to change to super woofer volume adjustment (page 22).

To turn off the sound temporarily

Press **MUTING**.

To restore the sound, press **MUTING** again or adjust the volume.



Sound mode

Sound modes can be selected to enhance the type of music being played.

Press **SOUND MODE** to select the sound mode.



Each time you press the button, the sound mode changes as follows:

BEAT: Select this for music with a heavy beat, such as rock and dance music.

POP: Select this for light music including popular and vocal music.

CLEAR: Select this for crisp and clear sounding music.

FLAT: Select this to cancel the sound mode.

NOTE

The sound mode setting also affects the sound through the headphones.

Auto power save mode

Each time you press **A.P.S.**, the auto power save function switches on and off.

This function is on at the initial setting.



A.P.S.

If no operation is performed for 30 minutes in the following situations, the System turns off automatically. Before the System turns off, "A.P.S." blinks on the display.

- The volume level is set to MIN or Muting is activated.
- CD, USB or METRONOME is selected as the source, playback is stopped, and no microphone or guitar is connected.
- iPod, Bluetooth or USB is selected as the source, no device is connected, and no microphone or guitar is connected.

Display information

Each time you press the button, the display information switches depending on the source.



FM

Listening to FM stations

1. Press TUNER repeatedly to select "FM."

Remote control



Main unit



(Press repeatedly)



2. Select the station.



- Press and hold or to change the frequency continuously until a station of sufficient signal strength is tuned in.

Adjusting the antenna

Adjust the FM telescopic antenna's length, angle and direction until the best reception is obtained.

To preset stations

You can preset up to 30 FM stations manually.

1. Tune in to a station you want to preset.

2. Press SET.



3. Use the number buttons to select the preset number you want to store.

4. Press SET to store the station.

To tune in to a preset station



Each time you press the button, you can select a preset station.

- You can select the preset station directly using the number buttons.

To improve the FM reception

When an FM stereo (FM) broadcast is hard to receive or noisy, select the monaural reception (MONO) mode.

Press FM MODE.



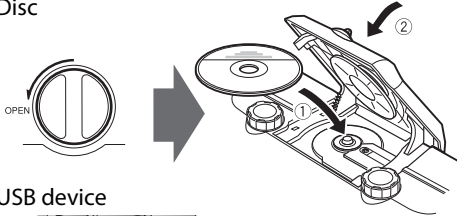
- To restore stereo reception, press FM MODE again.

Playing back a disc/USB device

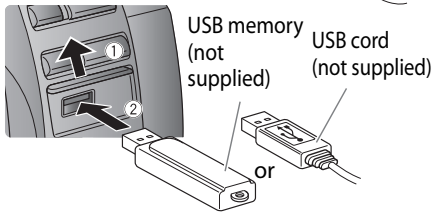
Preparation

Load a disc or connect a USB device.

Disc



USB device



Playback

Press **CD ►/II** or **USB ►/II**.



or



Display during playback

10 0:45

Current track number Playback time

To stop playback

Press **■**.



To pause

Press **CD ►/II** or **USB ►/II**.

- To cancel pause, press the button again. Playback continues from the point where it was paused.

To select a track

Press **◀◀/◀◀** or **▶▶/▶▶**.



- Press **▶▶/▶▶** once to skip to the beginning of the next track.
- Press **◀◀/◀◀** to skip to the beginning of the track being played. Press **◀◀/◀◀** twice quickly to skip to the beginning of the previous track.

To select a track using the remote control

Examples:

- To select number 5, press 5.
- To select number 15, press +10 then 5.
- To select number 20, press +10 once, then 10.
- To select number 125, press +100, +10, +10 then 5.

To fast forward/reverse

Press and hold **◀◀/◀◀** or **▶▶/▶▶** during playback.

Playing back a disc/USB device

To select a group (for MP3/WMA)

Press **UP** or **DOWN**.



- Press UP to skip to the next group.
- Press DOWN to skip to the previous group.

NOTE

- When you have stopped playback of an MP3/WMA file by pressing ■, pressing ►/|| will start playback from the beginning of the stopped file (Resume playback).
- To cancel the Resume playback, press ■ when playback is stopped.
- Resume playback is canceled in the following situations:
 - when program playback is activated
 - when the disc compartment door is opened
 - when another source is selected

Program playback


You can program up to 32 tracks from a disc or a USB device in any desired order including the same tracks.

NOTE

- While making a program, you cannot specify a group number to select a track.

1. Press **CD ►/||** or **USB ►/||**.
2. Press **■** to stop playback.
3. Press **PLAY MODE**.



4. Press the number buttons to select the track to program.
 5. Press **SET**.
- 
6. Repeat step 4 and 5 to select other tracks for the program.
 7. Press **CD ►/||** or **USB ►/||**. Playback starts.

To confirm the programmed tracks

While program playback is stopped, press **UP** or **DOWN** repeatedly.

The tracks in the program will successively appears on the display in the programmed order.

- To add a track to the end of the program, press the number buttons to select the track and then press SET.

To delete tracks in the program

While program playback is stopped, press **CANCEL**.

- Each time you press the button, the last track in the program is erased.
- The program is cleared in the following situations:
 - when the power is turned off
 - when the disc compartment door is opened
 - when the USB device is disconnected
 - when another source is selected
 - when program mode is exited

To exit from the program playback

While stopped, press **PLAY MODE**.

The "PRGM" indicator goes off.

Random playback

You can play all the tracks, on the disc or USB device in random order.

Press **PLAY MODE** to select "RANDOM" during playback.

10 0:45
RANDOM

- During random playback, you cannot go back to the previous track even by pressing **◀◀/◀◀** repeatedly.

To exit from the random mode

Press **PLAY MODE** during random playback.

The "RANDOM" indicator goes off.

- Random playback is also canceled when you stop playback.

Repeat playback

You can repeat a track or tracks on the disc or USB device as many times as you like.

Press **REPEAT**.

Each time you press the button, the play mode changes as follows:

NOTE

- If pressed during random playback, random playback is canceled.

For CD:

◀ → ◀ALL → canceled → (back to the beginning)

- ◀: Repeats the current track.
- ◀ALL: Repeats all the tracks on the disc.

For MP3/WMA files:

◀ → ◀GROUP → ◀ALL → canceled → (back to the beginning)

- ◀: Repeats the current track.
- ◀GROUP: In normal play mode, repeats all the tracks in a group.
- ◀ALL: Repeats all the tracks on the disc or USB device.

NOTE

- During program playback, only ◀ and ◀ALL can be selected.

iPod

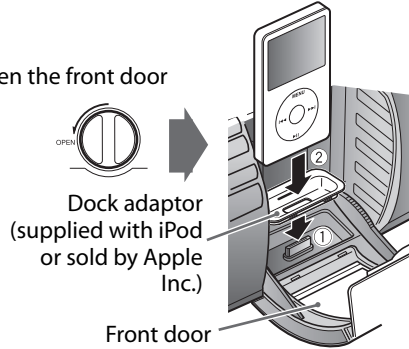
You can operate iPod through the System.
See page 29 for playable iPod devices.

NOTE

- JVC is not responsible for any loss of or damage to iPod that might result from the use of this System.
- Do not connect or disconnect iPod when the System is turned on.
- Do not carry the System with iPod connected. It might cause damage to the dock or you might drop iPod.
- iPod is charged through the dock when the System is turned on. (When the power is supplied through the batteries, iPod is charged only when iPod is selected as the source.)
- Depending on the type of iPod, iPod may operate differently.
- Depending on the type of iPod, you can operate the menu only on the screen of iPod.
- Operate iPhone or iPod touch itself in the following cases:
 - When operating the home button.
 - When selecting application icons on the home screen.
 - When dragging the slider.
- Sound distortion may occur when playing back audio sources with high recording levels. If distortion occurs, it is recommended to turn off the equalizer of iPod.
- For information on operating iPod, see the instruction manual for iPod.
- Take the protect case of iPod off before connecting.
- Connect iPod firmly.
- Keep iPod in a straight position while connecting/disconnecting it.
- Do not touch or hit the terminal pins of iPod or connector pins in the dock for iPod directly. Doing so might cause damage to the connector pins.
- You cannot send any data to iPod from the System.

Connecting iPod

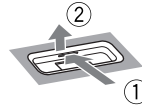
Open the front door



NOTE

- It is not necessary to use the dock adaptor for some iPod models (iPod nano 6th generation, etc.).

To detach the dock adaptor



- Pull up the dock adaptor with your fingernail or a sharp pointed tool inserted to the slot.
- Be careful not to injure your fingertips or damage the terminal of the dock.

Playback

Press iPod ►/II.



Each time you press the button, playback is started/paused.



To select a track

Press ◀◀/◀◀ or ▶▶/▶▶.



- Press ▶▶/▶▶ once to skip to the beginning of the next track.
- Press ◀◀/◀◀ to skip to the beginning of the track being played.
Press ◀◀/◀◀ twice quickly to skip to the beginning of the previous track.

To fast forward/reverse

Press and hold ◀◀/◀◀ or ▶▶/▶▶ during playback.

Shuffle playback

You can play the tracks on iPod in random order.

Press **PLAYMODE**.

Each time you press the button, the shuffle mode turns on/off.

Repeat playback

Press **REPEAT**.

Each time you press the button, the repeat mode changes.

To exit from the repeat mode

Press **REPEAT** repeatedly until the repeat mode is cancelled.

iPod menu operation

1. Press **MENU** to display the menu.

Each time you press the button, the previous menu is displayed.



2. Press **UP** or **DOWN** to select an item.

3. Press **SET**.

Viewing video/picture of iPod

While the System is turned off..

Press and hold iPod ►/II.

Main unit



iPod

VOUT OFF

Each time you press the button, the indicator changes alternately as follows:

- **VOUT ON**: View video/picture from iPod on the monitor.
- **VOUT OFF**: View video/picture on iPod.

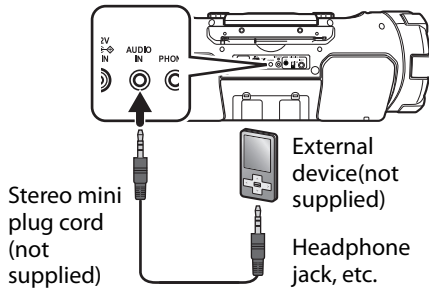
NOTE

- You can change the setting only on the main unit.
- You cannot change the setting when the power is supplied through the batteries.

External device

Listening to an external device

1. **Set the volume level of the System to minimum.**
2. **Connect the external device.**
Refer also to the instruction manual for the external device.



3. **Press AUDIO IN to select "AUDIO IN."**

Remote control



Main unit



(Press repeatedly)

4. **Start playback of the external device.**
5. **Adjust the volume of the System and of the external device.**

Adjusting the audio input level

Adjust the audio input level when the volume of the external device is too low compared to other sources.

When AUDIO IN is selected as the source, press SET.



Each time you press the button, the input level changes as follows:

LEVEL1 → LEVEL2 → LEVEL3 → (back to the beginning)

A higher number indicates a greater increase in input level.

The initial setting is "LEVEL 3."

Metronome

Using the metronome function

You can use the System as a metronome. You can set the tempo and rhythm separately for your guitar practice, etc.

1. Press **METRONOME** ►/II.



Rhythmical beeps are emitted from the speakers.

Each time you press the button, beeps are started/paused.

The beeps are also canceled when you press ■.

2. Press ◀◀/◀◀ or ▶▶/▶▶ to select the tempo.

- You can select the tempo from 30 to 250.

T120 B4

tempo beat

3. Press **UP** or **DOWN** to select the rhythm.

- You can select from 1 to 7 beat.

Bluetooth

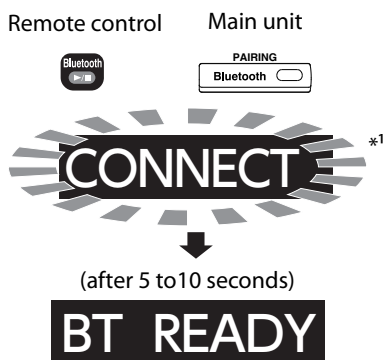
You can listen to music from a Bluetooth device through the System.

NOTE

- In order to use these functions, the device must be compatible with AVRCP and A2DP profiles.
- Some Bluetooth devices may not be available to the System.

Registering a Bluetooth device for the first time

1. Turn the System on.
2. Press Bluetooth ►/II.



- While "CONNECT" is blinking, you cannot perform any operations the System except for turning the System off.

3. Perform the pairing operation on the target Bluetooth device.

For information on operating the target Bluetooth device, see the instruction manual for the Bluetooth device.

Select "RV-NB90" from the list.

When the target device requests the passkey during pairing operation, enter "0000."

The pairing is completed and the target Bluetooth device is connected to the System automatically. The Bluetooth indicator lights.

B T

4. Start playback of the target Bluetooth device.

The sound from the Bluetooth device is emitted from the System.

Playback may start automatically with some Bluetooth devices.

NOTE

- The pairing is necessary only when connecting for the first time.
- *1 The Bluetooth device last used will be connected automatically by turning on the Bluetooth function of the device while "CONNECT" blinks on the display window. To re-connect another Bluetooth device, operate the device to connect while "BT READY" appears on the display window.

To control the Bluetooth device from the System

operation	button
Play/Pause	Press Bluetooth ►/II. Each time you press the button, playback is started/paused.
Stop	Press ■.
Skip	Press I◀◀/◀◀ or ▶▶/▶▶I.
Fast Forward/Fast Rewind	Press and hold ◀◀/◀◀ or ▶▶/▶▶I.

Registering other Bluetooth devices

- 1. Press and hold Bluetooth for more than 2 seconds.**

Canceling of connection starts.

DISCONNECT

"BT READY" appears when the connection has been canceled.

- 2. Perform the pairing operation on the target Bluetooth device.**

For information on operating the Bluetooth device, see the instruction manual for the Bluetooth device.

Select "RV-NB90" from the list.

When the target device requests the passkey during pairing operation, enter "0000."

The pairing is completed and the Bluetooth device is connected automatically. The Bluetooth indicator lights.

Connecting a microphone/guitar

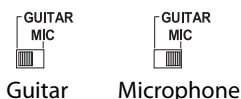
Microphone/guitar mixing

Using a microphone or a guitar, you can mix its sound with a source sound.

CAUTION

DO NOT connect a bass guitar to the MIC/GUITAR INPUT jack, as it may damage the System.

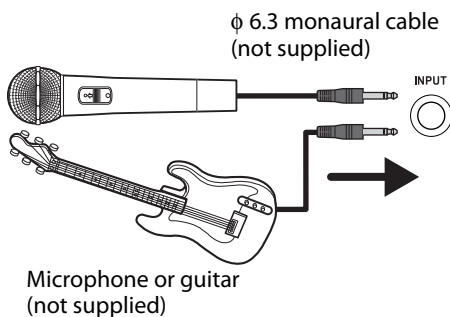
1. **Make sure the MIC/GUITAR selector switch on the rear of the System is properly set.**



2. **Turn the MIC/GUITAR LEVEL control fully counterclockwise.**



3. **Connect a microphone or a guitar to the MIC/GUITAR INPUT jack on the rear of the System.**



4. **Start playback of the source.**
5. **Turn the MIC/GUITAR LEVEL control to adjust the volume.**

Adding a distortion effect

You can add a distortion effect for a guitar. You can select the level from 0 (OFF) to 8.

NOTE

When you increase the level, the amount of noise also increases. This is due use of an analog circuit, and is not malfunction.

Using the remote control

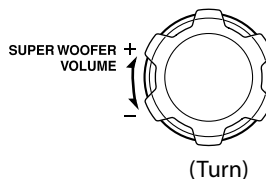
Press **DISTORTION LEVEL +** or **DISTORTION LEVEL -**.



D LVL 1

Using the main unit

1. **Press and hold ■ to select "D LVL".**
Each time you press and hold ■, the function changes between super woofer level ("SW VOL" appears on the display window) and distortion level ("D LVL" appears on the display window).
- 2.



Recording on a USB device

You cannot record sound while the sleep timer (page 25) is activated.

Recording discs

You can record a CD to a USB device in two ways, digital recording and analog recording. Generally, you can obtain better sound quality by using digital recording than by using analog recording.

However, by using analog recording, you can record sound from a microphone or guitar connected to the System at the same time (mixing recording).

Before recording, connect the USB device to the System.

NOTE

- Discs other than audio CD such as MP3/WMA discs cannot be recorded.
- The volume setting and sound mode have no effect on recording.
- You can not activate random playback or repeat playback during recording.
- The file is stored in MP3 format (bitrate: 192 kbps).
- Do not shake the System during the recording; otherwise the tracks might not be recorded properly.

To record an audio CD

1. Press **CD ▶/II**.
2. Press **■** to stop playback.
3. Press **REC SPEED** to select the recording speed.



HIGH

Each time you press the button, the speed switches between normal speed (NORMAL) and double speed (HIGH). If you want to listen to the music during recording, select normal speed.

- When you perform analog recording, this step is not necessary. (The songs are recorded at normal speed.)

4. Press REC/DELETE.

Remote control



Main unit



Digital recording starts from the first track to the last track.

- When you perform analog recording, press and hold REC/DELETE. "ANLG REC" blinks. While blinking, press REC/DELETE to start recording.

RECSTART

The REC indicator lights during the recording.

- In the "CD" folder in the "MUSIC" folder, a folder such as "CD001" is created where the music files are stored.
- Recording stops automatically when playback stops.
- To stop recording manually, press **■**.

Other recording

- To record from the current track to the last track, press **◀◀/◀◀** or **▶▶/▶▶** while stopped to select the track and then press REC/DELETE.
- To record only the current track, press REC/DELETE (for digital recording) or press and hold REC/DELETE (for analog recording) during playback.
- To record tracks in the programmed order, stop program playback (page 14) and then press REC/DELETE (for digital recording) or press and hold REC/DELETE (for analog recording).

Recording on a USB device

Recording other sources

You can record an FM broadcast, metronome or an external device.

You can divide a file according to the marking setting (see below).

You can record sound from a microphone or guitar connected to the System at the same time.

- The music files are stored in the appropriate folder ("FM", "AUDIO IN" and "METRONOME" folder) in the "MUSIC" folder.
- Recording stops automatically when the file size exceeds 2 GB (about 20 hours).

To select the marking setting

- You can select the way files are divided.
- Select the setting before recording.

Press REC MODE when TUNER (FM), AUDIO IN or METRONOME is selected as the source.



Each time you press the button, the setting changes.

MANUAL	divides a file when you press SET.
TIME	divides a file automatically every 5 minutes.

To record FM stations

1. Press TUNER.
2. Tune into the station you want to record.
3. Press REC/DELETE.

Remote control

Main unit



RECSTART

Recording starts.
The REC indicator lights while recording.

4. Press ■ to stop recording.

To record an external device

1. Press AUDIO IN.
Before recording, connect the external device to the System.
2. Press REC/DELETE.
Recording starts.
3. Start playback of the external device.
The REC indicator lights while recording.
4. Press ■ to stop recording.

To record the metronome

1. Press METRONOME.
Adjust the tempo and rhythm if necessary (page 19).
2. Press REC/DELETE.
Recording starts.
The REC indicator lights while recording.
3. Press ■ to stop recording.

Deleting a track

- You can delete a track recorded on a USB device.
- You can not restore deleted files.

1. Start playback of the track you want to delete.
2. Press REC/DELETE.



3. Press SET.
"DELETE" appears on the display window, and deleting starts.
"FINISH" appears when deleting is complete.

Using the timer

Setting the sleep timer

Press SLEEP.



Each time you press the button, the shut-off time (in minute) changes as follows:
10 → 20 → 30 → 60 → 90 → 120 → 150
→ 180 → OFF → (back to the beginning)

To check the remaining time until the System shuts off, press SLEEP once.

To cancel the sleep timer, press SLEEP repeatedly to select "OFF."

Setting the daily timer

Using the daily timer (Playback timer), you can wake up with your favorite music.

NOTE

- Set the clock before setting the daily timer (page 10).
- Tune into an FM station, load a disc, or connect a USB device/iPod to the System, and make sure that the source works properly beforehand.
- Preset the desired FM station before setting the daily timer (page 12).
- Daily timer does not work when the power is supplied through the batteries. Supply the power through an AC outlet.

1. Press CLOCK/TIMER repeatedly until the "PLAY TMR" appears on the display window.



2. Press CLOCK/TIMER again.



3. Press UP or DOWN to adjust the hour of the starting time.



- When you press and hold the button, the hour digit changes continuously.

4. Press SET.

5. Repeat 3 and 4 to adjust the minute of the starting time, the hour and minute of the finish time, and select the source and the volume.

- When FM tuner is selected as the source, select a preset number using UP or DOWN and then press SET.
- When CD or USB is selected as the source, select a track number using UP or DOWN and then press SET.

6. Press  to turn off the System.

- The daily timer works only when the System is turned off.
- While the timer is set, the timer indicator  lights up.
- While the timer is working,  flashes.
- Once set, the daily timer works every day.
- You can not set the same time for the starting time and finish time.

To go back to the previous step, press CANCEL.

To cancel the daily timer, press CANCEL after performing step 1.

To set the daily timer with the same settings again after canceling, press SET after performing step 1.

Using the timer

Setting the recording timer

You can set the recording timer for FM stations or an external device.

NOTE

- Set the clock before setting the recording timer (page 10).
- Check the reception of the FM station and the connection of the external device before setting the recording timer.
- Preset the desired FM station before setting the recording timer (page 12).
- Connect the USB device to the unit before setting the recording timer.
- The recording timer does not work when the power is supplied through the batteries. Supply the power through an AC outlet.

1. Press CLOCK/TIMER.

The "REC TMR" appears on the display window.



2. Press CLOCK/TIMER again.



3. Press UP or DOWN to adjust the hour of the starting time.

- When you press and hold the button, the hour digit changes continuously.

4. Press SET.

5. Repeat 3 and 4 to adjust the minute of the starting time, the hour and minute of the finish time, and select the source and the volume.

- When FM tuner is selected as the source, select a preset number using UP or DOWN and then press SET.

6. Press \odot /I to turn off the System.

- The recording timer works only when the System is turned off.
- While the timer is set, the timer indicator \odot REC lights up.
- While the timer is working, \odot REC flashes.
- The recording timer works only once. (However, the settings are stored on the System.)
- You can not set the same time for the starting time and finish time.

To go back to the previous step, press CANCEL.

To cancel the recording timer, after performing step 1.

To set the recording timer using the same setting again, after performing step 1.

Maintenance

To get the best performance of the System, keep your discs and mechanism clean.

Handling discs

- Remove the disc from its case by holding it at the edge while pressing the center hole lightly.
- Do not touch the shiny surface of the disc, or bend the disc.
- Put the disc back in its case after use.
- Be careful not to scratch the surface of the disc when placing it back in its case.
- Avoid exposure to direct sunlight, temperature extremes, and moisture.

Cleaning discs

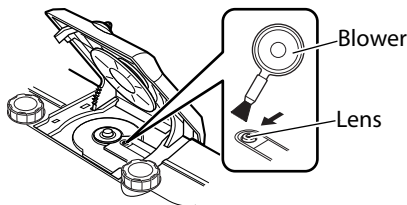
- Wipe the disc with a soft cloth in a straight line from center to edge.

Cleaning the System

- Stains should be wiped off with a soft cloth. If the System is heavily stained, wipe it with a cloth soaked in water-diluted neutral detergent and wrung well, then wipe clean with a dry cloth.
- Since the System may deteriorate in quality, become damaged or get its paint peeled off, be careful about the following:
 - DO NOT wipe it hard.
 - DO NOT wipe it with thinner or benzine.
 - DO NOT apply any volatile substances such as insecticides to it.
 - DO NOT allow any rubber or plastic to remain in contact for a long time.

Cleaning the CD pickup lens

- Keep the CD pickup lens clean, or the sound may be degraded. Use a blower (available at a camera store, etc.) to blow dust off the lens.




Trademarks

- Microsoft and Windows Media are either registered trademarks or trademarks of Microsoft Corporation in the United States and/or other countries.
- "Made for iPod" and "Made for iPhone" mean that an electronic accessory has been designed to connect specifically to iPod or iPhone, respectively, and has been certified by the developer to meet Apple performance standards. Apple is not responsible for the operation of this device or its compliance with safety and regulatory standards. Please note that the use of this accessory with iPod or iPhone may affect wireless performance.
- iPhone, iPod, iPod classic, iPod nano and iPod touch are trademarks of Apple Inc., registered in the U.S. and other countries.
- The Bluetooth® word mark and logos are registered trademarks owned by Bluetooth SIG, Inc. and any use of such marks by JVC KENWOOD Corporation is under license. Other trademarks and trade names are those of their respective owners.

About Discs/Files

Playable discs/files

Discs	AUDIO CD 	CD-R 	CD-RW 
Files	MP3/WMA		

- Some MP3/WMA files may not be played back and will be skipped. This results from their recording processes and conditions.
- When making MP3/WMA discs, use ISO 9660 Level 1 for the disc format.
- This system can play back MP3/WMA recorded at the following sampling frequency and bitrate.

Bitrate:	MP3	32 kbps – 320 kbps
	WMA	32 kbps – 320 kbps
Sampling frequency:		32 / 44.1 / 48 kHz

- This System cannot play “packet write” discs.
- This System cannot show the Tag data of MP3/WMA.
- This System can recognize up to 99 folders and 999 files on a disc, and up to 300 folders and 999 files on a USB device.

Important for USB mass storage class devices

For connecting/disconnecting:

- Disconnect the USB device after stopping playback. Disconnecting the USB device during recording/playback may cause some problem of the USB device and its files.
- When connecting with a USB cable, use a USB 2.0 cable less than 1 m in length.
- You cannot connect a computer to the USB MEMORY terminal of the System.
- Do not use a USB hub.
- When the power is supplied through the AC outlet and USB is selected as the source, the USB device is charged through the USB MEMORY terminal.
- Deactivate the security function of the USB device before connecting.

For playing back:

- The playing order of MP3/WMA files
 - Groups are played in creation order. In a group, tracks are played in recording order.
 - The playing order may change if you change a folder name or file name on the PC.
- You cannot play back a file larger than 2 Gigabytes.
- It is recommended to use USB mass storage class devices with 4 GB or less storage capacity.
- If your USB device is partitioned, only the first partition is recognized.
- Some USB devices may not be recognized or may not work properly.
- Copyrighted tracks (WMA-DRM tracks) cannot be played back on the System.
- Electrostatic shock at connecting a USB device may cause abnormal playback of the device. In this case, disconnect the USB device then reset this System and the USB device.
- JVC bears no responsibility for any loss of data on the USB mass storage class device while using this System.

Checking the type of your iPod

• Compatible iPod:

Made for	Audio	Video
iPod nano (6th generation)	✓	✓* ¹
iPod nano (5th generation)	✓	✓
iPod nano (4th generation)	✓	✓
iPod nano (3rd generation)	✓	✓
iPod nano (2nd generation)	✓	–
iPod touch (4th generation)	✓	✓
iPod touch (3rd generation)	✓	✓
iPod touch (2nd generation)	✓	✓
iPod touch* ²	✓	✓
iPod classic	✓	✓
iPhone 4S	✓	✓
iPhone 4	✓	✓
iPhone 3GS	✓	✓
iPhone 3G	✓	✓

*¹ Only for still pictures

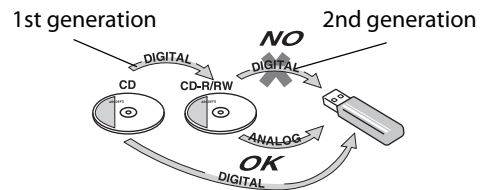
*² Only for software version 2.0.0 or later

- If iPod does not play correctly, update the software of iPod to the latest version.
- For details about updating iPod, check on the Apple web site <<http://www.apple.com/>>.

About SCMS (Serial Copy Management System)

The System uses the Serial Copy Management System which allows only first-generation digital copies to be made of premastered software such as regular CDs.

If you try to record from a duplicated CD-R or CD-RW onto a USB device, “SCMS ERR” appears on the display.



It should be noted that it may be unlawful to re-record pre-recorded tapes, records, or discs without the consent of the owner of copyright in the sound or video recording, broadcast or cable programme and any literary, dramatic, musical, or artistic work embodied therein.

Troubleshooting

If you are having a problem with your System, check this list for a possible solution before calling for service.

General

Power does not come on.

- ➔ No power is supplied. Check the power cord connection or change the batteries.

The System turns off automatically.

- ➔ Auto power save function is working.

Adjustments or settings are suddenly canceled before you finish.

- ➔ There is a time limit. Repeat the procedure.

While the power is supplied using the batteries, sound from the speakers is distorted or too quiet.

- ➔ Batteries are exhausted. Change the batteries.

Unable to operate the System from the remote control.

- ➔ The path between the remote control and the remote sensor on the System is blocked.
- ➔ The batteries are exhausted.

No sound is heard.

- ➔ Adjust the volume.
- ➔ Headphones are connected.

Disc/USB Mass Storage Class Device Operations

The disc/USB device does not play.

- ➔ The disc is placed upside down. Place the disc with the label side facing up.
- ➔ The disc is scratched or dirty.
- ➔ The disc is recorded with the "packet writing (UDF file unit)." It cannot be played. Check the files you want to play back.
- ➔ The USB device is not connected properly.

MP3/WMA groups and tracks are not played back as you expect.

- ➔ Playing order may change if you edit a file name on the PC.

The disc sound is discontinuous.

- ➔ The disc is scratched or dirty.

Sounds from USB device are interrupted.

- ➔ Noise and static electricity may stop the sound. In this case, disconnect and connect the USB device again after turning off the System.

iPod Operations

iPod does not play.

- ➔ Check the type of your iPod (page29).
- ➔ The battery of iPod is low or exhausted. Charge the battery of iPod.

Radio Operations

Hard to listen to broadcasts because of noise.

- ➔ The FM antenna is not properly extended and positioned.

Timer Operations

Daily timer does not start working.

- ➔ The System is turned on when the on-time comes. Timer starts working only when the System is turned off.

Bluetooth Operations

Unable to connect a Bluetooth device.

➔The device does not support A2DP.

A2DP profile is necessary to stream music data. Refer to the instruction manual of the Bluetooth device.

Unable to operate a Bluetooth device.

➔The device does not support AVRCP.

AVRCP profile is necessary to control the device through the System. Refer to the instruction manual of the Bluetooth device.

If the System does not work correctly after these procedures...

The System works using a built-in microprocessor. If buttons are not operative, disconnect the AC power cord from the wall outlet, wait for a while, then connect the cord again.

Specifications

Disc player

CD capacity:	1CD
Signal-to-noise ratio:	85 dB
Dynamic range:	90 dB

Tuner

FM tuning range:	87.5 MHz – 108.0 MHz
------------------	----------------------

Antenna:	Telescopic antenna
----------	--------------------

Bluetooth

Bluetooth version:	Bluetooth 2.1 + EDR certified
--------------------	-------------------------------

Output power:	Bluetooth power class 2
---------------	-------------------------

Service area:	max. 10 m (33 ft)*
---------------	--------------------

* Communication range may vary depending on the environmental conditions.

Frequency band:	2.4 GHz (2.4000 GHz – 2.4835 GHz)
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Bluetooth profile:	A2DP (Advanced Audio Distribution Profile), AVRCP (Audio/Video Remote Control Profile)
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General

Speakers:

• Full range:	8 cm (3 3/16") cone x 2 Speaker impedance: 16 Ω
• Super woofer:	13 cm (5 1/8") cone x 2 Speaker impedance: 7 Ω

Output power:	40 W
---------------	------

Input terminal

• USB MEMORY:

Playable files:
MP3, WMA

- Compatible with USB 2.0 Full-Speed.
- Compatible device: Mass storage class
- Compatible system: FAT16, FAT32
- Output power: DC 5 V \approx 500 mA

• Dock for iPod:

DC 5 V \approx 1 A

• AUDIO IN: Input Sensitivity / Impedance (1 kHz):

- ϕ 3.5
- LEVEL 1: 500 mV / 47 kΩ
- LEVEL 2: 250 mV / 47 kΩ
- LEVEL 3: 125 mV / 47 kΩ

• MIC/GUITAR:

- Switchable
- MIC: 200 Ω - 2 kΩ (ϕ 6.3)
- GUITAR: 100 kΩ - 1 MΩ (ϕ 6.3)
- DC 12 V, 2 A

• DC IN:

Output terminal


• PHONES:

- ϕ 3.5
- 32 Ω - 1 kΩ
- 15 mW / ch output into 32 Ω
- Composite

• VIDEO OUT (For iPod):

Power supply

- AC: AC 120 V \sim , 60 Hz
- DC: DC 15 V (R20 (SUM-1)/D (13D)-size batteries x 10)
External DC 12 V



Power consumption: When using an AC outlet
28 W (at operation)
Less than 0.50 W (on standby)
When using DC IN
2 A (power on mode)

Dimensions: 666 mm (26 1/4") x
235 mm (9 5/16")
x 240 mm (9 1/2")
(W/H/D)

Mass: Approx. 7.2 kg (15.9 lbs) (without batteries stored in the battery compartment)

Design and specifications are subject to change without notice.

Precautions

This equipment complies with FCC/IC radiation exposure limits set forth for an uncontrolled environment and meets the FCC radio frequency (RF) Exposure Guidelines in Supplement C to OET65 and RSS-102 of the IC radio frequency (RF) Exposure rules. This equipment has very low levels of RF energy that it deemed to comply without maximum permissive exposure evaluation (MPE). But it is desirable that it should be installed and operated keeping the radiator at least 20cm or more away from person's body (excluding extremities: hands, wrists, feet and ankles).

Cet équipement est conforme aux limites d'exposition aux rayonnements énoncées pour un environnement non contrôlé et respecte les règles les radioélectriques (RF) de la FCC lignes directrices d'exposition dans le Supplément C à OET65 et d'exposition aux fréquences radioélectriques (RF) CNR-102 de l'IC. Cet équipement émet une énergie RF très faible qui est considérée conforme sans évaluation de l'exposition maximale autorisée. Cependant, cet équipement doit être installé et utilisé en gardant une distance de 20 cm ou plus entre le dispositif rayonnant et le corps (à l'exception des extrémités : mains, poignets, pieds et chevilles).

(For Canada)

This device complies with Industry Canada license-exempt RSS standard(s). Operation is subject to the following two conditions: (1) this device may not cause interference, and (2) this device must accept any interference, including interference that may cause undesired operation of the device.

(Pour le Canada)

Le présent appareil est conforme aux CNR d'Industrie Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes: (1) l'appareil ne doit pas produire de brouillage, et (2) l'utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

(For U.S.A.) (Pour les États-Unis)

This transmitter must not be co-located or operated in conjunction with any other antenna or transmitter.

RV-NB90B | POWERED WOOFER CD SYSTEM

JVC



EN

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