Privia PX-S5000

USER'S GUIDE

Initial Setup

| Preparing a Power Supply | Turning Power On or Off | Using a Pedal | Using Headphones |

Playing the Digital Piano

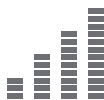| Selecting a Single Tone | Layering Two Tones | Splitting the Keyboard Between Two Tones | Using the Metronome |

| | Changing the Pitch | | Adding Depth to Notes |

| Specifying the Tempo | Changing the Pitch in Semitone Steps (Transpose) | Fine Tuning a Pitch (Tuning) | Using Chorus |

| Changing Sound Reverberation and Ambiance | Listening with Auto Playback | Recording Performances in Real-Time | |

| Using the Sound Mode Effects (Hall Simulator/Reverb and Surround) | Playing Songs from the Music Library | Using the MIDI Recorder to Record or Playback Performances | Using the Audio Recorder to Record Performances |

Connecting with a Smart Device

Using the Dedicated App

- When the Digital Piano is being operated on battery power only, notes may sound distorted when performing or playing back a song at maximum volume. This is due to the difference between AC adaptor power and battery power, and does not indicate Digital Piano malfunction. If you notice distortion, switch to AC adaptor power or lower the volume level.

CASIO®

Included and Optional Accessories

Use only accessories that are specified for use with this Digital Piano.
Use of unauthorized accessories creates the risk of fire, electric shock, and personal injury.

NOTE

• You can get information about accessories that are sold separately for this product from the CASIO catalog available from your retailer, and from the CASIO website.
https://support.casio.com/global/en/emi/manual/PX-S5000/

About Music Score data

You can download music score data as a PDF file from the CASIO website. You will then be able to view music scores on your smart device. You can jump from the PDF file table of contents directly to the music score you want, and you can print out scores as needed.
https://support.casio.com/global/en/emi/manual/PX-S5000/

Contents

Overview and Setup

General Guide

■ **Front Panel**
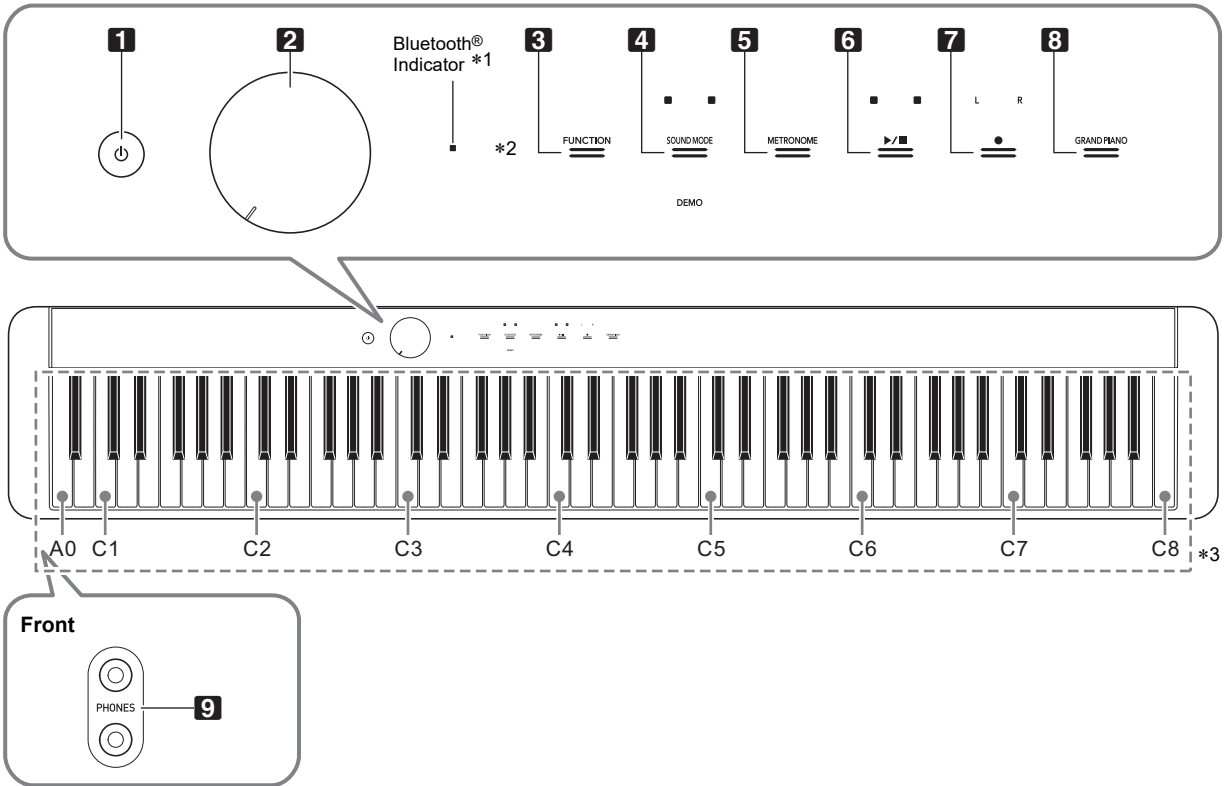
1 ⏻ (Power) button

2 Volume knob

3 **FUNCTION** button

4 **SOUND MODE** button

5 **METRONOME** button

6 ▶/■ button

7 ● (REC) button

8 **GRAND PIANO** button

9 **PHONES** jacks

*1 **Bluetooth Indicator**
Under initial default settings, turning on power without the Wireless MIDI & Audio Adaptor attached will cause the Bluetooth indicator to blink momentarily to inform you that the Wireless MIDI & Audio Adaptor is not attached.

*2 **Touch buttons**
Buttons 3 through 8 are touch buttons whose lights light when power is turned on.

*3 **Keyboard note names and pitches**
The keyboard note names and pitches used in this manual follow the international standard. Middle C is C4, the lowest C is C1, and the highest C is C8. The illustration below shows keyboard key note names from C4 through C5.
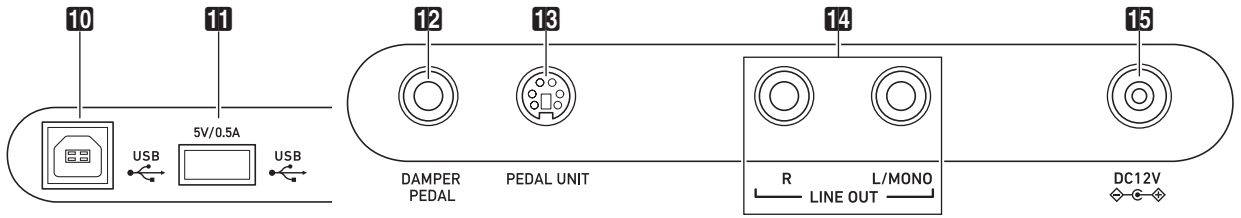
■**Back**

🔟 **USB** Type B port

⓫ **USB** Type A port

⓬ **DAMPER PEDAL** jack

⓭ **PEDAL UNIT** jack

⓮ **LINE OUT R**, **L/MONO** jacks

⓯ **DC 12V** terminal

■**Preparing the Music Stand**

Music stand
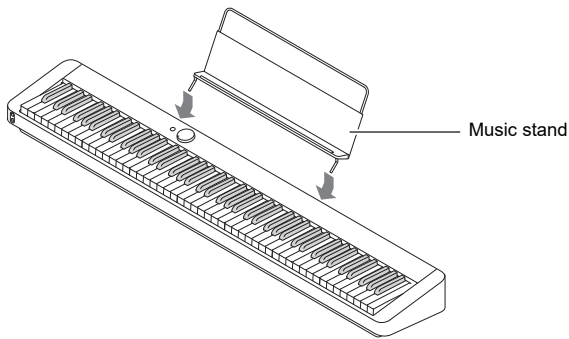
Preparing a Power Supply

Your Digital Piano uses an AC adaptor for power.

NOTE

• Though this Digital Piano supports battery operation, use of an AC adaptor is generally recommended.

■ Using the AC Adaptor

Make sure that you use only the AC adaptor specified for this Digital Piano. Use of a different type AC adaptor can cause smoking or malfunction.

Specified AC Adaptor: AD-A12150LW
(JEITA Standard plug)
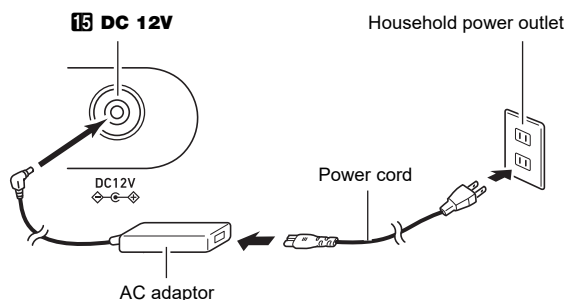
IMPORTANT!

• **Never connect the AC adaptor (JEITA Standard, with unified polarity plug) that comes with this Digital Piano to any other device besides this Digital Piano. Doing so creates the risk of malfunction.**
• **Be sure to turn off Digital Piano power before connecting or disconnecting the AC adaptor.**
• **The AC adaptor will become warm to the touch after very long use. This is normal and does not indicate malfunction.**

• **Note the important precautions below to avoid damage to the power cord.**

● **During Use**
 • Never pull on the cord with excessive force.
 • Never repeatedly pull on the cord.
 • Never twist the cord at the base of the plug or connector.

● **During Movement**
 • Before moving the Digital Piano, be sure to unplug the AC adaptor from the power outlet.

● **During Storage**
 • Loop and bundle the power cord, but never wind it around the AC adaptor.

• **Never insert metal, pencils, or any other objects into the product's DC12V terminal. Doing so creates the risk of accident.**
• **Do not try to use the power cord that comes with the product with another device.**
• **Plug the AC adaptor into a power outlet that is close to the Digital Piano. This lets you immediately unplug from the power outlet should any problem occur.**
• **The AC adaptor is intended for indoor use only. Do not leave it in a location where it can become wet. Also, do not place a vase or any other container of liquid on the AC adaptor.**
• **Make sure that the AC adaptor does not become covered with a newspaper, table cloth, curtain, or any other type of fabric.**
• **If you do not plan to use the Digital Piano for a long time, unplug the AC adaptor from the power outlet.**
• **The AC adaptor cannot be repaired. If your AC adaptor malfunctions or becomes damaged, you need to purchase a new one.**
• **AC Adaptor Usage Environment**
    Temperature: 0 to 40°C
    Humidity: 10% to 90%RH
• **Output Polarity:** ◇─ⓒ─◇

■ **Using Batteries**

⚠ IMPORTANT!

- **Be sure to turn off power before loading batteries.**
- **Use commercially available AA-size alkaline batteries or AA-size rechargeable nickel metal hydride batteries.**
- **Note the precautions below while the Digital Piano is turned upside down to load batteries.**
  - **– Take care to avoid injury due to pinching your fingers under the Digital Piano.**
  - **– Do not allow the Digital Piano to tip over or otherwise be subjected to strong impact. Impact can damage the volume knob and keyboard keys.**

Note the precautions below when using rechargeable batteries.
- Use Panasonic Group AA-size eneloop rechargeable batteries. Do not use any other type of batteries.
- Use only the specified charger to charge batteries.
- Rechargeable batteries must be removed from the product for charging.
- For information about using eneloop batteries or their specified charger, be sure to read the user documentation and precautions that come with each item, and use them only as directed.

Be sure to replace batteries at least once a year, even if there is no indication of low battery power. Dead rechargeable batteries (eneloop) in particular may deteriorate if they are left in the product. Remove rechargeable batteries from the product as soon as possible after they go dead.

1. **Open the battery cover on the bottom of the Digital Piano.**
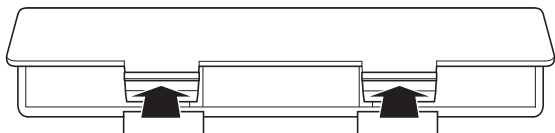
2. **Load six AA-size batteries into the battery compartment.**
Make sure the positive ⊕ and negative ⊖ ends of the batteries are facing as marked on the Digital Piano.

3. **Insert the tabs of the battery cover into the holes along the side of the battery compartment, and close the cover.**

Tabs
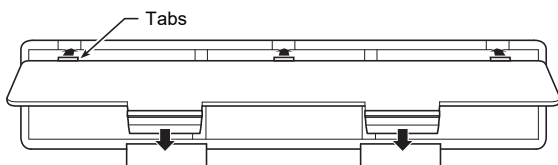
■ **Specifying the Battery Type**

1. **Turn on the Digital Piano.**
- See "Turning Power On or Off" (page EN-7).

2. **Specify the battery type by holding down the** ❸ **FUNCTION and pressing the F7 keyboard key.**
- One tone: Alkaline batteries
- Two tones: Rechargeable nickel metal hydride batteries*

* The volume and sound quality are adjusted to suit the battery characteristics.

■ **Low Battery Indicator**

Low power is indicated when the lights of all the touch buttons, except for the ❸ **FUNCTION**, start to flash. When this happens, try lowering the volume level. If this does not stop the flashing, replace the batteries with new ones.

⚠ IMPORTANT!

- **Using the Digital Piano while batteries are very low can cause it to turn off suddenly. This can cause data stored in Digital Piano memory to be corrupted or lost.**
- **Low battery power can cause abnormal operation. If this happens, replace batteries with new ones.**

Turning Power On or Off

1. **Before turning on power, rotate the 2 volume knob as far as it will go in the direction shown in the illustration below.**
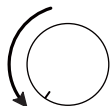
2. **Press the 1 ⏻ (Power) button to turn on power.**

Turning on power will cause the lights of the front panel touch button to light in sequence from left to right (3 **FUNCTION** to 8 **GRAND PIANO**). The Digital Piano is ready to play when all touch button lights are lit.
- After pressing 1 ⏻ (Power) to turn on power, do not press any pedal until the Digital Piano is ready to play (all touch buttons lit).
- Power may not turn on if you press the 1 ⏻ (Power) button too lightly. This does not indicate malfunction. If this happens, apply more pressure when you press the 1 ⏻ (Power) button.

3. **Use the 2 volume knob to adjust volume.**

4. **To turn off power, hold down the 1 ⏻ (Power) button until all lit touch button lights turn off.**

NOTE
- Pressing the 1 ⏻ (Power) button to turn off power actually puts the Digital Piano into a standby state. Minute amounts of current continue to flow within the Digital Piano in the standby state. If you do not plan to use the Digital Piano for a long time or if there is a lightning storm in your area, be sure to unplug the AC adaptor from the power outlet.
- Turning off power normally causes the tone number and other settings to return to their initial defaults. You can enable Auto Resume (page EN-45), which will save most settings when power is turned off.
- If Auto Resume is disabled, turning off power will initialize settings, except for tuning (page EN-17) and touch button luminosity (page EN-46), Battery type (page EN-46).

■ Power On Alert
After about six minutes of non-operation while the Digital Piano is being powered by its AC adaptor, the Power On Alert function will cause touch button lights to turn on and off sequentially to remind you that power is on. Button lights will return to normal (all button lights lit) if you touch a button, play something on the keyboard, or perform some other operation. To turn off power, hold down the 1 ⏻ (Power) button until all lit touch button lights turn off.

NOTE
- You can enable or disable the Power On Alert as required. See "Other Settings" (page EN-46).
- If you are using batteries to power the Digital Piano, power will turn off automatically after about six minutes of non-use. See "Auto Power Off" (page EN-7).

■ Returning to Initial Factory Defaults
You can use Factory Reset (Initialization) to return the Digital Piano's stored data and settings to their initial factory defaults any time you want. For more information, see "Factory Reset (Initialization)" (page EN-48).

Auto Power Off

This Digital Piano is designed to turn off automatically to avoid wasting power after no operation is performed for a preset amount of time. The Auto Power Off trigger time is about four hours when power is being supplied by the AC adaptor, or six minutes under battery power.
- You can disable Auto Power Off to ensure that power does not turn off automatically during a concert, etc. To disable Auto Power Off, perform the procedure below.

■ To enable or disable Auto Power Off

1. **While holding down 3 FUNCTION, press the B♭0 keyboard key.**

B♭0
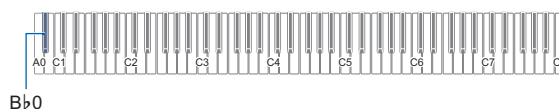
- Each press of the B♭0 keyboard key sounds a notification tone and toggles Auto Power off between enabled and disabled. For more information, see "Notification Tones" (page EN-11).

2. **After the setting is the way you want, release 3 FUNCTION.**

Using a Pedal

Connect the supplied pedal (SP-3) to the ⓬ **DAMPER PEDAL** jack.

Back

⓬ **DAMPER PEDAL** jack (Standard phone jack (TS phone))

SP-3
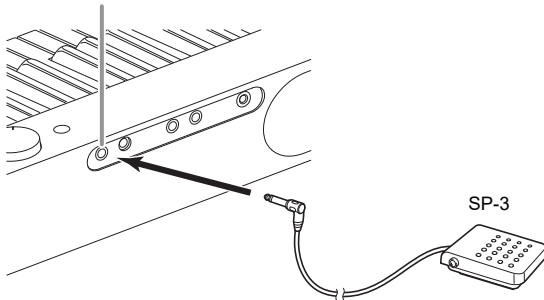
This pedal functions as a damper pedal under initial Digital Piano default settings. To change it to a different function (soft, sostenuto, etc.), see "Changing Pedal Functions" (page EN-45).

■ PEDAL UNIT Jack

You can connect the optionally available 3-Pedal Unit (SP-34) to the ⓭ **PEDAL UNIT** jack on the back of the Digital Piano. You can then use the pedals for expression that is similar to that available on an acoustic piano.

SP-34 Pedal Functions

● Damper Pedal

Pressing the damper pedal while playing will cause the notes you play to reverberate. The SP-34 pedal also supports half-pedal operation, so pressing the pedal part way applies only a partial damper effect.

● Soft Pedal

Pressing this pedal suppresses notes played on the keyboard after the pedal was pressed, and makes them sound softer.

● Sostenuto Pedal

Only the notes of the keys that are depressed when this pedal is pressed are sustained, even if the keyboard keys are released, until the pedal is released.

Soft Pedal ——— ——— Damper Pedal

Sostenuto Pedal
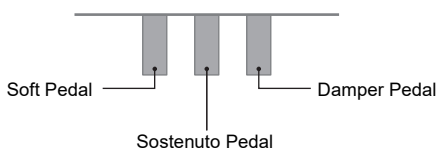
🔍 NOTE

• A separately available pedal unit can be used at the same time as the supplied pedal.

Using Headphones

Using headphones cuts off output from the built-in speakers, which means you can practice playing even late at night without disturbing others.

• Be sure to turn down the volume level before connecting headphones to the ⓽ **PHONES** jacks.

⓽ **PHONES** jacks
(Stereo mini phone jack (Mini TRS phone))
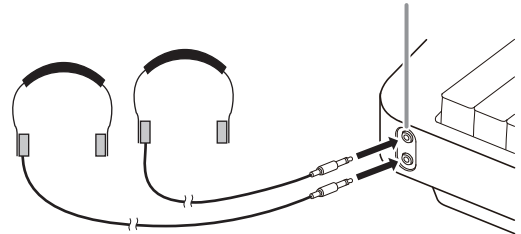
🔍 NOTE

• Headphones do not come with the Digital Piano.
• Use commercially available headphones. See page EN-1 for information about options.

🔔 IMPORTANT!

• **Do not listen to very high volume output over headphones for long period. Doing so creates the risk of hearing damage.**
• **If you are using headphones that require an adaptor plug, make sure you do not leave the adaptor plugged in when you unplug the headphones. If you do, nothing will sound from the speakers when you play.**
• **When connecting headphones to the ⓽ PHONES jacks, be sure to use a stereo mini phone plug (Mini TRS phone). Use of other types of plugs is not supported.**

■ To output from the speakers while headphones are connected

Enable the "Speaker Out" setting under "Other Settings" (page EN-46) to output sound from the speakers, even if a plug is plugged into either of the ⓽ **PHONES** jacks.

■ Using Headphone Mode

When "Headphone Mode" under "Other Settings" (page EN-46) is turned on, the sound quality of the Digital Piano's grand piano tone heard through headphones is automatically adjusted to reproduce the natural expanse of sound that you hear when playing an acoustic piano.

Using the Included Wireless MIDI & Audio Adaptor

To pair this product with a Bluetooth® wireless technology-capable external device, you need to plug the Wireless MIDI & Audio Adaptor into the Digital Piano's **11** **USB** Type A port.

Wireless MIDI & Audio Adaptor

11 **USB** Type A port
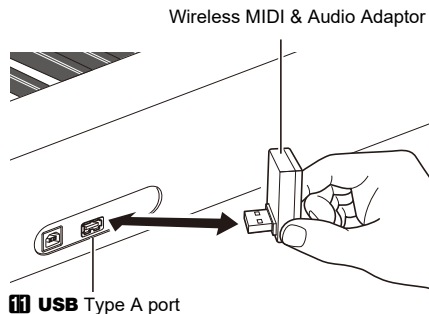
ⓘ IMPORTANT!

• **Turn off the Digital Piano before disconnecting the Wireless MIDI & Audio Adaptor.**

NOTE

• When connecting to an external Bluetooth audio-enabled device, see "Playing Audio from a Smart Device (Bluetooth Audio Pairing)" (page EN-49).
• When connecting to an external Bluetooth Low Energy MIDI-enabled device, see "Connecting to a Bluetooth Low Energy MIDI-enabled Device" (page EN-50).
• To use the dedicated app, see "Using the Dedicated App" (page EN-52).
• The Wireless MIDI & Audio Adaptor may not be sold in certain countries or geographic areas.

Operations Common to All Modes

ⓘ IMPORTANT!

• **Unless otherwise specifically noted, all of the procedures in this manual assume that the Digital Piano is in its initial power on state (immediately after you turn on power). If you run into problems with a procedure, turn Digital Piano power off and back on, and then try performing the procedure again.**
• **Note that turning off Digital Piano power during a procedure causes any pending unsaved data to be deleted.**

Touch Button Operations

Turning on Digital Piano power causes the lights of all of the front panel touch buttons to light.

ⓘ IMPORTANT!

• **When operating a touch button, touch it firmly with a bare finger. Touch buttons will not respond if you touch them while wearing gloves.**
• **If a touch button does not respond, perform the steps below to increase touch button sensitivity.**
  (1) Turn off the Digital Piano.
  (2) While holding down the C8 keyboard key (the one on the far right), press the 1 ⏻ (Power) button.
   • **Keep the C8 keyboard depressed until the touch buttons start to light in sequence from left to right (from 3 FUNCTION to 8 GRAND PIANO). You do not need to keep the 1 ⏻ (Power) button depressed.**

■ Touch Button Light Auto Off (Panel Light Setting)

To save power, you can configure a setting that will turn off all button lights, except for **3** **FUNCTION**, after a certain period of non-operation. You can specify the amount of non-operation time until lights turn off, or you can specify that lights should remain lit (initial default setting while the AC adaptor is connected). For information about how to configure these settings, see "To change the panel light setting" (page EN-47).

NOTE

• To turn the touch button lights back on, touch the **3** **FUNCTION**.
• Turning on the Digital Piano under battery power only (without AC adaptor power) will cause the Panel Light Setting to change automatically to 60 seconds to conserve power. You can change the Panel Light Setting if you want.
• Turning off the Digital Piano, connecting the AC adaptor, and turning power back on will automatically cause "Off" to be selected for the Panel Light Setting (if Auto Resume is disabled).

■ Touch Button Only Operations

Touching a button firmly and immediately releasing it will perform the operation assigned to the touch button.
For example, touching **8 GRAND PIANO** selects the GRAND PIANO CONCERT tone, while touching **5 METRONOME** starts (or stops) the metronome.

■ Touch Button + Keyboard Key Combinations

A number of different Digital Piano settings can be configured by using a touch button (except for the **7 ●** (REC) button) in combination with a keyboard key. As an example, the procedure shows how to select the JAZZ ORGAN tone.
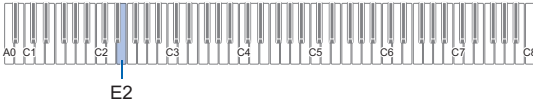
1. Hold down **8 GRAND PIANO**.

- Until you release **8 GRAND PIANO** in step 3 below, you can use keyboard keys to select tones and to configure other settings. For information about what operations you can perform while **8 GRAND PIANO** is depressed, See "Keyboard Function List" (page EN-65).

2. Press the E2 keyboard key.

This selects the JAZZ ORGAN tone and causes the confirmation tone to sound using the JAZZ ORGAN tone.

3. Release **8 GRAND PIANO**.

- Now you can play on the keyboard with the JAZZ ORGAN tone.

Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)

In Demo Play (page EN-11) and the Music Library (page EN-26), you can use the song selection keyboard keys (10-key) to select songs.

1. Hold down **6 ▶/■**.

- Do not release **6 ▶/■** until step 3, below.

2. Use keyboard keys C1 to A1 to input a song number.

- Input two digits for the song number.
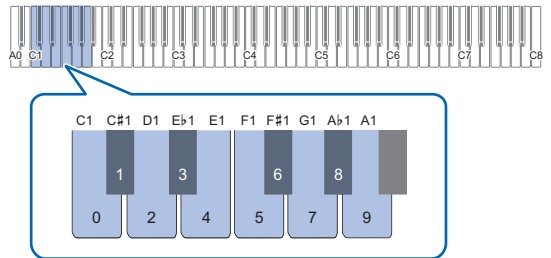
3. After entering the song number, release **6 ▶/■**.

Notification Tones

When you perform a touch button and keyboard key combination operation (page EN-10), a notification tone will sound when you press the keyboard key to let you know the result of the operation. Notification tone types are described below.

■ Notification Tone Types

This type of tone sounds:	When this happens:
Received tone	A keyboard key operation is received and applied. This tone sounds if a setting is enabled (turned on) when you press a keyboard key that toggles the setting between enabled and disabled.
Invalid tone	You press the wrong keyboard key. This tone lets you know the operation is invalid.
Upper limit, lower limit tone	You press a keyboard key that would cause the setting to become greater than the upper limit or less than the lower limit.
Initialization tone	Settings were returned to the initial defaults. This tone sounds when you press the plus (+) and minus (–) keyboard keys at the same time, etc.
Option tone	A setting option is changed by pressing a keyboard key that cycles through options. The number of times the tone sounds depends on the option that is selected.
Off tone	A setting is disabled (turned off).
Reference tone	As you use the plus (+) and minus (–) keyboard keys to change a setting value, a reference tone will sound to signal when the keyboard key operation result in certain types of values to be set. In the case of whole number (non-fraction) values, the reference tone will sound whenever the setting becomes one that is multiple of 10 (10, 20, etc.) In the case of fraction values (like 440.2), the reference tone will sound whenever the setting becomes a value that is a whole number (440, 441, etc.)
End tone	The final keyboard key was pressed for a setting operation that requires multiple keyboard key operations. For example, when you input a three-digit tempo setting, this tone will sound when you press the keyboard key for the third digit.

■ Notification Tone Sets

Your Digital Piano comes with three different notification tone sets from which you can choose. You can also disable notification tones, if you want. For information about how to change the notification tone set, see "Other Settings" (page EN-46).

Listening to Demo Play

1. Hold down ❸ FUNCTION.

This causes the DEMO light to flash, and the ❹ SOUND MODE light to turn light (and the lights of other buttons to turn off).

2. Touch ❹ SOUND MODE.

This will cause the ❻ ▶/■ and DEMO lights to light, and starts playback of the one demo song (and the lights of buttons except for ❻ ▶/■ to turn off). After demo song playback is complete, it will continue with playback of Music Library (page EN-26) songs.
  • The operations below are supported during demo play.
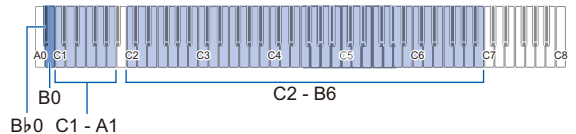
To do this:	Perform this operation:
Skip forward to the next song	While holding down ❻ ▶/■, press the B0 keyboard key.
Skip back to the previous song	While holding down ❻ ▶/■, press the B♭0 keyboard key.
Jump to a specific song	While holding down ❻ ▶/■, press a keyboard key from C2 through B6.
Jump to a song by inputting its number	While holding down ❻ ▶/■, input a song number (0 to 60) by pressing a keyboard key within the range of C1 through A1.
Return to the first song (demo song)	While holding down ❻ ▶/■, press the B♭0 and B0 keyboard keys at the same time.

  • For information about how to input song numbers and the keyboard keys you should use for input, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10). For a list of songs, see the "Music Library List" (page EN-64).

3. To stop demo song playback, touch ❻ ▶/■.

This causes the button lights that turned off in the above procedure to light again.

⌕ NOTE

• If Auto Power Off is enabled, power will turn off automatically after the prescribed time even during demo song play. To avoid this, you can use the procedure under "To enable or disable Auto Power Off" (page EN-7) to disable Auto Power Off.

Playing Notes with Different Tones

Selecting a Tone

Your Digital Piano comes with 22 tones, including three grand piano tones that are assigned to the entire keyboard range, plus one bass tone that can be assigned to lower range only. In addition to assigning a single tone to the keyboard, you can also layer two different tones and you can split the left side and right side of the keyboard between tones.

Selecting a Single Tone

■ To select a tone using keyboard keys

1. **While holding down 8 GRAND PIANO, press a keyboard key from A0 through F♯2.**

A0 - F♯2
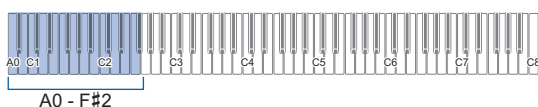
- For example, pressing the B1 keyboard key will select the HARPSICHORD tone and will sound the confirmation tone using the HARPSICHORD tone.
- For information about the tone assigned to each keyboard key, see "Tone List" (page EN-63).

2. **Release 8 GRAND PIANO.**

■ To select a tone with the touch buttons
Touching 8 **GRAND PIANO** selects the GRAND PIANO CONCERT tone.
- If tones are currently layered (page EN-12) or if the keyboard is split between two tones (page EN-13), performing the above procedure to select a tones will cancel the layer and split settings.

■ Grand Piano Tones
The characteristics of each of the three grand piano tones are described in the table below.

Tone name	Description
CONCERT	A full concert grand piano tone for dynamic and natural tone changes.
BRIGHT	A bright and clear piano sound.
MELLOW	A warm, subdued piano tone.

Layering Two Tones

Layering makes it possible to sound with two different tones at the same time. The tone that is layered onto another tone is the "Upper2 part tone", which in this manual is referred to as the "Upper2 tone". The tone upon which the Upper2 tone is layered is the "Upper1 part tone", which is referred to as the "Upper1 tone".

■ To layer two tones

1. **Use the procedure under "Selecting a Single Tone" (page EN-12) to select the Upper1 tone.**

2. **Hold down 8 GRAND PIANO.**
- Do not release 8 **GRAND PIANO** until step 5, below.

3. **Press the B♭4 keyboard key to enable layering.**

B♭4
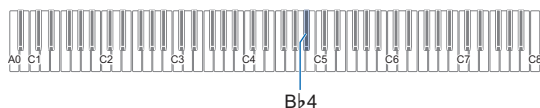
- Each press of B♭4 toggles layering between enabled and disabled. A notification tone (page EN-11) will sound to let you know whether layering is enabled or disabled.

4. **Press a keyboard key within the range of A0 through F♯2 to select the Upper2 tone.**

A0 - F♯2
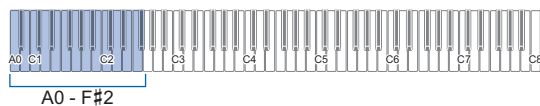
- For example, pressing the C♯2 keyboard key will select STRINGS 1 as the Upper2 tone and will sound the confirmation tone using the STRINGS 1 tone.
- For information about the tone assigned to each keyboard key, See "Keyboard Function List" (page EN-65).

5. **Release 8 GRAND PIANO.**
- Now when you press a keyboard key to play, the two tones (Upper1 and Upper2) you selected will sound at the same time.
- To go back to playing with the Upper1 tone only, disable the layer function.

◯ NOTE
- You can adjust the volume of the Upper2 part and configure other Upper2 part settings. For more information, see "Configuring Upper2 Part and Lower Part Settings" (page EN-42).
- For information about adjusting the Upper1 part volume, see "Adjusting the Upper1 Part Volume" (page EN-41).

■ To unlayer the keyboard

You can perform either of the operations below to unlayer the keyboard.

- While holding down **8** GRAND PIANO, press the B♭4 keyboard key.

  Each press of B♭4 toggles layering between enabled and disabled. After the notification tone sounds (page EN-11) to confirm that layering is disabled, release **8** GRAND PIANO.

- Touch **8** GRAND PIANO.

  This unlayers the keyboard and selects the GRAND PIANO CONCERT tone.

Splitting the Keyboard Between Two Tones

You can use the lower range of the keyboard to sound a bass tone. When the keyboard is split between a left side and a right side range, the tone assigned to the lower (left side) range is the "Lower part tone", which is referred to as the "Lower tone" in this manual. The tone assigned to the upper (right side) range is the "Upper1 part tone", which is referred to as the "Upper1 tone".

Any one of the 22 non-bass tones can be assigned to the upper range.

Split Point

Low Range | High Range

BASS | GRAND PIANO CONCERT
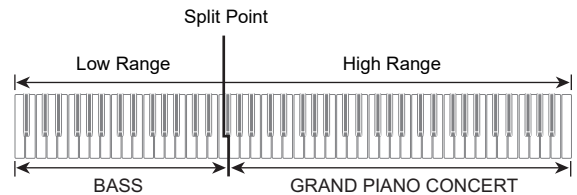
■ To use split to play bass notes in the lower range

1. **Use the procedure under "Selecting a Single Tone" (page EN-12) to select the upper range (Upper1) tone.**

2. **While holding down 8 GRAND PIANO, press the G2 keyboard key.**

   This assigns the bass tone to the lower range.

   A0 C1   C2   C3   C4   C5   C6   C7   C8

   G2
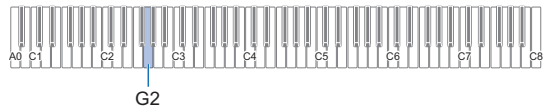
3. **Release 8 GRAND PIANO.**

✎ NOTE

- You can adjust the volume of the Lower part and configure other Lower part settings. For more information, see "Configuring Upper2 Part and Lower Part Settings" (page EN-42).

■ To unsplit the keyboard

- Touch **8** GRAND PIANO.

  This unsplits the keyboard and selects the GRAND PIANO CONCERT tone.

Using the Metronome

The metronome sounds a regular beat to mark time. Use the metronome when you want to practice playing at a regular tempo.

■To start or stop the metronome

1. Touch 🔢 METRONOME.

This starts the metronome.
- LEDs above 🔢 ▶/■ button flash yellow (first beat) and red (remaining beats) in time with the metronome beats.
- You can specify metronome tempo, beat, and volume settings. Refer to the information below.
  Specifying the Tempo (page EN-15)
  To change the metronome beat (page EN-14)
  To adjust the metronome volume (page EN-14)

2. To turn off the metronome, touch the 🔢 METRONOME again.

■To change the metronome beat

1. While holding down 🔢 METRONOME, press a keyboard key from C3 through A3.

C3 - A3
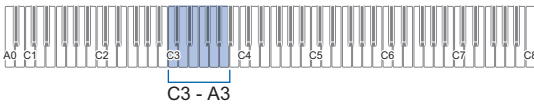
- The beat setting changes in accordance with the keyboard key you press, as shown in the table below.

Pressing this key:	Selects this setting:	Which does this:
C3	Off	Sounds a click for all beats.
C♯3	1	Sounds a bell for all beats.
D3	2	These keys specify a beat setting of 2 to 9. The first beat of each measure is a bell sound, while the remaining beats are clicks.
E♭3	3	
E3	4	
F3	5	
F♯3	6	
G3	7	
A♭3	8	
A3	9	

2. Release 🔢 METRONOME.

■To adjust the metronome volume

1. While holding down 🔢 METRONOME, press the B♭2 or B2 keyboard key.
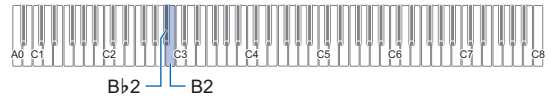
B♭2 ⌐ ⌐ B2

Pressing this key:	Does this:
B♭2	Lowers the metronome volume one level.
B2	Raises the metronome volume one level.
B♭2 + B2	Returns the metronome volume to its initial default setting.

- You can adjust the metronome volume within the range of 0 (muted) and 42 (maximum). As you use the B♭2 and B2 keyboard keys to change the setting, the reference tone (page EN-11) will sound any time the value becomes a multiple of 10 (10, 20, etc.)

2. Release 🔢 METRONOME.

Specifying the Tempo

When using the metronome (page EN-14) or when playing back a Music Library (page EN-26) song, you can specify a tempo setting within the range of 20 to 255 beats per minute. Use the keyboard keys below to specify the tempo setting value.
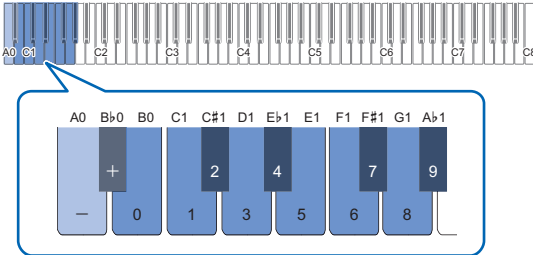
■To input a tempo setting value

1. **Hold down** 5 **METRONOME.**
- Do not release 5 **METRONOME** until step 3, below.

2. **Use keyboard keys from B0 to A♭1 to input a tempo setting value.**
- Input three digits for the tempo value. To specify a value that has fewer than three digits, input zero (0) for the unused leading digit. For example, to specify a tempo of 80 bpm, press keyboard keys in the following sequence: B0 (0) → G1 (8) → B0 (0). The end tone (page EN-11) will sound when you input the third digit.
- Here, you could use the A0 or B♭0 keyboard key to raise or lower the tempo by 1 with each press.
- Pressing the A0 and B♭0 keyboard keys at the same time will return the tempo setting to the initial default value for the currently selected Music Library song (page EN-26).

3. **After the setting is the way you want, release** 5 **METRONOME.**

■To raise or lower the tempo setting value by one

1. **While holding down** 5 **METRONOME, press the A0 or B♭0 keyboard key as required.**
- Each press of the A0 keyboard key will raise the setting value by 1, while B♭0 lowers it by 1.
- You can also use the keyboard keys from B0 to A♭1 to input a tempo value.

2. **Release** 5 **METRONOME.**

NOTE
- You can also configure the setting of the pedal connected to the 12 **DAMPER PEDAL** jack so pressing the pedal multiple times will cause the tempo value to change to match the speed of the pedal presses. See "Changing Pedal Functions" (page EN-45).

■To set the tempo marking

1. **While holding down** 5 **METRONOME, press a keyboard key from A1 through F2.**
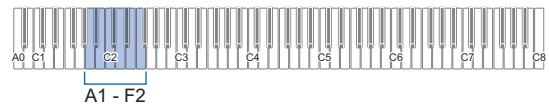
- The tempo will set to that indicated in the table below according to the key pressed.

Pressing this key:	Selects this setting:	Tempo (beats per minute)
A1	Largo	46
B♭1	Lento	52
B1	Adagio	56
C2	Andante	72
C♯2	Moderato	96
D2	Allegretto	108
E♭2	Allegro	132
E2	Vivace	160
F2	Presto	184

Changing Keyboard Response to Touch Pressure (Touch Response)

Touch Response alters tone volume in accordance with keyboard pressure (speed). This provides you some of the same expressivity you get on an acoustic piano.

Pressing fast produces louder notes.
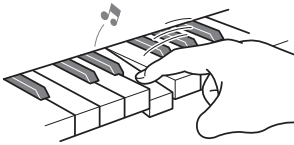
Pressing slowly produces softer notes.
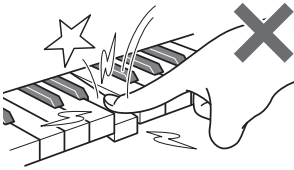
Do not try to use too much pressure.

■To change touch response sensitivity

1. **While holding down 8 GRAND PIANO, press a keyboard key from F♯3 through B3.**

F♯3 - B3
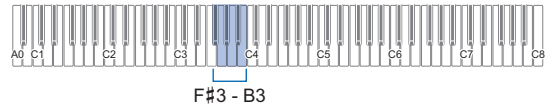
- The table below shows the Touch Response sensitivity settings assigned to each keyboard key.

Pressing this key:	Selects this setting:	Which does this:
F♯3	Off	Disables Touch Response. Sound volume is fixed, regardless of key press speed.
G3	1: Light	Makes production of a louder sound easier, so touch feels lighter than "Normal".
A♭3	2: Medium light	
A3	3: Normal	Specifies normal sensitivity.
B♭3	4: Medium heavy	Makes production of a louder sound more difficult, so touch feels heavier than "Normal".
B3	5: Heavy	

2. **Release 8 GRAND PIANO.**

Changing the Pitch in Semitone Steps (Transpose)

Transpose lets you raise or lower the overall pitch of the Digital Piano in semitone steps.
You can use this feature to raise or lower the keyboard key and to play a piece in a key that is more comfortable for you, or to adjust to a key that better matches a vocalist, etc.

■ To change the transpose setting

1. **While holding down 8 GRAND PIANO, press the E3 or F3 keyboard key.**

E3 —⏋⎿— F3

Pressing this key:	Does this:
E3	Lowers the pitch one semitone.
F3	Raises the pitch one semitone.
E3 + F3	Returns pitch to the initial default setting.

• You can change the pitch of the keyboard within the range of –12 to +12 semitones.

2. **After the setting is the way you want, release 8 GRAND PIANO.**

Fine Tuning a Pitch (Tuning)

Use the tuning feature when you need to adjust the pitch slightly to play along with another musical instrument.
• The tuning feature specifies the frequency of the A4 note. You can set a frequency within the range of 415.5 to 465.9 Hz. The initial default setting is 440.0 Hz.
• You can change the frequency in 0.1 Hz steps.

■ To change the tuning setting

1. **Hold down 3 FUNCTION.**
• Do not release 3 FUNCTION until step 3, below.

2. **Use the keyboards keys below to adjust tuning.**

G4 —⏋⎿— B♭4
A♭4 —⏋⎿— A4

Pressing this key:	Does this:
G4	Lowers the A4 frequency 0.1 Hz.*
A♭4	Raises the A4 frequency 0.1 Hz.*
A4	Sets the A4 frequency to 440.0 Hz.
B♭4	Sets the A4 frequency to 442.0 Hz.

* A reference tone (page EN-11) sounds whenever the setting values becomes an integer (whole number), such as 440, 441, etc.

3. **After selecting the tuning you want, release 3 FUNCTION.**
• The adjusted tuning setting is retained even if you turn off power.

Changing the Pitch in Octave Units (Octave Shift)

Octave shift lets you individually raise or lower the pitches of the Upper1 part and Upper2 part in octave units.

■ To change the Upper1 part pitch in octave units

1. While holding down **8** **GRAND PIANO**, press the D3 or E♭3 keyboard key.

D3 ⌐ ⌐ E♭3

• You can shift the octave within the range of –2 to +2.

Pressing this key:	Does this:
D3	Lowers the pitch of the Upper1 part one octave.
E♭3	Raises the pitch of the Upper1 part one octave.
D3 + E♭3	Returns the pitch of the Upper1 part to the initial default setting.

• You can shift the octave within the range of –2 to +2.

2. After the setting is the way you want, release **8** **GRAND PIANO**.

■ To change the Upper2 part pitch in octave units

1. While holding down **8** **GRAND PIANO**, press the C♯5 or D5 keyboard key.
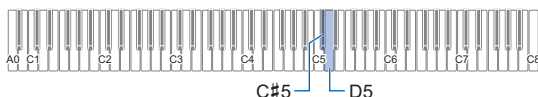
C♯5 ⌐ ⌐ D5

Pressing this key:	Does this:
C♯5	Lowers the pitch of the Upper2 part one octave.
D5	Raises the pitch of the Upper2 part one octave.
C♯5 + D5	Returns the pitch of the Upper2 part to the initial default setting.

• You can shift the octave within the range of –2 to +2.

2. After the setting is the way you want, release **8** **GRAND PIANO**.

Using the Sound Mode Effects (Hall Simulator/Reverb and Surround)

Use **4** **SOUND MODE** to enable and disable the effects described below.

● Hall Simulator/Reverb
Hall Simulator and Reverb are effects that add different types of reverberation to the sound.

Hall Simulator	The Hall Simulator effect simulates the rich clarity, unconstrained brilliance, and other distinctive acoustic characteristics of world-famous concert halls and structures.
Reverb	The Reverb effect reproduces the reverberation heard in spaces such as rooms and halls.

● Surround
The Surround effect creates acoustics that make the sound from the speakers seem like it is coming from multiple directions (virtual surround).

NOTE
• The initial power on default setting is Hall Simulator/Reverb enabled and Surround disabled.
• The Surround effect is not applied to the output from the unit's **9** **PHONES** jacks or **14** **LINE OUT R**, **L/MONO** jacks.

■ To enable or disable the Hall Simulator/Reverb and Surround effects

1. Touch **4** **SOUND MODE**.
• Each touch cycles between the settings, and the current setting is indicated by the LED lights as shown below.

SOUND MODE	SOUND MODE	SOUND MODE
Hall Simulator/ Reverb On	Hall Simulator/ Reverb On	Hall Simulator/ Reverb Off
Surround Off	Surround On	Surround Off

■ **To specify the Hall Simulator/Reverb type**

1. While holding down ❹ SOUND MODE, press a keyboard key from A0 through A♭1.

A0 - A♭1
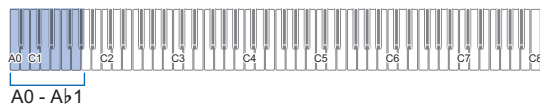
● **Hall Simulator**

Pressing this key:	Selects this setting:	Description
A0	N.Y. Club	Music Club in Manhattan
B♭0	Opera Hall	Uniquely shaped Sydney concert hall
B0	Berlin Hall	Arena-style classical concert hall in Berlin
C1	British Stadium	Large outdoor stadium outside London

● **Reverb**

Pressing this key:	Selects this setting:	Description
C♯1	Room 1	Room-type reverb
D1	Room 2	
E♭1	Room 3	
E1	Large Room	
F1	Hall 1	Small hall-type reverb
F♯1	Hall 2	
G1	Hall 3	
A♭1	Stadium	Stadium-type reverb

2. Release ❹ SOUND MODE.

■ **To adjust the depth of the Hall Simulator/Reverb effect**

1. Perform step 1 under "To specify the Hall Simulator/Reverb type" (page EN-19) to select a Hall Simulator/Reverb type.

2. While holding down ❹ SOUND MODE, use the keyboard keys below to adjust the depth of the effect.

A1 - C2
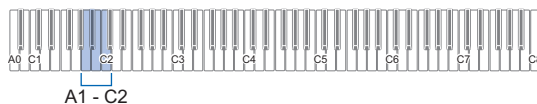
Pressing this key:	Does this:
A1	Lowers the effect depth applied to the built-in sound source one level.
B♭1	Raises the effect depth applied to the built-in sound source one level.
A1 + B♭1	Returns the effect depth applied to the built-in sound source to the initial default setting.
B1	Lowers the effect depth applied to the wireless audio input one level.
C2	Raises the effect depth applied to the wireless audio input one level.
B1 + C2	Returns the effect depth applied to the wireless audio input to the initial default setting.

• Effect depth can be set to a value in the range of 0 (no effect) to 42 (maximum depth). As you use the keyboard keys to change the setting, the reference tone (page EN-11) will sound any time the value becomes a multiple of 10.

3. After the setting is the way you want, release ❹ SOUND MODE.

■ **To specify the Surround type**

1. While holding down ❹ SOUND MODE, press the D2 (Surround Type 1) or E♭2 (Surround Type 2) keyboard key.

D2 — E♭2

2. Release ❹ SOUND MODE.

Using Chorus

Chorus is a function that adds depth and breadth to notes.

■ To apply a chorus effect to a tone

1. While holding down ❹ **SOUND MODE**, press a keyboard key from E2 through A♭2.

E2 - A♭2

Pressing this key:	Selects this setting:	Which does this:
E2	Tone	Specifies the initial setting of each tone.
F2	1	Applies light chorus.
F♯2	2	Applies medium chorus.
G2	3	Applies deep chorus.
A♭2	4	Applies a sweeping flanger effect.

2. Release ❹ **SOUND MODE**.

Using Brilliance

Brilliance can be used to make a sound brighter or mellower.

■ To adjust brilliance

1. While holding down ❹ **SOUND MODE**, press the A2 or B♭2 keyboard key.

A2 ⎯ B♭2

Pressing this key:	Does this:
A2	Lowers the brilliance setting by 1.
B♭2	Raises the brilliance setting by 1.
A2 + B♭2	Returns brilliance to the initial default setting.

• You can specify a setting value in the range of –3 to +3. A setting of +1 or greater gives notes a brighter feel, while –1 or less makes notes sound more mellow.

2. After the setting is the way you want, release ❹ **SOUND MODE**.

Adjusting Acoustic Piano Sound Characteristics (Acoustic Simulator)

The tones of your Digital Piano have built-in elements that give them the reverberation characteristics of an acoustic piano. You can use the procedure below to adjust the characteristics of notes.

■ **To adjust acoustic piano sound characteristics**

1. Hold down 4 **SOUND MODE.**
   - Do not release 4 **SOUND MODE** until step 3, below.

2. Use the keyboard keys shown in the table below to configure the setting item you want.

C3 - F3: String Resonance
F♯3 - B3: Damper Resonance
C4 - F4: Damper Noise
F♯4 - B4: Key On Action Noise
C5 - F5: Key Off Action Noise
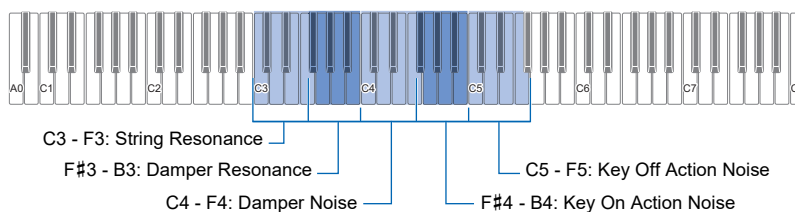
Setting Item	Setting					
	Tone	Off	1	2	3	4
String Resonance	C3	C♯3	D3	E♭3	E3	F3
Damper Resonance	F♯3	G3	A♭3	A3	B♭3	B3
Damper Noise	C4	C♯4	D4	E♭4	E4	F4
Key On Action Noise	F♯4	G4	A♭4	A4	B♭4	B4
Key Off Action Noise	C5	C♯5	D5	E♭5	E5	F5

   - For each setting item, press the keyboard key that corresponds to the setting you want. For example, to select the 4 setting for String Resonance, press the F3 keyboard key.
   - For more information about setting items and their settings, see the "List of Acoustic Piano Sound Setting Items" (page EN-22).

3. After all the settings are the way you want, release 4 **SOUND MODE.**

■ **List of Acoustic Piano Sound Setting Items**

Setting	Available Options		
String Resonance Playing on an acoustic piano causes the strings that are harmonics of the played strings to resonate. You can select one of the string resonance settings in the column to the right.	Tone:	Specifies the initial setting of each tone.	
	Off:	Disables String Resonance.	
	1 to 4:	The greater the value, the stronger the String Resonance.	
Damper Resonance Pressing the damper pedal on an acoustic piano opens all 88 of the strings, causing all of the strings that are harmonics of the strings that are played to resonate. You can select one of the damper resonance settings in the column to the right.	Tone:	Specifies the initial setting of each tone.	
	Off:	Disables Damper Resonance.	
	1 to 4:	The greater the value, the stronger the Damper Resonance.	
Damper Noise Damper noise is a slight metallic ringing sound that is generated as the damper of an acoustic piano separates from the wires pedal when the damper pedal is pressed. You can use the settings in the column to the right to adjust the volume of the damper noise.	Tone:	Specifies the initial setting of each tone.	
	Off:	Mutes Damper Noise.	
	1 to 4:	The greater the value, the greater the noise volume.	
Key On Action Noise When the keys of an acoustic piano are tapped with extremely light pressure, piano mechanism operation sound (noise) is produced without the hammers reaching the strings. You can use the settings in the column to the right to adjust the volume of the noise.	Tone:	Specifies the initial setting of each tone.	
	Off:	Mutes Key On Action Noise.	
	1 to 4:	The greater the value, the greater the noise volume.	
Key Off Action Noise Releasing the keyboard keys of acoustic piano generates piano mechanism operation sound (noise). You can use the settings in the column to the right to adjust the volume of the noise.	Tone:	Specifies the initial setting of each tone.	
	Off:	Key Off Action Noise muted.	
	1 to 4:	The greater the value, the greater the noise volume.	

■ **To adjust the timing from key press to sound (hammer response)**

1. While holding down 8 **GRAND PIANO, press a keyboard key from C4 through F4.**

C4 - F4
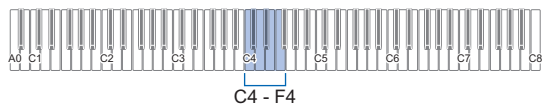
Pressing this key:	Selects this setting:	Description
C4	Tone	Sets the default setting for each tone.
C♯4	Off	Turns off the hammer response.
D4	Fast	Shortens the time between pressing a key and the sound of the note.
E♭4	Slightly faster	
E4	Slightly slower	Lengthens the time between pressing a key and the sound of the note.
F4	Slow	

2. Release 8 **GRAND PIANO.**

■ **To adjust the timing from key release to damping (key-off response)**

1. While holding down 8 **GRAND PIANO, press a keyboard key from F♯4 through A4.**

F♯4 - A4
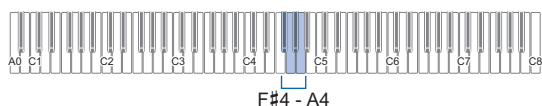
Pressing this key:	Selects this setting:	Description
F♯4	Tone	Sets the default setting for the tone.
G4	Fast	Shortens the time between the release of the key and the damping of the note.
A♭4	Normal	Standard setting.
A4	Slow	Lengthens the time between the release of the key and the damping of the note.

2. Release 8 **GRAND PIANO.**

Splitting the Keyboard for Duet Play

You can split the keyboard in the center for duet play so the left and right sides have the same ranges.
The Duet Mode is the perfect way to conduct lessons, with the teacher playing on the left side as the student plays the same song on the right side.

Split point

Left keyboard   Right keyboard

C3   C4   C5   C6 | C3   C4   C5   C6
(middle C)   (middle C)
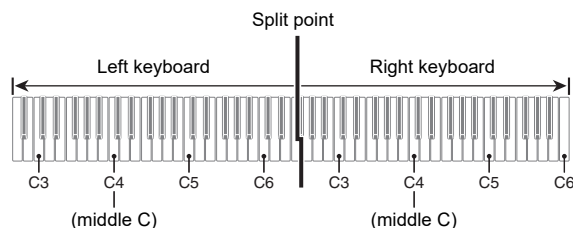
🔍 **NOTE**

• You can change the ranges of the left and right keyboards in octave units from their initial default settings. This comes in handy, for example, if the initial default range is not enough when one person is playing the left hand part and another person is playing the right hand part.
For information about the setting operation, see "To change the octaves of the duet keyboards" (page EN-24).

■ **Pedal Operation when Playing a Duet**

• If you are using the separately available SP-34 Pedal Unit, the left outer pedal is the left keyboard damper pedal, while the right outer pedal is the right keyboard damper pedal. Only the damper pedal for the right keyboard supports half-pedal operations.

Left side damper pedal ———   Right side damper pedal
                                     (Half-pedal operation
                                     supported)

Left and right side
damper pedal
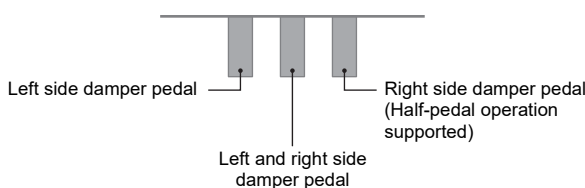
• To use the supplied SP-3 Pedal as a damper pedal that affects both the left keyboard and right keyboard, connect it to the 12 **DAMPER PEDAL** jack. In the Duet Mode, this pedal functions as a damper pedal, regardless of the effect type assigned to it with the procedure under "Changing Pedal Functions" (page EN-45). Half-pedal operation is not supported in this case.

■ To use the Duet Mode

1. **While holding down** 🄳 **FUNCTION, press the B♭5 keyboard key.**

B♭5

Each time the B♭5 keyboard key is pressed to change this setting, a notification tone sounds to indicate the newly selected setting.

Notification Tone*	Setting	Description
Off tone	Off	Duet Mode exited.
Option tone × 1	On	Duet Mode entered.
Option tone × 2	Pan	Left-side keyboard notes output from the left speaker, right-side keyboard notes output from the right speaker while in the Duet Mode.

* For more information, see "Notification Tones" (page EN-11).

2. **After the setting is the way you want, release** 🄳 **FUNCTION.**

🔵 NOTE

• Some settings become fixed and cannot be changed while in the Duet Mode.
• Hall Simulator/Reverb (page EN-18), Surround (page EN-18) and Chorus (page EN-20) are disabled while the Duet Mode setting is "Pan".

■ To change the octaves of the duet keyboards

1. **Hold down** 🄳 **FUNCTION.**
   • Do not release 🄳 **FUNCTION** until step 3, below.

2. **Use the keyboard keys below to change the octaves of the left-side and right-side keyboards.**

B5 - D6
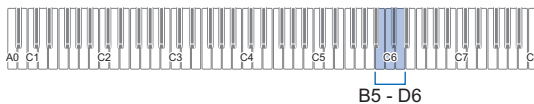
Pressing this key:	Does this:
B5	Lowers the left-side keyboard one octave.
C6	Raises the left-side keyboard one octave.
B5 + C6	Returns the range of the left-side keyboard to its initial default setting.
C♯6	Lowers the right-side keyboard one octave.
D6	Raises the right-side keyboard one octave.
C♯6 + D6	Returns the range of the right-side keyboard to its initial default setting.

• You can shift the octave of each keyboard within the range of –2 to +2 octaves.

Setting Example
Pressing the C6 keyboard key once will configure the keyboard octaves as shown below.

Left keyboard   Right keyboard

C4 C5 C6 C7   C3 C4 C5 C6

1 octave higher than initial setting   Unchanged
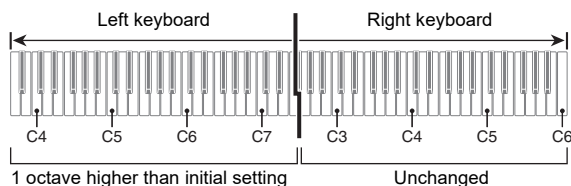
3. **When the octave settings of the keyboards are the way you want, release** 🄳 **FUNCTION.**

Changing the Scale Tuning (Temperament) of the Keyboard

You can change the scale of the keyboard from the standard equal temperament to another tuning that is more suitable for playing Indian music, Arabic music, classical music, etc. You can select from among the 17 preset scales described below.

■**To change the scale**

1. While holding down **3 FUNCTION**, press a keyboard key from C3 through E4.
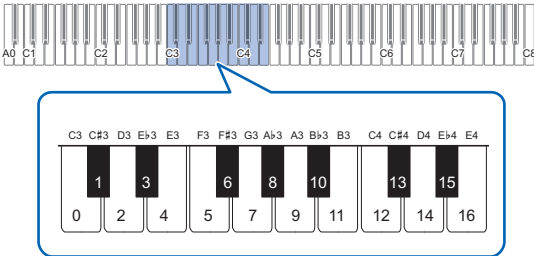
- Pressing a keyboard key changes to the applicable scale as shown in the table below.

Key	Setting Value	Scale Name
C3	0	Equal Temperament
C♯3	1	Pure Major
D3	2	Pure Minor
E♭3	3	Pythagorean
E3	4	Kirnberger 3
F3	5	Werckmeister
F♯3	6	Mean-Tone
G3	7	Rast
A♭3	8	Bayati
A3	9	Hijaz
B♭3	10	Saba
B3	11	Dashti
C4	12	Chahargah
C♯4	13	Segah
D4	14	Gurjari Todi
E♭4	15	Chandrakauns
E4	16	Charukeshi

2. Release **3 FUNCTION**.

■**To specify the base note of the scale**

1. While holding down **3 FUNCTION**, press a keyboard key from C2 through B2.

C2 - B2
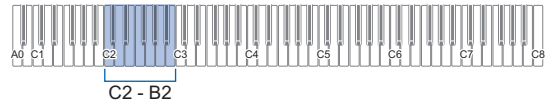
- The note of the keyboard key you press becomes the base note.

2. Release **3 FUNCTION**.

■**To disable piano stretch tuning**

In general, for pianos stretch tuning refers to tuning high tones higher than normal, and low tones lower than normal.

1. While holding down **3 FUNCTION**, press the F4 keyboard key.

F4
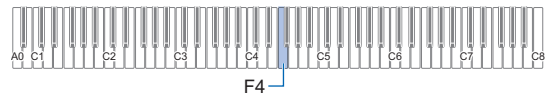
- This disables piano stretch tuning.
- Each press of F4 toggles between on and off.

2. Release **3 FUNCTION**.

Listening to Songs

Your Digital Piano can play MIDI data (including built-in songs) as well as audio data. Use of a USB flash drive increases the number of available functions.

NOTE

- Depending on the type of data you want to play, you will need to switch the song type between MIDI mode and Audio mode.
- For recording, see "Recording/Playing Back Performances" (page EN-30).

● **Functions available using the Digital Piano alone**

	MIDI data*1	
	Built-in songs (Music Library)	**MIDI Recorder Songs**
Playback	✓ Playing Songs from the Music Library (page EN-26)	✓ Playing Back Recorded Content (page EN-33)

● **When used with a USB flash drive, you can also do the following:**

	MIDI data*1		Audio data*2	
	User Song	**USB memory song**	**WAV files (.WAV)**	**MP3 Files (.MP3)**
Playback	✓ Playing MIDI Data (MIDI Player) (page EN-28)		✓ To select and playback a file recorded with the audio recorder (page EN-34)	✓ Playing MP3 Audio Files (page EN-29)

*1 Song type: MIDI mode
*2 Song type: Audio mode

Playing Songs from the Music Library

You can use the Music library for your listening enjoyment or to practice piano songs.

- The Music Library includes 60 songs, numbered 1 through 60.
- You can also playback and practice songs (user songs) transferred from a smart device or a USB flash drive to Digital Piano memory as Music Library songs 61 through 70.

IMPORTANT!

- **You can add user songs from a smart device or USB flash drive connected with the Digital Piano. You can delete user songs from a smart device that is connected with the Digital Piano. For details, see "Using the Dedicated App" (page EN-52) and "USB Flash Drive" (page EN-35).**

■ **Preparing to Use the Music Library**

If the Digital Piano is in the Audio Mode, perform the procedure below to switch to the MIDI Mode.

1. While holding down 3 FUNCTION, press the E♭6 keyboard key.

E♭6

2. Release 3 FUNCTION.

■ **To listen to Music Library songs**

1. **Perform the procedure under "Preparing to Use the Music Library" (page EN-26).**

2. **Select the song you want.**

(1) While holding down **6** ▶/■, press one of the keyboard keys below.

B♭0 C1 - A1 C7 - A7
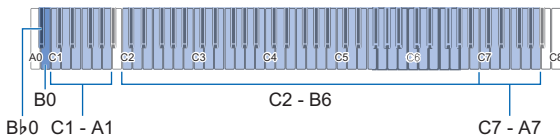
Pressing this key:	Does this:
C1 to A1	Selects the built-in song (song numbers 1 to 60) or user song (song numbers 61 to 70) that corresponds to the input song number.
C2 to B6	Selects the built-in song (song numbers 1 to 60) that corresponds to the pressed keyboard key.
C7 to A7	Selects the user song (song numbers 61 to 70) that corresponds to the pressed keyboard key.
B0	Selects the next song number.
B♭0	Selects the previous song number.

• For information about how to input song numbers and the keyboard keys you should use for input, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10). For a list of songs, see the "Music Library List" (page EN-64).

(2) Release **6** ▶/■.

3. **To start song playback, touch 6 ▶/■.**

• LEDs above the **6** ▶/■ button flash yellow (first beat) and red (remaining beats) in time with the metronome beats.
• Playback will stop automatically when the end of the song is reached. To stop song playback, touch **6** ▶/■.

◯ **NOTE**

• Selecting a song in step 2 of the above procedure will automatically configure Digital Piano with settings that are appropriate for the selected song, and return the playback part (page EN-27) settings to their initial defaults.

■ **To use a Music Library song for practice**

◯ **NOTE**

• You can turn off the left-hand part or right-hand part of a built-in song and play along on the keyboard.

1. **Perform steps 1 and 2 under "To listen to Music Library songs" (page EN-27) to select the song you want to practice.**

2. **As required, perform the procedure under "Specifying the Tempo" (page EN-15) to specify the tempo of the song.**

• With some songs, the tempo will change part way through for the sake of performance expression.

3. **Select the playback part (left-hand or right-hand part).**

(1) While holding down **6** ▶/■, press keyboard key A0 (leftmost white key).
Each press of the A0 keyboard key cycles through the settings shown below.
L only lit: Left-hand part played, right-hand part muted.
R only lit: Right-hand part played, left-hand part muted.
LR both lit: Both left- and right-hand parts played.

(2) Release **6** ▶/■.

4. **To start song playback, touch 6 ▶/■.**

• Play the muted part along with the playback.
• You can also change the tempo setting during playback.
• Playback will stop automatically when the end of the song is reached. To stop song playback, touch **6** ▶/■.

Playing MIDI Data (MIDI Player)

Your Digital Piano has a MIDI player that can play back the MIDI file types described below.

■ Playable songs

Song Type	Description
User songs	You can add up to 10 songs to Digital Piano memory as user songs (song number 61 through 70). To add user song data (up to 100 KB per song of data that is playable by this Digital Piano), store it on a USB drive or smart device and then transfer the song data to Digital Piano memory. For details, see "USB Flash Drive Operations" (page EN-38) and "Using the Dedicated App" (page EN-52). For information about the playback procedure, see "Playing Songs from the Music Library" (page EN-26).
MIDI recorder song	Songs recorded with the Digital Piano's MIDI recorder. See "Using the MIDI Recorder to Record or Playback Performances" (page EN-30).
USB memory songs	You can easily play standard MIDI files (SMF format 0/1) or CASIO MIDI files (CMF format) saved on a USB flash drive without loading them into Digital Piano memory. For information about the playback procedure, see "To select a song on a USB flash drive and play it" (page EN-28). For details on the save procedure, see "Using a Computer to Copy General Song Data to a USB Flash Drive" (page EN-40).

■ Preparing to Use the MIDI Player

Perform the steps below to enter the Digital Piano MIDI Mode.

1. While holding down 3 FUNCTION, press the E♭6 keyboard key.

E♭6
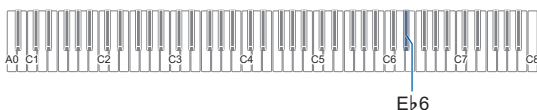
2. Release 3 FUNCTION.

■ To select a song on a USB flash drive and play it

1. Perform the procedure under "Preparing to Use the MIDI Player" (page EN-28).

2. Insert the USB flash drive that contains the song you want to play into the Digital Piano's 11 USB Type A port.
- For precautions when handling a USB flash drive, see "USB Flash Drive" (page EN-35).

3. While holding down 6 ▶/■, press the B7 keyboard key.
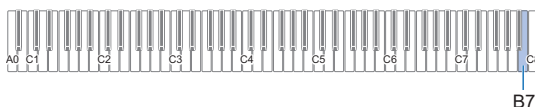
B7

4. While holding down 6 ▶/■, press one of the keyboard keys below to select the song you want to listen to.

B0
B♭0 C1 - A1
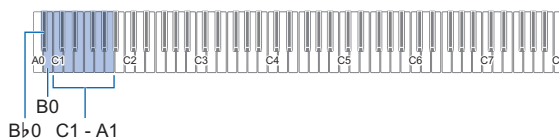
Pressing this key:	Does this:
C1 to A1	Inputs a number from 00 to 99. (A number from 00 to 99 is automatically assigned to each file in ascending order of the file name.)
B0	Selects the next song number.
B♭0	Selects the previous song number.

- For information about how to input numbers and the keyboard keys you should use for input, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10).

NOTE
- The piano sounds a notification tone if a file with the specified number does not exist.

5. Release 6 ▶/■.

6. To start playback of the selected song, touch 6 ▶/■.
- Playback ends automatically when the end of the song is reached. To stop playback of a song part way through, touch 6 ▶/■.

■ **To play a song with one of hand parts muted (for practice of the muted part)**

◯ NOTE

• This procedure can be used for a song on a USB flash drive.

1. **Perform steps 1 through 4 under "To select a song on a USB flash drive and play it" (page EN-28) to select the song you want to practices.**

2. **If you want, you could use the procedure under "Specifying the Tempo" (page EN-15) to specify the tempo.**

3. **Select the playback part (left-hand or right-hand part).**
   (1) While holding down **6** ▶/■, press keyboard key A0 (leftmost white key).
   Each press of the A0 keyboard key cycles through the settings shown below.
   L only lit: Left-hand part played, right-hand part muted.
   R only lit: Right-hand part played, left-hand part muted.
   LR both lit: Both left- and right-hand parts played.
   (2) Release **6** ▶/■.

4. **To start song playback, touch 6 ▶/■.**
   • Play the muted part along with the playback.
   • You can also change the tempo setting during playback.
   • Playback will stop automatically when the end of the song is reached. To stop song playback, touch **6** ▶/■.

◯ NOTE

• When playing back a standard MIDI file (SMF format) stored on a USB flash drive, channel 3 will be assigned to the left-hand part while channel 4 will be assigned to the right-hand part.

Playing MP3 Audio Files

Your Digital Piano can play back MP3 Audio Files.
TAKE**.MP3 (** = 01-99) files in the MUSICDAT folder stored on a USB flash drive.

◯ NOTE

• The filename of the MP3 data you wish to play must be changed to TAKE**.MP3 (** = 01-99) format and then saved.

1. **While holding down 3 FUNCTION, press the E6 key to switch to Audio mode.**

E6
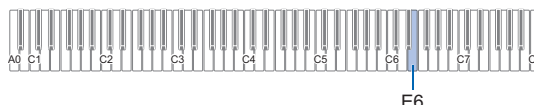
2. **Release 3 FUNCTION.**

3. **Insert a USB flash drive that has songs stored on it into the ⑪ USB Type A port on the Digital Piano.**

4. **While holding down 6 ▶/■, press the following keyboard keys to select the song you want to listen to.**

B0
B♭0   C1 - A1
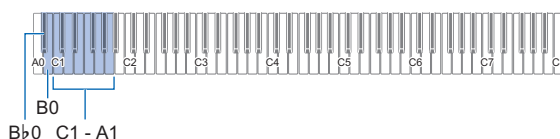
Pressing this key:	Action when keys are pressed
C1 to A1	Enter the number of the TAKE**.MP3 (** = 01 to 99) using the keyboard.
B1	Selects the next song number.
B♭0	Selects the previous song number.

   • For the keys used to input numbers and the input method, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10).

5. **Release 6 ▶/■.**

6. **To start playback, touch 6 ▶/■.**
   • Playback stops when the end is reached. To stop playback midway, touch **6** ▶/■.

◯ NOTE

• If the WAV file name "TAKE**.WAV (** = 01-99)" and the MP3 file name "TAKE**.MP3 (** = 01-99)" are the same, the WAV file will be played.

Recording/Playing Back Performances

Your Digital Piano can record/play MIDI data (including built-in songs) as well as audio data. Use of a USB flash drive increases the number of available functions.

◢NOTE
- Depending on the type of data you want to record/play, you will need to switch the song type between MIDI mode and Audio mode.

● **Functions available using the Digital Piano alone**

	MIDI data[1]	
	Built-in songs (Music Library)	**MIDI Recorder Songs**
Recording	—	✓ Creating a Recording (page EN-31)
Playback	✓ Playing Songs from the Music Library (page EN-26)	✓ Playing Back Recorded Content (page EN-33)

● **When used with a USB flash drive, you can also do the following:**

	MIDI data[1]		Audio data[2]	
	User Song	**USB memory song**	**WAV files (.WAV)**	**MP3 Files (.MP3)**
Recording			✓ To record a keyboard performance onto a USB flash drive (page EN-34)	—
Playback	✓ Playing MIDI Data (MIDI Player) (page EN-28)		✓ To select and playback a file recorded with the audio recorder (pageEN-34)	✓ Playing MP3 Audio Files (page EN-29)

[1] Song type: MIDI mode
[2] Song type: Audio mode

Using the MIDI Recorder to Record or Playback Performances

The MIDI recorder records Digital Piano keyboard play as MIDI data.

◢ IMPORTANT!
- **CASIO COMPUTER CO., LTD. takes no responsibility for any damages, lost profits, or claims by third parties arising from the deletion of recorded data due to malfunction, repair, or for any other reason.**

■ MIDI Recorder
Your Digital Piano has two recorders: a MIDI recorder and an audio recorder. The MIDI recorder does not record sound itself (audio data) but records keyboard performance information (key press and release, touch strength, etc.) as MIDI data.*
- One recorded song can be in memory at a time. Starting a new recording deletes any data that was previously recorded in memory.
- The left track and right track can be recorded individually and combined into a single song.

Left-hand part track	Keyboard performance recording	⇨	While playing back	⇨	Played back simultaneously
Right-hand part track			Keyboard performance recording		
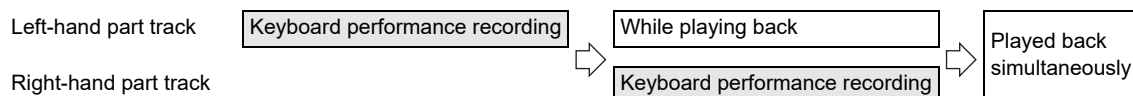
- Up to approximately 10,000 notes (total of two tracks) can be recorded for a single song.

* MIDI
MIDI is short for "Musical Instrument Digital Interface". It is a universal standard that makes it possible for musical instruments, computers, and other devices to exchange performance information (keyboard key press/release, touch pressure, etc.) regardless of manufacturer. Performance data in this case is called "MIDI data".

■ **Recorded MIDI Data**

Recording with the MIDI recorder also records the operations and settings below in Digital Piano memory.

- Keyboard play and pedal operations
- Tone
- Tempo*
- Beat*
- Layer setting (Left-hand part track only)
- Split setting (Left-hand part track only)
- Duet (Left-hand part track only)
- Sound Mode (Hall Simulator/Reverb type, Hall Simulator/Reverb depth applied to the Digital Piano sound source, and Surround type), Chorus, Brilliance*
- Acoustic simulator setting*
- Scale*
- Stretch tuning*

* Common for both tracks. Settings configured for the left-hand part track are also applied to the right-hand part track.

■ **Preparing to Use the MIDI Recorder**

Your Digital Piano has two recorders: a MIDI recorder and an audio recorder. Depending on the type of data you want to record or play back, you first need to select the MIDI Mode or Audio Mode.

- The MIDI recorder can be used while the Digital piano is in the MIDI Mode. If the Digital Piano is in the Audio Mode, perform the procedure below to switch to the MIDI Mode.
- Note that the Digital Piano is in the MIDI Mode under initial default settings, so the operation below is not necessary if you have not changed the setting.

1. While holding down **3 FUNCTION**, press the E♭6 keyboard key.

E♭6
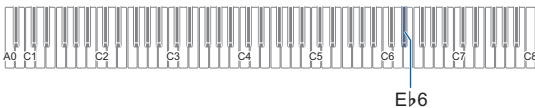
2. Release **3 FUNCTION**.

Creating a Recording

IMPORTANT!

- **If, during a recording operation, the number of remaining recordable notes is 100 or fewer, the indicator of the track being recorded (L or R) will start to flash more quickly. Recording stops automatically when the number of remaining recordable notes becomes 0.**
- **Should power fail during recording, all of the data in the track you are recording will be deleted.**
- **You cannot use keyboard operations to configure settings while in record standby or while recording is in progress.**

NOTE

- Read "Preparing to Use the MIDI Recorder" (page EN-31) before performing the operation below.

■ **Quick Guide: Simplest performance recording operation**

1. While the **7 ● (REC)** button is lit white, touch **7 ● (REC)**.

This enters record standby, which is indicated by flashing **7 ● (REC)** (red) and **6 ▶/■** (white) lights.

2. To start recording, play something on the keyboard.

This causes the **7 ● (REC)** (red) light to change from flashing to lit, which indicates that recording is in progress.

3. When you are finished recording, touch **7 ● (REC)** or **6 ▶/■**.

This makes **7 ● (REC)** light white again.

4. To replay the recording, touch **6 ▶/■**.

NOTE

- The above operation records what is played on the keyboard to the left-hand part track. For further operation details, see "To record the left-hand part track" (page EN-32).

■To record the left-hand part track

1. **Depending on the track to be recorded, configure the applicable settings.**
- See "Recorded MIDI Data" (page EN-31).
- If you want to specify a beat and tempo setting, refer to the information below and configure the settings.
  "To change the metronome beat" (page EN-14)
  "Specifying the Tempo" (page EN-15)

2. **While the** 7● **(REC) button is lit white, touch** 7● **(REC).**
This enters record standby, which is indicated by flashing 7● (REC) (red) and 6 ▶/■ (white) lights.
- At this time, the "L" indicator starts to flash. This indicates that the left-hand part track will be recorded.
- To exit a recording operation here, touch 7● (REC). This makes 7● (REC) light white again.

3. **If you want the metronome to sound during recording, touch** 5 **METRONOME.**

4. **To start recording, play something on the keyboard, press the pedal or touch** 6 ▶/■.
This causes the 7● (REC) light (red) to change from flashing to lit.

5. **When you are finished recording, touch** 7● **(REC) or** 6 ▶/■.
This makes 7● (REC) light white again.

6. **To replay the recording, touch** 6 ▶/■.

NOTE
Restarting Recording From the Beginning
- If you make a mistake and want to stop an ongoing recording operation and restart recording from the beginning, hold down 7● (REC) until its light flashes. This discards everything you have recorded to the left-hand track and returns to record standby. Perform the operation from step 4 of the above procedure to restart recording.

■To overdub a left-hand part track recording with right-hand part track recording

1. **Perform steps 1 and 2 under "To record the left-hand part track" (page EN-32).**

2. **Press** 7● **(REC) as many times as necessary until the "R" and "L" indicators are as described below.**
- "R" indicator flashing. This indicates that the right-hand part track will be recorded.
- The "L" indicator stops flashing. This indicates that the left-hand part track recording is complete.

3. **As required, specify whether or not you want to play back the left-hand track while recording.**
(1) While holding down 6 ▶/■, press keyboard key A0 (leftmost white key).
Each press of the A0 keyboard key toggles the "L" indicator between lit and unlit.
L lit: Left-hand part track playback during recording.
L unlit: No left-hand part track playback during recording.
(2) Release 6 ▶/■.

4. **If you want the metronome to sound during recording, touch** 5 **METRONOME.**

5. **To start recording, play something on the keyboard, press the pedal or touch** 6 ▶/■.
This causes the 7● (REC) light (red) to change from flashing to lit.
- The settings configured for the left-hand part track are applied for the beat and tempo.

6. **Perform the procedure starting from step 5 under "To record the left-hand part track" (page EN-32).**

NOTE
Restarting Overdubbing From the Beginning
- If you make a mistake and want to stop an ongoing overdubbing operation and restart overdubbing from the beginning, hold down 7● (REC) until its light flashes. This discards everything you have recorded to the right-hand track and returns to record standby. Perform the operation from step 5 of the above procedure to restart overdubbing.

■ **To delete everything recorded to a track**

1. **While the 7● (REC) button is lit white, touch 7● (REC).**

   This enters record standby, which is indicated by flashing 7● (REC) (red) and 6 ▶/■ (white) lights.
   • At this time, the "L" indicator is flashing. If you want to delete the contents of the left-hand part track, advance directly to step 3.

2. **If you want to delete the contents of the right-hand part track, hold down 7● (REC) until the "R" indicator starts to flash.**

3. **Touch 6 ▶/■.**

   This causes the 7● (REC) light (red) to change from flashing to lit.

4. **Hold down 7● (REC) until its light flashes.**

   This deletes the contents of the specified track.

5. **Touch 7● (REC) to exit record standby.**

Playing Back Recorded Content

Immediately after finishing a recording, touching 6 ▶/■ will play it back. Use the procedure below to play back a recording if you played a Music Library song or turned off Digital Piano power after recording it.

■ **To perform playback**

1. **While holding down 6 ▶/■, press the B♭7 keyboard key.**

   [keyboard diagram: B♭7]

2. **Release 6 ▶/■.**

3. **To start playback, touch 6 ▶/■.**
   • Playback will stop automatically when the end of the recording is reached. To stop playback manually, touch 6 ▶/■.

Using the Audio Recorder to Record Performances

The audio recorder records Digital Piano keyboard play as audio data. Recordings are stored as WAV files (linear PCM, 16bit, 44.1kHz, stereo) to the USB flash drive in the Digital Piano's 11 **USB** Type A port.

IMPORTANT!

• **Never remove the USB flash drive while Audio Recorder recording or playback is in progress. Doing so can corrupt the data on the USB flash drive and damage the USB flash drive port.**
• **For precautions when handling a USB flash drive, see "USB Flash Drive" (page EN-35).**
• **For information about the USB flash drive formats supported by your Digital Piano, see "Supported USB Flash Drives" (page EN-35).**

■ **Prepare to use the Audio Recorder**

1. **Perform the steps below to put the Digital Piano into the Audio Mode.***

   (1) While holding down 3 **FUNCTION**, press the E6 keyboard key.

   [keyboard diagram: E6]
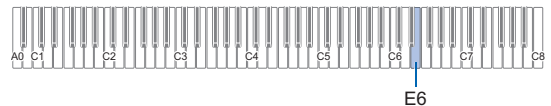
   (2) Release 3 **FUNCTION**.

2. **Insert the USB flash drive into the Digital Piano's 11 USB Type A port.**
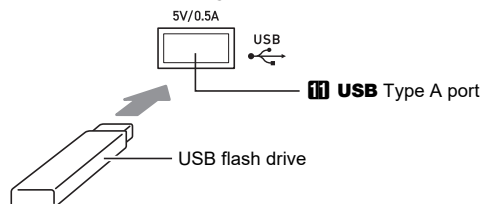
   [diagram: 5V/0.5A, USB, 11 USB Type A port, USB flash drive]

   • Carefully push the USB flash drive in as far as it will go. Do not use undue force when inserting the USB flash drive.
   • When the Digital Piano recognizes the USB flash drive, the LEDs above 4 **SOUND MODE** and 6 ▶/■ will light sequentially from left to right. Do not perform any operation while a mounting is in progress.

* Your Digital Piano has two recorders: a MIDI recorder and an audio recorder. Depending on the type of data you want to record or play back, you first need to select the MIDI Mode or Audio Mode.

■ **To record a keyboard performance onto a USB flash drive**

1. Perform the procedure under "Prepare to use the Audio Recorder" (page EN-33).

2. Touch 7● (REC) so its LED lights white.

This enters record standby, which is indicated by flashing of the 7● (REC) (red) and 6 ▶/■ (white) LEDs.
• To cancel recording, touch 7● (REC) again.

3. To start recording, play something on the keyboard or touch 6 ▶/■.

This causes the 7● (REC) LED to change from flashing red to lit red, indicating that recording is in progress.

○ **NOTE**

• The maximum allowable recording time with the audio recorder is approximately 25 minutes, after which recording will stop automatically. 7● (REC) will start to flash to let you know when you are running out of recording time, so end your recording as soon as possible after flashing starts.
• If you make a mistake and want to restart recording from the beginning, hold down 7● (REC) during recording (after the operation in Step 3 above) until it blinks. The recording will be discarded, and the Digital Piano will wait for you to resume recording from Step 3 above.

4. To stop recording, touch 7● (REC) or 6 ▶/■.

This causes the 7● (REC) LED to light white again.
• This will store the recording as a WAV file to the USB flash drive. Files are automatically assigned names in sequence from "TAKE01.WAV" through "TAKE99.WAV".
• The saved file is selected automatically.

5. To play back the song you just recorded, touch 6 ▶/■.

○ **NOTE**

• Files recorded by the audio recorder are saved with a filename that follows the last MP3 or WAV audio file.

■ **To select and playback a file recorded with the audio recorder**

1. Perform the procedure under "Prepare to use the Audio Recorder" (page EN-33).

2. While holding down 6 ▶/■, press one of the keyboard keys below to select the song you want to listen to.

B0
B♭0   C1 - A1

Pressing this key:	Does this:
C1 to A1	Use the keyboard keys to enter the TAKE **. WAV (** = 01 to 99) number.
B0	Selects the next song number.
B♭0	Selects the previous song number.

• For information about how to input numbers and the keyboard keys you should use for input, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10).

3. Release 6 ▶/■.

4. To start playback, touch 6 ▶/■.

• Playback stops automatically when the end of the file is reached. To stop playback part way through, touch 6 ▶/■.

○ **NOTE**

• In addition to WAV files recorded with the audio recorder, any standard WAV file can also be played back. For details, see "Playing Standard Audio Data (WAV files)" (page EN-40).

■ **To delete a file recorded with the audio recorder**

1. Perform the procedure under "Prepare to use the Audio Recorder" (page EN-33).

2. While holding down 6 ▶/■, press one of the keyboard keys below to select the file you want to delete.

Pressing this key:	Does this:
C1 to A1	Use the keyboard keys to enter the TAKE **. WAV (** = 01 to 99) number.
B0	Selects the next song number.
B♭0	Selects the previous song number.

- For information about how to input numbers and the keyboard keys you should use for input, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10).

3. Release 6 ▶/■.

4. Hold down 3 FUNCTION.
- Do not release 3 FUNCTION until step 6, below.

5. Press the B♭1 keyboard key.

B♭1
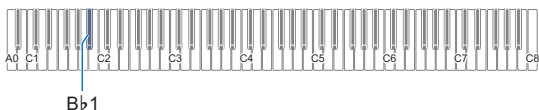
6. Press the C1 keyboard key.
This starts the delete operation.

C1
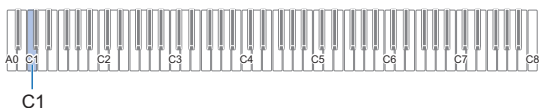
7. Release 3 FUNCTION.

⊙ **NOTE**
- If the WAV file name "TAKE**.WAV (** = 01-99)" and the MP3 file name "TAKE**.MP3 (** = 01-99)" are the same, both the WAV and MP3 files will be deleted when file delete is performed.

USB Flash Drive

Your Digital Piano supports the use of a commercially available USB flash drive to perform the operations below.

Playing Back Song Data from a USB Flash Drive
Standard song data (MIDI files) that has been stored on a USB flash drive with a computer can be played on your Digital Piano.
- For information about how to store song data on a USB flash drive, see "Using a Computer to Copy General Song Data to a USB Flash Drive" (page EN-40).
- For information about the song data playback operation, see "Playing MIDI Data (MIDI Player)" (page EN-28).

Recording a Performance to a USB Flash Drive
See "Using the Audio Recorder to Record Performances" (page EN-33) for information about how to record audio data produced by performances on your Digital Piano to a USB flash drive.

Saving and Importing Data
You can save MIDI recorder song recorded with the Digital Piano's MIDI recorder to a USB flash drive, and import data stored with the Digital Piano and Digital Piano compatible data (user songs, etc.). For details, see "USB Flash Drive Operations" (page EN-38).

Supported USB Flash Drives

Capacity: 32GB or less recommended

⊘ **IMPORTANT!**
- **Use a FAT (FAT32 or exFAT) format USB flash drive.**
- **You may not be able to use a USB flash drive that is recognized as multiple drives on your computer.**
- **A USB flash drive that is recognized as a CD-ROM on your computer is not supported.**
- **A USB flash drive with an anti-virus function and/or security functions is not supported.**

USB Flash Drive and USB Type A Port Handling Precautions

IMPORTANT!

• Be sure to observe the precautions provided in the documentation that comes with the USB flash drive.
• Avoid using a USB flash drive under the conditions below. Such conditions can corrupt data stored on the USB flash drive.
  − Areas subjected to high temperature, high humidity, or corrosive gas
  − Areas subjected to strong electrostatic charge and electrical noise
• Never remove the USB flash drive while data is being written to or loaded from it. Doing so can corrupt the data on the USB flash drive and damage the 🔟 **USB** Type A port.
• A USB flash drive can become warm after very long use. This is normal and does not indicate malfunction.
• Static electricity conducted to the 🔟 **USB** Type A port from your hand or from a USB flash drive can cause malfunction of the Digital Piano. If this happens, turn the Digital Piano off and then back on again.
• Never insert anything besides a USB device that is specified for use with this Digital Piano into the 🔟 **USB** Type A port. Doing so creates the risk of malfunction.

Copyrights

You are allowed to use recordings for your own personal use. Any reproduction of an audio or music format file, without the permission of its copyright holder, is strictly prohibited under copyright laws and international treaties. Also, making such files available on the Internet or distributing them to third parties, regardless of whether such activities are conducted with or without compensation, is strictly prohibited under copyright laws and international treaties. CASIO COMPUTER CO., LTD. shall not be held in any way liable for any use of this Digital Piano that is illegal under copyright laws.

Connecting a USB Flash Drive to and Detaching It from the Digital Piano

IMPORTANT!

• When you perform a USB flash drive operation or turn on the Digital Piano while a USB flash drive is plugged in, the Digital Piano initially needs to perform a "mounting" process to prepare for data exchange with the USB flash drive. Digital Piano operations are momentarily disabled while a mounting process is being performed. The LEDs above 4️⃣ **SOUND MODE** and 6️⃣ ▶/■ will light sequentially from left to right during the mounting process. It may take up to 10 or 20 seconds or even longer for USB flash drive mounting to finish. Do not attempt to perform any operation on the Digital Piano while mounting is in progress. Mounting needs to be performed each time a USB flash drive is connected to the Digital Piano.

NOTE

• Mounting a USB flash drive on the Digital Piano will create a folder named MUSICDAT in the drive's root directory if a MUSICDAT folder does not already exist there. Use this folder when exchanging data between the Digital Piano and USB flash drive.

■ To connect a USB flash drive

1. As shown in the illustration below, insert the USB flash drive into the Digital Piano's 🔟 **USB** Type A port.
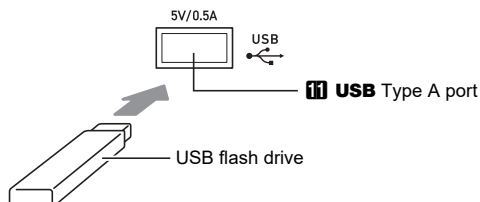
• Carefully push the USB flash drive in as far as it will go. Do not use undue force when inserting the USB flash drive.

■ To disconnect a USB flash drive

1. Check to confirm that there is no data exchange operation being performed, and then pull the USB flash drive straight out.

Formatting a USB Flash Drive

⚠ IMPORTANT!

- **Be sure to format a USB flash drive on the Digital Piano before using it for the first time.**
- **Formatting a USB flash drive deletes all data currently stored on it. Before formatting a USB flash drive, make sure it does not have any valuable data stored on it.**
- **The format operation performed by this Digital Piano is a "quick format". If you want to completely delete all of the data in the USB flash drive, format it on your computer or some other device before formatting it with this Digital Piano.**
- **In the case of an exFAT format USB flash drive, the number of importable files may be limited if long file names are used.**

■ To format a USB flash drive

USB Flash Drive Folder Structure Diagram

Formatting a USB flash drive on the Digital Piano will automatically create the folders shown in the diagram below.

USB flash drive

```
\
└── \MUSICDAT   .MID files, .CMF files, .WAV, .MP3 files
        ├── \61
        ├── \62
        │    ⋮
        ├── \70
        ├── \RECORDER
        │
        ── AAAA.MID
        ── BBBB.CMF
            ⋮
        ── TAKE01.WAV
        ── TAKE02.MP3
        ── TAKE03.MP3
        ── TAKE04.WAV
            ⋮
        ── TAKE99.WAV
```
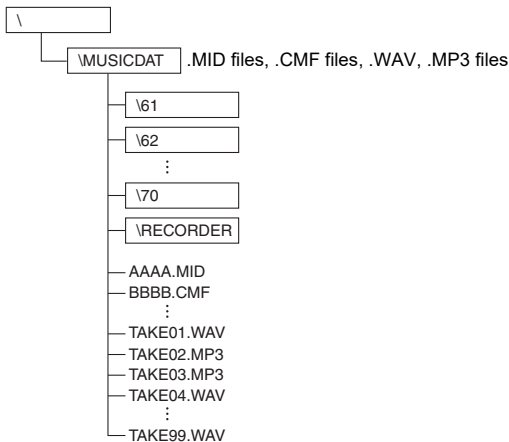
1. Insert the USB flash drive to be formatted into the Digital Piano's 🗓 USB Type A port.

2. Hold down 🗓 FUNCTION.
- Do not release 🗓 FUNCTION until step 5, below.

3. Press the B1 keyboard key.

This causes the 🗓 ▶/■ LED (right) to flash, indicating format standby.

B1

4. Press the C1 keyboard key.

This starts the format operation. The LEDs above 🗓 SOUND MODE and 🗓 ▶/■ will light sequentially from left to right during the format operation.

C1

5. Release 🗓 FUNCTION when formatting starts.

The LEDs stop lighting sequentially when formatting is complete.

USB Flash Drive Operations

The section provides information about the operations below.
• Saving MIDI Recorder Song to a USB Flash Drive
• Importing Data (Files) from a USB Flash Drive to Digital Piano Memory
• Deleting Digital Piano Importable Data (Files) on a USB Flash Drive

■ Data Types

Data types supported by your Digital Piano are those shown in the table below.

● Digital Piano → USB flash drive

The data below can be stored to a USB flash drive from Digital Piano memory.

Data Type	File Name Extension
MIDI recorder song	MRF, MID

● USB Flash Drive → Digital Piano

You can import* the below data types from a USB flash drive into the Digital Piano memory and also delete the data from the USB flash drive.

Data Type	File Name Extension
User Song	CMF, MID (SMF format 0/1)
MIDI recorder song	MRF
Audio data*	WAV, MP3

* Audio data can be deleted, but it cannot be imported to Digital Piano memory.

⚠ IMPORTANT!

• **Even if a file name has one of the extensions shown in the table above, you may not be able to import it into Digital Piano memory if the data was created with a non-compatible device, etc.**

■ To save MIDI Recorder Songs to a USB flash drive

1. Insert the USB flash drive into the Digital Piano's ⑪ **USB** Type A port.

2. If you want to save data in SMF (.MID) format, perform the operation below.

   (1) Enter the Digital Piano MIDI Mode.
     • See "Preparing to Use the MIDI Player" (page EN-28).
   (2) Select the user song that corresponds to the save destination folder (61 to 70).
     • For information about how to input song numbers and the keyboard keys you should use for input, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10).

3. Hold down ❸ **FUNCTION**.
   • Do not release ❸ **FUNCTION** until step 6, below.

4. Press the G1 or A♭1 keyboard key.
This causes the ❹ **SOUND MODE** LED (left) to flash, indicating save standby.
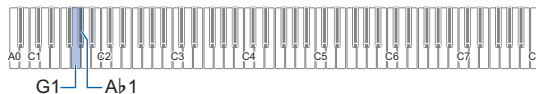
G1: Save as SMF format (.MID) file.
A♭1: Save as CASIO format (.MRF) file.

5. Press the C1 keyboard key.
This starts the save operation. The LEDs above ❹ **SOUND MODE** and ❻ ▶/■ will light sequentially from left to right during the save operation.
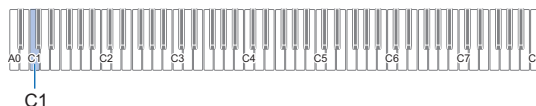
6. Release ❸ **FUNCTION** when saving starts.
The LEDs stop lighting sequentially when the save operation is complete.

■ To load data from a USB flash drive to Digital Piano memory

1. **Copy song data you want to import to Digital Piano memory into one of the sub-folders in the "MUSICDAT" folder of the USB flash drive.**

Data Type	Sub-folder
User songs (CMF, MID)	61 to 70
MIDI recorder song (MRF)	RECORDER

   • Only one song in each sub-folder can be imported. If there are multiple files in a sub-folder, the first file in the list of file names is imported.

2. **Insert the USB flash drive into the Digital Piano's 🕦 USB Type A port.**

3. **Perform the steps below to enter the Digital Piano MIDI Mode.**
   • See "Preparing to Use the MIDI Player" (page EN-28).

4. **Select the user song (song numbers 61-70) or MIDI recorder song (song number 71) that corresponds to the data to be read.**
   • For information about how to input song numbers and the keyboard keys you should use for input, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10).

5. **Hold down 🎴 FUNCTION.**
   • Do not release 🎴 FUNCTION until step 8, below.

6. **Press the A1 keyboard key.**
This causes the 🎴 SOUND MODE LED (right) to flash, indicating import standby.

A1
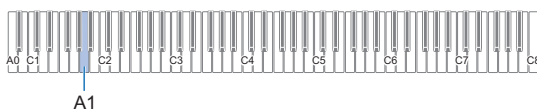
7. **Press the C1 keyboard key.**
This starts the import operation. The LEDs above 🎴 SOUND MODE and 🎴 ▶/■ will light sequentially from left to right during the import operation.

C1
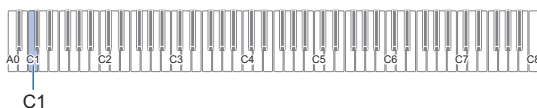
8. **Release 🎴 FUNCTION when importing starts.**
The LEDs stop lighting sequentially when the import operation is complete.

■ To delete USB flash drive data

Use the procedure below to delete the following data from a USB flash drive.
• Songs stored in the following sub-folders, which are located in the MUSICDAT folder: 61 through 70, RECORDER
• Audio data TAKE**.WAV (** = 01-99) or TAKE**.MP3 (** = 01-99) stored in the MUSICDAT folder

1. **Insert the USB flash drive into the Digital Piano's 🕦 USB Type A port.**

2. **Select the data you want to delete.**

■ To delete user songs or MIDI recorder songs
   (1) Enter the Digital Piano MIDI Mode.
      • See "Preparing to Use the MIDI Player" (page EN-28).
   (2) Select the user song or MIDI recorder song that corresponds to the data to be deleted.
      • For information about how to input song numbers and the keyboard keys you should use for input, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10).

■ To delete audio data
   (1) Enter the Digital Piano's Audio Mode.
      • See "Prepare to use the Audio Recorder" (page EN-33).
   (2) Select the audio data that corresponds to the data to be deleted.
      • For information about how to input data numbers and the keyboard keys you should use for input, see "Inputting Song Numbers Using the Song Selection Keyboard Keys (10-key)" (page EN-10).

$\boxed{\text{NOTE}}$
• If there are WAV and MP3 files with the same name, performing Delete File will delete both WAV and MP3 files.

3. **Hold down 🎴 FUNCTION.**
   • Do not release 🎴 FUNCTION until step 6, below.

4. **Press the B♭1 keyboard key.**
This causes the 🎴 ▶/■ LED (left) to light, indicating delete standby.

B♭1
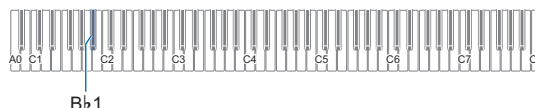
5. Press the C1 keyboard key.

This starts the delete operation. The LEDs above
4 SOUND MODE and **6 ▶/■** will light sequentially
from left to right during the delete operation.

C1

6. Release **3 FUNCTION** when deleting starts.

The LEDs stop lighting sequentially when the delete
operation is complete.

Using a Computer to Copy General Song Data to a USB Flash Drive

You can use the same operations as those for built-in songs
to play back files of the formats below, which are stored in the
MUSICDAT folder.
• Standard MIDI files (SMF format 0/1) or CASIO MIDI files
(CMF format)

1. Connect the USB flash drive to your computer.

2. Create a folder named MUSICDAT in the root directory of the USB flash drive.

• This step is not required if there is already a
MUSICDAT folder in the USB flash drive's root
directory.

3. Copy song data you want to play back on the Digital Piano to the MUSICDAT folder.

• For information about the song data playback
operation, see "Playing MIDI Data (MIDI Player)"
(page EN-28).

Playing Standard Audio Data (WAV files)

Performing a record operation with the Digital Piano's audio
recorder creates a folder named MUSICDAT on the USB flash
drive. WAV files are stored in the MUSICDAT folder,
automatically assigning them names from TAKE01.WAV to
TAKE99.WAV. You also can connect a USB flash drive to a
computer and change the names of audio data (WAV) files to
the format "TAKEXX*.WAV", and move them to the
MUSICDAT folder. Then you will be able to play them back on
the Digital Piano.
* XX = 01 to 99

Supported WAV format (Linear PCM, 16bit, 44.1 kHz, stereo)

🔍 **NOTE**
• You can also play MP3 files (.MP3). See "Playing MP3
Audio Files" (page EN-29).

Configuring Settings

Adjusting the Upper1 Part Volume

To adjust the Upper1 part volume, hold down **8 GRAND PIANO** as you press the keyboard keys shown below.
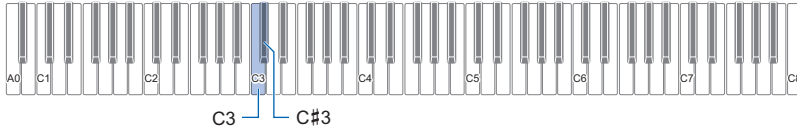
C3 —— C#3

Pressing this key:	Does this:
C3	Lowers the Upper1 part volume by 1.[*1]
C#3	Raises the Upper1 part volume by 1.[*1]
C3 + C#3	Returns the volume of the Upper1 part to the initial default setting.

[*1] You can set the volume within the range of 0 to 42. The reference tone (page EN-11) will sound any time the setting value becomes a multiple of 10 (10, 20, etc.)

Configuring Upper2 Part and Lower Part Settings

You can configure separate Upper2 and Lower (bass) part settings for the following items: volume, pitch, damper pedal effect enable/disable. To configure these settings, hold down **8** **GRAND PIANO** as you press the keyboard keys shown below.

B4: Upper2 Volume (–)
C5: Upper2 Volume (+)
E♭5: Upper2 Detune (–)
E5: Upper2 Detune (+)
F5: Upper2 Damper
F♯5: Lower Volume (–)
G5: Lower Volume (+)
A♭5: Lower Detune (–)
A5: Lower Detune (+)
B♭5: Lower Damper
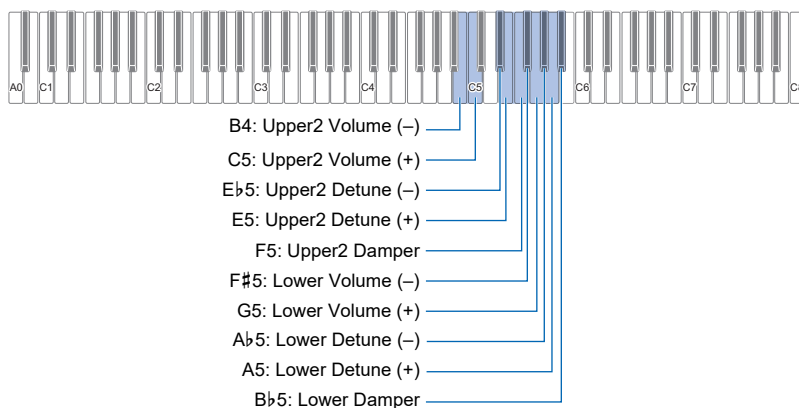
This setting:	Pressing this key:	Does this:
Upper2 Volume Adjusts the volume of the Upper2 part.	B4	Lowers the Upper2 part volume by 1.[*1][*2]
	C5	Raises the Upper2 part volume by 1.[*1][*2]
	B4 + C5	Returns the volume of the Upper2 part to the initial default setting.
Upper2 Detune Raises or lowers the pitch of the Upper2 part, relative to the Upper1 part, within the range of ±99 cents	E♭5	Lowers the pitch of the Upper2 part one cent.[*2]
	E5	Raises the pitch of the Upper2 part one cent.[*2]
	E♭5 + E5	Makes the pitch of the Upper2 part identical to the pitch of the Upper1 part (default).
Upper2 Damper Toggles application of the damper pedal effect to the Upper2 part between enabled and disabled.	F5	Toggles between enabled and disabled.
Lower Volume Specifies the Lower part volume.	F♯5	Lowers the Lower part volume by 1.[*1][*2]
	G5	Raises the Lower part volume by 1.[*1][*2]
	F♯5 + G5	Returns the Lower part volume to the initial default setting.
Lower Detune Raises or lowers the pitch of the Lower part, relative to the Upper1 part, within the range of ±99 cents.	A♭5	Lowers the pitch of the Lower part one cent.[*2]
	A5	Raises the pitch of the Lower part one cent.[*2]
	A♭5 + A5	Makes the pitch of the Lower part identical to the pitch of the Upper1 part (default).
Lower Damper Toggles application of the damper pedal effect to the Lower part between enabled and disabled.	B♭5	Toggles between enabled and disabled.

[*1] You can set the volume within the range of 0 to 42.
[*2] The reference tone (page EN-11) will sound any time the setting value becomes a multiple of 10 (10, 20, etc.)

Adjusting the Volume Balance

You can use the keyboard keys in this section to adjust the volumes of keyboard play, song playback, and externally input audio. To adjust, hold down **3** **FUNCTION** as you press the keyboard keys shown below.

C5: Keyboard Volume (−) ——— A♭5: Wireless Audio Volume (+)
C♯5: Keyboard Volume (+) ——— G5: Wireless Audio Volume (−)
D5: MIDI Song Volume (−) ——— F5: Audio Song Volume (+)
E♭5: MIDI Song Volume (+) ——— E5: Audio Song Volume (−)
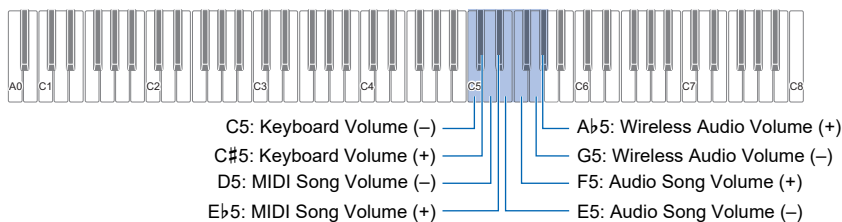
This setting:	Pressing this key:	Does this:
Keyboard Volume Adjusts the volume of keyboard play relative to the overall volume level within the range of 0 (muted) to 42 (maximum).	C5	Lowers the keyboard volume by 1.[1]
	C♯5	Raises the keyboard volume by 1.[1]
	C5 + C♯5	Returns the keyboard volume to its initial default setting.
MIDI Song Volume Adjusts the volume of song (built-in songs, user songs, MIDI recorder song, USB flash drive songs) playback relative to the overall volume level within the range of 0 (muted) to 42 (maximum).	D5	Lowers the MIDI song volume by 1.[1]
	E♭5	Raises the MIDI song volume by 1.[1]
	D5 + E♭5	Returns the MIDI song volume to its initial default setting.
Audio Song Playback Volume Adjusts the playback volume of audio songs[2] relative to the overall volume level within the range of 0 (muted) to 42 (maximum).	E5	Lowers the audio song playback volume by 1.[1]
	F5	Raises the audio song playback volume by 1.[1]
	E5 + F5	Returns the audio song playback volume to its initial default setting.
Wireless Audio Playback Volume Adjusts the wireless audio playback volume relative to the overall volume level within the range of 0 (muted) to 42 (maximum).	G5	Lowers the wireless audio playback volume by 1.[1]
	A♭5	Raises the wireless audio playback volume by 1.[1]
	G5 + A♭5	Returns the wireless audio playback volume to its initial default setting.

[1] The reference tone (page EN-11) will sound any time the setting value becomes a multiple of 10 (10, 20, etc.)

[2] Input audio of audio data (WAV files, MP3 files) stored on a USB flash drive.

Using Center Cancel

Enabling center cancel cancels the vocals of audio songs stored on a USB flash drive or audio input using wireless audio. Note that this function cancels the sound in the center position of the audio, but it may also cancel something else other than the vocal part. How vocal cancel is performed depends on the sound being input.

To change the center cancel setting, hold down **3** **FUNCTION** as you press the keyboard key shown below.

F♯5: Audio Song Center Cancel — └ A5: Wireless Audio Center Cancel
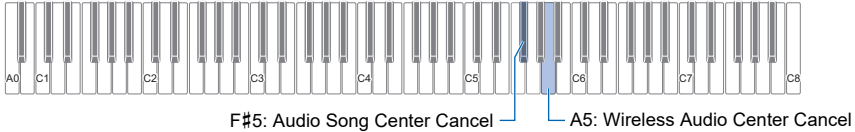
This setting:	Pressing this key:	Does this:
Audio Song Center Cancel Cancels the sound in the center position of an audio song.	F♯5	Each press toggles between on and off.
Wireless Audio Center Cancel Cancels the sound in the center position of wireless audio.	A5	Toggles between on and off.

Configuring MIDI Settings

To change MIDI settings, hold down **3** **FUNCTION** as you press the keyboard keys shown below.

F6: Local Control —
F♯6: Keyboard Channel (−) —
G6: Keyboard Channel (+) —
A♭6: Hi-Res Vel MIDI OUT —
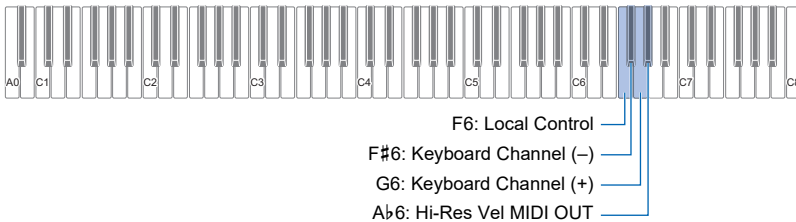
This setting:	Pressing this key:	Does this:
Local Control When this setting is turned off, performance information (MIDI data) is sent from the Digital Piano, but no Digital Piano sound is output. This setting is for when you only want to send MIDI data to an external device.	F6	Toggles between on and off.
Keyboard Channel This setting specifies a channel from 1 through 16 as the MIDI channel that can be used for sending data to an external device.	F♯6	Lowers the Keyboard Channel by 1.
	G6	Raises the Keyboard Channel by 1.
	F♯6 + G6	Returns the Keyboard Channel to its initial default setting (1).
Hi-Reso Velocity MIDI Out This setting enables/disables high-resolution MIDI output of touch pressure (velocity) when keyboard keys are pressed.	A♭6	Toggles between enabled and disabled.

Changing Pedal Functions

A pedal connected to the Digital Piano's **12** **DAMPER PEDAL** jack functions as a damper pedal under initial Digital Piano default settings. You can use the procedure below to change the pedal to another function.

■ **To change the function of the pedal connected to the DAMPER PEDAL jack.**

1. **Hold down** **3** **FUNCTION.**
   • Do not release **3** **FUNCTION** until step 3, below.

2. **Press the A6 keyboard key.**

A6
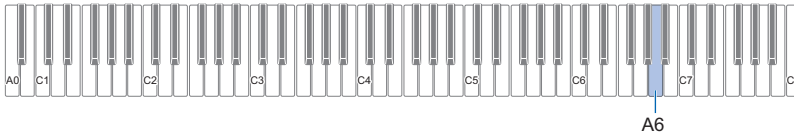
Each time the A6 keyboard key is pressed to change this setting, a notification tone sounds to indicate the newly selected setting.

Notification Tone Count	With this setting:	The pedal does this:
1	Damper	Sustains notes played while the pedal is depressed, even if the keyboard key is subsequently released. Organ and other tones that are sustained as long as keyboard key are depressed continue to sound as long as the pedal is depressed.
2	Sostenuto	Only the notes of the keys that are depressed when the pedal is pressed are sustained, even if the keyboard keys are released, until the pedal is released.
3	Soft	Slightly lowers and softens notes played while the pedal is depressed.
4	Metronome	Starts and stops the metronome.
5	Tempo setting	Pressing the pedal multiple times will cause the tempo value to change to match the timing of the pedal presses.

3. **After the setting is the way you want, release** **3** **FUNCTION.**

Saving Instrument Settings (Auto Resume)

When Auto Resume is enabled, most settings are saved even when the Digital Piano is turned off.
• The following settings are not saved when the power is turned off, even if Auto Resume enabled: Duet settings, song playback part settings, local control, operation lock (on only)

1. **While holding down** **3** **FUNCTION, press the A♭7 key.**

A♭7
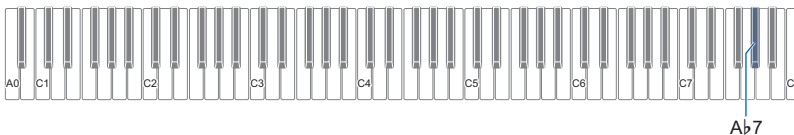
• Each press of the A♭7 key toggles the setting between on and off.

2. **Release** **3** **FUNCTION after switching to the desired setting.**

Other Settings

To change settings shown in the table below, hold down ❸ **FUNCTION** as you press the indicated keyboard keys.

B6: Touch Button Luminosity dim/bright
C7: Touch Button Sensitivity (–)
C♯7: Touch Button Sensitivity (+)
D7: Speaker Out disable/enable/Auto
E♭7: Headphone Mode off/on
F7: Battery Type Alkaline/Ni-MH
F♯7: Power On Alert disable/enable
G7: Panel Light Setting
A7: Notification Tone Volume (–)
B♭7: Notification Tone Volume (+)
B7: Notification Tone Set Selection
C8: Panel Lock disable/enable/Auto

This setting:	Pressing this key:	Does this:
Touch Button Luminosity Toggles the touch button luminosity setting between 1 (dim) and 2 (bright).	B6	Toggles the setting between 1 and 2.
Touch Button Sensitivity Specifies touch button sensitivity within the range of –1 (Low) to 0 (Standard) to +1 (High).	C7	Lowers the touch button sensitivity setting by 1.
	C♯7	Raises the touch button sensitivity setting by 1.
Speaker Out When Auto is selected for this setting, no sound is output from the Digital Piano speakers when something is plugged into the ❾ **PHONES** jack (default). Regardless of whether something is plugged into the ❾ **PHONES** jack, enabling this setting causes sound to be output from the speakers. Sound is not output from the speakers when this setting is disabled.	D7	Cycles between off, on and auto. Off: Off tone On: Option tone × 1 Auto: Option tone × 2
Headphone Mode When enabled, the sound quality of the grand piano tone heard through headphones is automatically adjusted to reproduce the natural expanse of sound that you hear when playing an acoustic piano (page EN-46).	E♭7	Toggles between enabled and disabled.
Battery Type Sets the type of battery being used.	F7	Toggles between alkaline and rechargeable NiMH batteries. Alkaline battery: 1 notification tone Rechargeable NiMH battery: 2 notification tones
Power On Alert Enables or disables Power On Alert (page EN-7).	F♯7	Toggles between enabled and disabled.
Panel Light Setting To save power, you can configure a setting that will turn off all button lights, except for ❸ **FUNCTION**, after a certain period of non-operation. You can specify a trigger time of 5, 30, 60, or 120 seconds. You can also disable this setting, which means that lights will remain on.	G7	See "To change the panel light setting" (page EN-47).

This setting:	Pressing this key:	Does this:
Notification Tone Volume The notification tone volume can be adjusted within the range of 0 (muted) to 10 (maximum).	A7	Lowers the notification tone volume by 1.
	B♭7	Raises the notification tone volume by 1.
	A7 + B♭7	Returns the notification tone volume to its initial default setting.
Notification Tone Set Selection Your Digital Piano lets you know the results of operations by sounding notification tones. You can select from among three different notification tone sets.	B7	Cycles the setting to the next notification tone set (1, 2, 3).
Panel Lock While this setting is enabled, the LEDs of all touch buttons, except **❸ FUNCTION**, are turned off, and all operations are disabled at all times, except for those below. While Auto is selected for this setting, operations are disabled during performances only.* • **❶** ⏻ (Power) button power operations. Turning off Digital Piano power cancels panel lock. • Touch button operation to cancel Panel Lock.	C8	Cycles between off, on and auto. Even after selecting ON for this setting, you can change the setting by holding down **❸ FUNCTION** and pressing the C8 keyboard key. Off: Off tone On: Option tone × 1 Auto: Option tone × 2

* Pressing any key or pedal is interpreted as the start of a performance and causes operation to be locked.

■ **To change the panel light setting**

1. **Hold down ❸ FUNCTION.**
   • Do not release **❸ FUNCTION** until step 3, below.

2. **Press the G7 keyboard key.**
   Each time the G7 keyboard key is pressed to change this setting, a notification tone sounds to indicate the newly selected setting.

Notification Tone*	Setting	Description
Off tone	Off	Touch button lights remain lit.
Option tone × 1	5 seconds	After non-operation of the front panel for the specified time, the lights of all touch buttons, except for **❸ FUNCTION**, will turn off.
Option tone × 2	30 seconds	
Option tone × 3	60 seconds	
Option tone × 4	120 seconds	

* For more information, see "Notification Tones" (page EN-11).

3. **After the setting is the way you want, release ❸ FUNCTION.**

🔲 NOTE
• Turning on the Digital Piano under battery power only (without AC adaptor power) will cause the Panel Light Setting to change automatically to 60 seconds to conserve power. You can change the Panel Light Setting if you want.

Factory Reset (Initialization)

You can use the procedure below to return the Digital Piano's stored data and settings to their initial factory defaults any time you want.
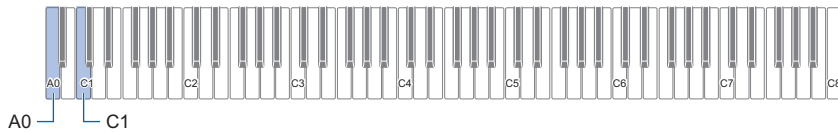
1. **Hold down** **❸** **FUNCTION.**

2. **Press the A0 keyboard key.**

This enters factory reset standby and causes the **❸** **FUNCTION** light to flash.

• Step 3 below will execute the initialization operation. If you want to cancel initialization at this point, release **❸** **FUNCTION**.

3. **To execute initialization, press the C1 keyboard key.**

This starts initialization.

4. **Release** **❸** **FUNCTION.**

• The initialization operations takes some time to complete. Wait until initialization is complete. All front panel touch button lights (**❸** **FUNCTION** to **❽** **GRAND PIANO**) light when initialization is complete.

Using the Wireless Function

Wireless functionality can be used with the included Wireless MIDI & Audio Adaptor.
There are two ways to connect wirelessly.

Playing Audio from a Smart Device (Bluetooth Audio Pairing)

Using the included Wireless MIDI & Audio Adaptor, this unit can be paired with a Bluetooth audio-enabled device (smart device) to play audio from an external device through the Digital Piano's speakers.

⚠ IMPORTANT!

- **When pairing, keep the volume of the Digital Piano and the external device turned down.**
- **If the audio from the external device sounds distorted, turn down the volume on the external device.**
- **Due to the characteristics of Bluetooth, the sound will be delayed. If this is an issue, connect with a cable.**

■ **To pair your Digital Piano with a Bluetooth audio-compatible device**

1. **Connect the Wireless MIDI & Audio Adaptor to the 🔟 USB Type A port.**

Wireless MIDI & Audio Adaptor

🔟 **USB** Type A port
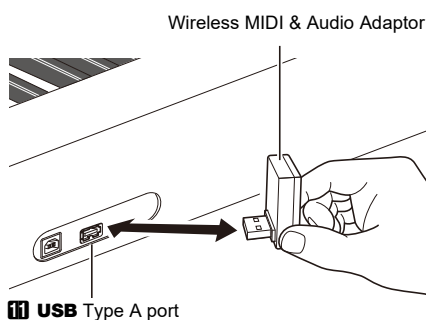
2. **Open the Bluetooth settings screen of the external device and switch on the Bluetooth function if it is off.**

3. **While holding down 3️⃣ FUNCTION on the unit, press the C♯1 key.**

C♯1
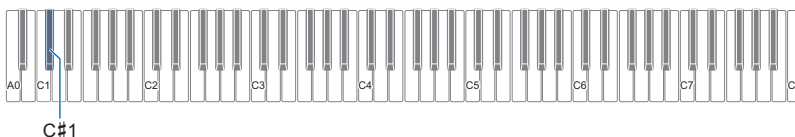
The Bluetooth indicator on the Digital Piano will flash to indicate it is in pairing standby.
- If the wireless function setting of the Digital Piano is off, it will automatically switch on.

4. **Release 3️⃣ FUNCTION.**

5. **Select "WU-BT10 AUDIO" on the Bluetooth audio-compatible device's settings screen and pair it with your Digital Piano.**
- When pairing is complete, the Digital Piano's Bluetooth indicator will change from flashing to lit and a piano tone notification will sound.
- The audio output from the external device will be played through the speakers of your Digital Piano.

🔍 NOTE

- Both the wireless function of your Digital Piano and the Bluetooth function of the Bluetooth audio-enabled device must be turned on.
- To change the settings of your Digital Piano's wireless function, see "Enabling/Disabling the Wireless Function" (page EN-51).
- Pairing information of previously connected Bluetooth audio-enabled devices are saved in the Wireless MIDI & Audio Adaptor. Once saved, Bluetooth audio pairing is automatic without having to perform the Bluetooth audio pairing operation.

■ **To delete the pairing registration of a Bluetooth audio-compatible device**

NOTE
• Performing the following operation will disable pairing between the Digital Piano and the currently connected Bluetooth audio-compatible device. If you have a problem connecting to a Bluetooth audio-compatible device, perform the following steps then try pairing again. see "Playing Audio from a Smart Device (Bluetooth Audio Pairing)" (page EN-49).
• After performing the steps below to delete the pairing registration of the Bluetooth audio-compatible device, please also delete the pairing registration of the connected device.
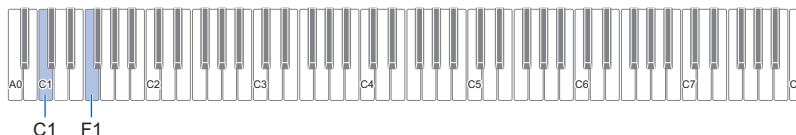
1. **Connect the Wireless MIDI & Audio Adaptor to the 🈙 USB Type A port.**
• Bluetooth audio pairing settings cannot be deleted without the Wireless MIDI & Audio Adaptor connected.

2. **Hold down 🈁 FUNCTION.**

3. **Press the F1 key.**
The Bluetooth indicator of the Digital Piano will flash rapidly to indicate it is ready to delete the Bluetooth connection history.
• Deletion is performed as follows. To cancel, release 🈁 **FUNCTION** here.

4. **To delete, press the C1 key.**
• The Bluetooth indicator will turn off and the Bluetooth connection will be lost.

5. **Release 🈁 FUNCTION.**

■ **Bluetooth Audio Input Volume Control and Center Cancel**
When audio from a Bluetooth audio-compatible device is played through the Digital Piano's speakers, the volume can be adjusted and center cancel can be used.
• For information on adjusting the volume of the Bluetooth audio input, see "Adjusting the Volume Balance" (page EN-43).
• For information on Center Cancel, see "Using Center Cancel" (page EN-44).

Connecting to a Bluetooth Low Energy MIDI-enabled Device

The Wireless MIDI & Audio Adaptor can be used to connect your Digital Piano to a Bluetooth Low Energy MIDI-enabled device (smart device).

1. **Connect the Wireless MIDI & Audio Adaptor to the 🈙 USB Type A port.**

2. **Select "WU-BT10 MIDI" in the settings screen of the application installed on the Bluetooth Low Energy MIDI-compatible device ("Using the Dedicated App" (page EN-52)) and connect the device to the Digital Piano.**

IMPORTANT!
• **Do not operate the Digital Piano while it is waiting to connect to the Bluetooth Low Energy MIDI-compatible device.**

NOTE
• Both the wireless function of this unit and the Bluetooth function of the Bluetooth Low Energy MIDI-enabled device must be turned on.
• To change the settings of this unit's wireless function, see "Enabling/Disabling the Wireless Function" (page EN-51).
• Each time you use a Bluetooth Low Energy MIDI-enabled device, you need to connect to it as shown above.
• Depending on the device and OS version, connecting Bluetooth audio and Bluetooth Low Energy MIDI simultaneously may cause issues with MIDI functionality. If this occurs, disable the Bluetooth audio connection from the Bluetooth audio-connected device.

Enabling/Disabling the Wireless Function

1. Connect the Wireless MIDI & Audio Adaptor to the 🔢 USB Type A port.

2. While holding down 3 FUNCTION, press the D1 key.

D1
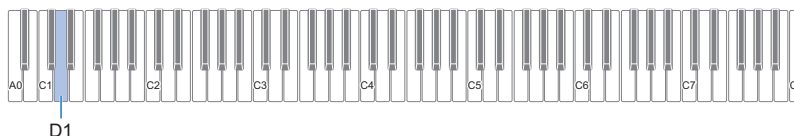
- Each press toggles the wireless function between enabled and disabled and sounds a notification tone.
- When enabled, the Bluetooth indicator lights up when the Digital Piano is connected to an external device that has already been paired. When disabled, the indicator turns off.
- If the Wireless MIDI & Audio Adaptor is not installed when the wireless function is enabled, the Bluetooth indicator will flash to indicate an error.

3. Release 3 FUNCTION after making the desired setting.

■ **About notification tones**

A notification tone sounds when the Bluetooth connection status changes.

Notification description	Notification tone
Connection of a Bluetooth audio-enabled device	A piano sound with a rising melody is played.
Disconnection from a Bluetooth audio-enabled device	A piano sound with a falling melody is played.
Connection of a Bluetooth Low Energy MIDI-enabled device	A vibraphone sound with a rising melody is played.
Disconnection from a Bluetooth Low Energy MIDI-enabled device	A vibraphone sound with a falling melody is played.

Adjusting the Notification Tone Volume when Enabling/Disabling the Wireless Function

To adjust the volume of the notification tone, hold down 3 FUNCTION and press the following keyboard keys.
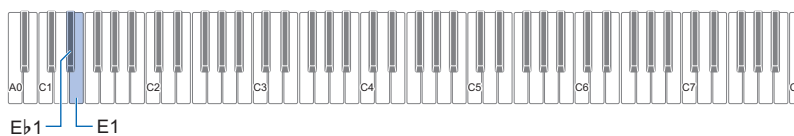
E♭1 — — E1

Pressing this key:	Does this:
E♭1	Decreases the volume of the notification tone by 1 step*
E1	Increases the volume of the notification tone by 1 step*
E♭1 + E1	Resets the volume of the notification tone to the default setting

* Volume can be adjusted in the range of 0 to 10.

Using the Dedicated App

When the Digital Piano is connected to a smart device such as a smartphone or tablet, the following operations can be performed:
• Control the Digital Piano from the smart device (Piano Remote Controller)
• Transfer music data from the smart device to the Digital Piano
• Use the lesson function of the app for smart devices with the Digital Piano
• Play music on the smart device app through the Digital Piano's speakers

Downloading the App for Smart Devices

Download the CASIO MUSIC SPACE app from our website and install it on your smart device.
https://support.casio.com/global/en/emi/manual/PX-S5000/

Connecting to a Smart Device

There are two ways to connect, via Bluetooth or via a commercially available USB cable.

IMPORTANT!
• **When using the app for smart devices (made by CASIO), do not connect via Bluetooth and via a USB cable at the same time.**

■ **To connect the Digital Piano to a smart device via Bluetooth**

You can connect via Bluetooth using the Wireless MIDI & Audio Adaptor.

1. **Refer to "Downloading the App for Smart Devices" (page EN-52) to install the app on your smart device.**

2. **Connect the Wireless MIDI & Audio Adaptor to the ⑪ USB Type A port (page EN-9).**

3. **Select "WU-BT10 MIDI" on the connection setting screen of the app and connect to your Digital Piano. (Connecting a Bluetooth Low Energy MIDI-enabled device)**
   • For more information, please see the app's instructions.
   • Bluetooth audio pairing is used for Bluetooth audio connections. See "Playing Audio from a Smart Device (Bluetooth Audio Pairing)" (page EN-49).

Wireless MIDI & Audio Adaptor

5V/0.5A

Smart Device   ⑪ **USB** Type A port
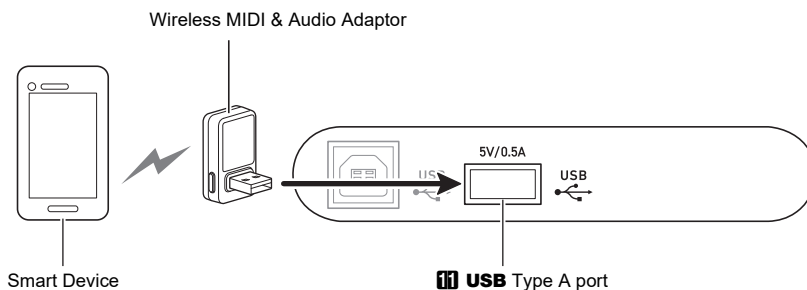
⚠ IMPORTANT!

- **Do not operate your Digital Piano while connecting the app for smart devices.**
- **When connected via Bluetooth, distortion may be noticeable depending on the connection and the performance of the smart device. If you hear distortion, try the following:**
  - − **Check the app's instructions for MIDI playback quality settings.**
  - − **If you are connected to Wi-Fi, turn it off.**
  - − **Connect with a cable.**

■ To connect the Digital Piano to a smart device with a cable

For information on the cables required for connection, please see the connection settings in the CASIO MUSIC SPACE app.
https://web.casio.com/app/en/music_space/support/connect.html

- When connecting a USB cable, you may need an adapter in addition to a commercially available USB cable.
- The adapter you may need depends on your phone or tablet.
- Some phones and tablets do not support USB cable connection.

1. Refer to "**Downloading the App for Smart Devices**" (page **EN-52**) to install the app on your smart device.

2. Connect the **🔟 USB** Type B port of the Digital Piano to the smart device using a commercially available USB cable.
- After connecting your Digital Piano to a smart device, various operations can be performed from apps on the smart device. For details on the various operations, please refer to the app's instructions.

⚠ IMPORTANT!

- **Connect with a USB cable of 2m or less.**

Using External Devices Connected via Cable

Playing Your Digital Piano through an Amplifier or Other Audio Equipment

When connected to audio equipment such as an amplifier for musical instruments, you can enjoy playing at a louder volume and higher sound quality, depending on the speaker capabilities of the equipment.

⚠ IMPORTANT!

- **Turn off the external device when making connections. After connecting, turn down the Digital Piano and external device volume levels to their minimum whenever turning power on or off.**
- **After connecting, turn on the power to the Digital Piano and the external equipment in that order.**
- **If the sound of the Digital Piano played through the external equipment sounds distorted, turn down the volume of the Digital Piano.**

Commercially available cables can be used for connection.
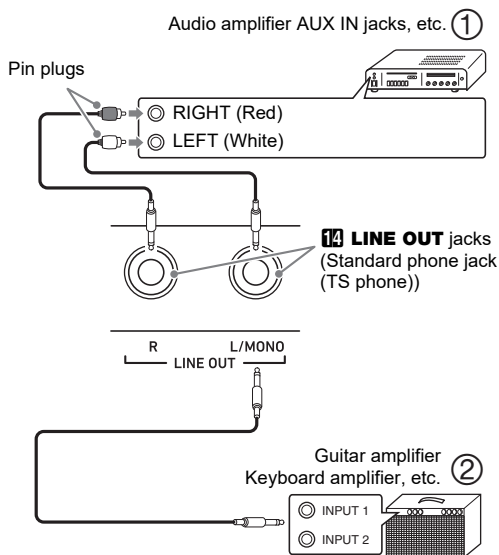
■ **Connecting to audio equipment (Figure ①)**
LINE OUT R (Right) is the right channel sound and LINE OUT L/MONO (Left) is the left channel sound. Connect both with a commercially available cable as shown in Figure ①. In most cases, switch the input selector of the audio equipment to the connected terminal (e.g., AUX IN).

■ **Connecting to a musical instrument amplifier (Figure ②)**
If you connect only LINE OUT L/MONO, you will get a monaural mix of both channels. Use a commercially available cable to connect as shown in Figure ②.

Connecting to a computer or smart device with MIDI

You can send and receive performance information (MIDI data) by connecting this unit to a computer or smart device. MIDI apps running on your computer or smart device can be used to record your performances or send MIDI data to your Digital Piano for playback.

■ **Computer Operating Environment**
The computer environment required to send and receive MIDI data is as follows: Please be sure to check your computer environment in advance.

● **Supported OS**
Windows 8.1[*1]
Windows 10[*2]
Windows 11
macOS 10.13, 10.14, 10.15, 11, 12

[*1] Windows 8.1 (32bit and 64bit versions)
[*2] Windows 10 (32bit and 64bit versions)

● **USB port**

🔍 NOTE

- For the latest OS support information, please see the "Operating System Compatibility (Windows/macOS)" section on our website below.
  https://support.casio.com/global/en/emi/manual/PX-S5000/

■**How to connect to a computer**

⚠ IMPORTANT!

- **Failure to connect using the correct procedure may mean you cannot send or receive data. Be sure to follow these steps to connect.**

1. **Turn off the power to your Digital Piano and start up your computer.**
   - Do not open any music software on your computer yet.

2. **Connect a commercially available USB cable between the 🔟 USB Type B port and your computer.**
   - Use a USB 2.0 or 1.1 A-B connector type cable.

3. **Turn on the power to your Digital Piano.**
   - When connecting for the first time, the driver required to send and receive MIDI data will automatically be installed on the computer.

4. **Open your music software on your computer.**

5. **Select "CASIO USB-MIDI" as the MIDI device in the settings of your music software.**
   - Please refer to the manual of your music software for information on how to select a MIDI device.

⚠ IMPORTANT!

- **Be sure to turn on the Digital Piano before launching the music software on your computer.**
- **MIDI data is not sent or received when songs are being played.**

🔍 NOTE

- After one successful connection, you can turn on/off the computer and the Digital Piano leaving the USB cable connected.
- For detailed MIDI specifications of this Digital Piano and the latest MIDI support information, please visit the following website:
  https://support.casio.com/global/en/emi/manual/PX-S5000/

- For MIDI-related settings, see "Configuring MIDI Settings" (page EN-44).

■**Connecting to a smart device**

You can connect your Digital Piano to a smart device running MIDI apps.

- For a list of devices that can be used, please see the "Operating System Compatibility (iOS/Android)" section on our website below.
  https://support.casio.com/global/en/emi/manual/PX-S5000/

🔍 NOTE

- We recommend using devices listed in the "Tested devices (USB-MIDI connection)" section.
- Please note that listed devices are not guaranteed to work with all MIDI apps running on the device.
- Depending on the operating environment, it may not be possible to connect correctly.
- Even if the device has been tested, it may not work properly due to device or OS version upgrades, etc.

Troubleshooting

● **Nothing happens when I touch a touch button.**

Cause:
- a. Wearing glove or touching with a fingernail or stylus.
- b. Incorrect touch button sensitivity setting.

Action:
- a. When operating a touch button, touch it firmly with a bare finger.
- b. Perform the steps below to increase touch button sensitivity.
   - (1) Turn off the Digital Piano.
   - (2) While holding down the C8 keyboard key (the one on the far right), press the **1** ⏻ (Power) button.
      - Keep the C8 keyboard depressed until the touch buttons start to light in sequence from left to right (from **3** FUNCTION to **8** GRAND PIANO). You do not need to keep the **1** ⏻ (Power) button depressed.

● **No sound is produced when I press a keyboard key.**

Cause:
- a. The **2** volume knob setting is too low.
- b. Headphones or an adaptor plug is plugged into one of the **9** PHONES jacks.
- c. MIDI Local control is turned off.
- d. Speaker Out is turned off.

Action:
- a. Rotate the **2** volume knob.
- b. Disconnect whatever is connected to the **9** PHONES jacks.
- c. Turn on the Local control setting (page EN-44).
- d. Set the Speaker Out (page EN-46) setting to on or auto.

● **The Digital Piano emits a loud sound and suddenly turns off.**

Action:
Replace the batteries with new ones or switch over to AC adaptor power (page EN-5).

● **The pitch of the Digital Piano is off.**

Cause:
- a. The current transpose setting of the keyboard is something other than the default setting.
- b. The Digital Piano's tuning setting is something other than "440.0Hz".
- c. Octave shift is enabled.
- d. The current scale setting is something other than "Equal Temperament".

Action:
- a. Return transpose (page EN-17) to its initial default setting.
- b. Change the tuning setting to "440.0Hz" (page EN-17), and return Upper2 Detune and Lower Detune (page EN-42) to their default settings.
- c. Change the octave shift setting to 0 (page EN-18).
- d. Change the scale setting to "Equal Temperament".

● **Nothing happens when I press a pedal.**

Cause:
The pedal cord is not connected correctly to the **12** DAMPER PEDAL jack or **13** PEDAL UNIT jack, or the plug is not plugged in completely.

Action:
Confirm that the pedal cord is connected correctly, and that the plug is inserted as far as it will go.

● **Tones and/or effects sound strange. Note intensity does not change even though I alter key pressure. Turning power off and then back on again does not eliminate the problem.**

Cause:
Auto Resume is enabled.

Action:
Disable Auto Resume (page EN-45) and turn off power.

● **I cannot send or receive MIDI data when connected to a computer.**

Action:
a. Check to make sure that the USB cable is connected to the Digital Piano and computer, and that the correct device is selected with your computer's music software.
b. Turn off the Digital Piano and then exit the music software on your computer. Next, turn the Digital Piano back on and then restart the music software on your computer.

● **A tone's quality and volume sounds slightly different depending where it is played on the keyboard.**

Cause:
This is an unavoidable result of the digital sampling process,* and does not indicate malfunction.
* Multiple digital samples are taken for the low range, middle range, and high range of the original musical instrument. Because of this, there may be very slight differences in tonal quality and volume between sample ranges.

● **Touching a button causes the note that is sounding cuts out momentarily or a slight change in how effects are applied.**
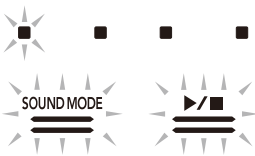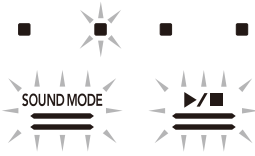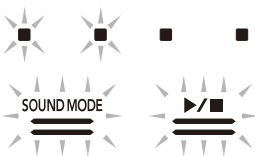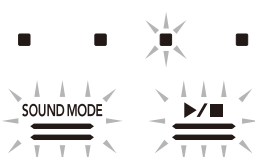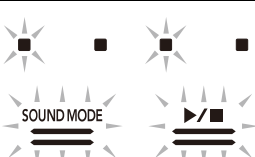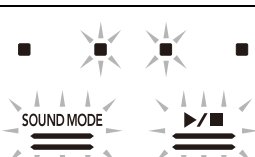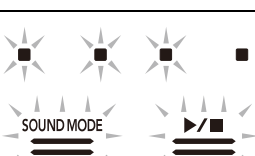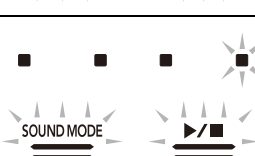
Cause:
This happens when the sounds of multiple parts are sounding at the same time while using layer, using the Duet Mode, playing back a built-in song, recording, etc. Pressing a button when one of these conditions exists will cause the effect setting that is built into the tone to change automatically, which causes notes to cut out momentarily or causes a slight change in how effects are being applied.
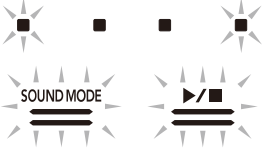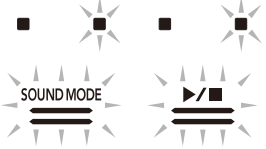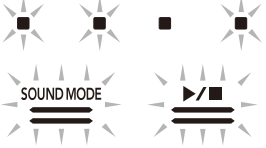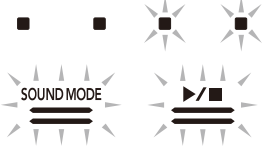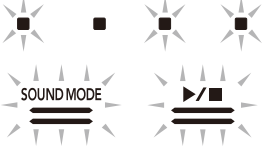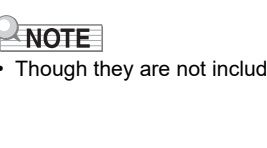
● **How do I delete a user song?**

Action:
Deleting a user song is possible from the smart device connected to the Digital Piano. For details, see the explanation for "Using the Dedicated App" (page EN-52).

Error Indicators

Indicators	Cause	Action
	The USB flash drive is not plugged correctly into the Digital Piano's 🎚 **USB** Type A port.	Plug the USB flash drive correctly into the 🎚 **USB** Type A port.
	The USB flash drive was removed while some operation was in progress.	Do not remove the USB flash drive while any operation is in progress.
	The USB flash drive is write-protected.	Write-enable the USB flash drive.
	The USB flash drive is protected by anti-virus software.	Use a USB flash drive that is not protected by anti-virus software.
	There is no loadable or playable file in the MUSICDAT folder.	Move the file you want to load or play to the MUSICDAT folder (page EN-40).
	You are attempting to save data to a USB flash drive when there is no data to save.	Record something before performing a save operation.
	You are attempting to save data with a name that is already used for another read-only file on the USB flash drive.	• Rename the file on the USB flash drive to something else and then save it. • Remove the read-only attribute from the existing USB flash drive file and overwrite it with the new data. • Use a different USB flash drive.
	There is not enough room available on the USB flash drive.	Delete some of the files on the USB flash drive to make room for new data or use a different USB flash drive.
	You are attempting to use the audio recorder to record when there are already 99 songs recorded. TAKE99.WAV (page EN-34) or TAKE99.MP3 (page EN-29) already exist in the MUSICDAT folder on the USB flash drive.	Use a computer to move the MUSICDAT folder containing files TAKE**.WAV (** = 01-99) or TAKE**.MP3 (** = 01-99) to another folder or drive.
	An attempt was made to read or play a file in SMF format 2.	The SMF format that can be read and played back by the Digital Piano is "0" or "1".
	The file on the USB flash drive is too large to play on this Digital Piano.	Your Digital Piano can play back SMF files up to approximately 100 KB in size.

Indicators	Cause	Action
SOUND MODE ▶/■	The USB flash drive data is corrupted.	–
SOUND MODE ▶/■	There is not enough Digital Piano memory available to convert a song recorder song to SMF data and store it on the USB flash drive.	• Reduce the size of the song data. • Delete the data tracks that can be deleted.
SOUND MODE ▶/■	This Digital Piano does not support the USB flash drive file version.	Use a version that the Digital Piano supports.
SOUND MODE ▶/■	The USB flash drive format is not compatible with this Digital Piano.	• Use a computer or other device to change the USB flash drive format to something that is compatible with the Digital Piano (page EN-37). • Use a different USB flash drive.
	The USB flash drive is corrupted.	Use a different USB flash drive.
SOUND MODE ▶/■	The Wireless MIDI & Audio Adaptor is not connected to the 🔟 **USB** Type A port.	Connect the Wireless MIDI & Audio Adaptor to the 🔟 **USB** Type A port.

🔍 **NOTE**

• Though they are not included in the above illustrations, the "L" and "R" indicators above the **7** ● (REC) also light for all errors.

Reference

Product Specifications

Model	PX-S5000BK
Keyboard	88-key piano keyboard
Duet	Adjustable tone range (–2 to +2 octaves)
Transpose	–12 to 0 to +12 semitones
Octave shift	–2 to 0 to +2 octaves
Sound Source	
Number of Tones	23 (22 full-keyboard tones + 1 low-range bass tone) • Layer (excluding bass tone) • Split (bass tone only in low range)
Maximum polyphony	192 notes
Touch Response	5 sensitivity levels, Off
Tuning	415.5 Hz to 440.0 Hz to 465.9 Hz (0.1 Hz units)
Temperament	Equal temperaments plus 16 other types
Acoustic Simulator	Key off simulator, Hammer response, Key off response, String resonance, Damper resonance, Damper noise, Key on action noise, Key off action noise
Digital Effect	
Sound Mode	Hall simulator (4 types), Reverb (8 types), Surround (2 types)
Other Effects	Chorus (4 types), Brilliance (–3 to 0 to +3), Headphones mode
Demo Song	1
Music Library	
Built-in Songs	60
User Songs	10 (Up to approximately 100KB per song, approximately 1MB for 10 songs)* * Based on 1KB = 1024 bytes, 1MB = 1024^2 bytes
Song volume	Adjustable (Setting also affects MIDI recorder song playback.)
Part On/Off	L, R
MIDI Recorder	Real-time recording and playback as MIDI data
Number of Song	1
Number of Tracks	2
Capacity	Approximately 10,000 notes total
Recorded Data Protection	Built-in flash memory
MIDI recorder volume	Adjustable (Setting also affects Music Library song playback.)
Audio Recorder	Real-time recording and playback as audio data
Number of songs	99 (files)
File format	Recording/playback: WAV (linear PCM, 16 bit, 44.1 kHz, stereo) Playback only: MP3 (MPEG-1 Audio Layer 3, 32–320 kbps/Variable bit rate (VBR) compatible, 44.1 kHz/48 kHz, mono/stereo)
Maximum recording time	Approximately 25 minutes per file
Recording medium	USB Flash Drive
Metronome	
Beat bell	Off, 1 to 9 (beats)
Tempo Range	20 to 255
Metronome Volume Level	Adjustable
Pedals	
Included SP-3 pedal assignable functions	Damper (off, on), sostenuto (off, on), soft (off, on), metronome (start, stop), tempo setting
Separately available SP-34 pedal unit	Damper (continuously variable), sostenuto (off, on), soft (off, on)
Other Functions	• Auto Resume • Panel Lock • Notification tones (Selectable sets 1, 2, 3; Adjustable volume)
MIDI	16-channel multi-timbre receive

Inputs/Outputs	
PHONES jacks	Stereo mini phone jack (Mini TRS phone) × 2
Power	12V DC
LINE OUT R, L/MONO jacks	Standard phone jack (TS phone) × 2 Output impedance: 600 Ω Output voltage: 1.3 V (RMS) MAX
USB port	Type A, Type B
DAMPER PEDAL jack	Standard phone jack (TS phone)
PEDAL UNIT jack	Proprietary jack
Acoustics	
Amp output	8 W + 8 W
Speakers	16 cm × 8 cm (oval) × 2
Power Supply	2-way
Batteries	6 AA-size alkaline batteries or AA-size rechargeable nickel metal hydride batteries
	Continuous Operation: Approximately 4 hours (alkaline batteries) or approximately 4 hours (nickel metal hydride batteries) continuous operation* Actual continuous operation time may be shorter due to battery type and performance type.
AC Adaptor	AD-A12150LW
Auto Power Off	Approximately four hours (under AC adaptor power) or six minutes (under battery power) after last operation; Can be disabled.
Power Consumption	12 V ⎓ 10 W
Dimensions	132.2 (W) × 23.2 (D) × 10.2 (H) cm (52 1/16 × 9 1/8 × 4 inch)
Weight	Approximately 11.5 kg (25.4 lbs) (without batteries)

* Measured values while using eneloop batteries.
  eneloop is a trademark of Panasonic Corporation.

• Specifications and designs are subject to change without notice.

Operating Precautions

■ Environment

- Place the Digital Piano onto a stable and flat surface. If you want to place the Digital Piano on a table or other surface instead of a separately available stand, place it on a stable and flat surface where the entire bottom of the Digital Piano fits within that surface.
- To prevent the formation of mold, set up the product in a well-ventilated location where the temperature and humidity ranges shown below are maintained.
  – Recommended temperature range: 15 to 25°C
  – Recommended humidity range: 40 to 60% RH
- Do not set up the product in locations subject to extreme variations in temperature and/or humidity. Doing so can cause metal components to rust, coatings to degrade, and components to warp and split.

■ User Maintenance

- Wipe the product with a soft, dry cloth. Do not use a tissue, which can cause scratching.
- When soiling is more serious, moisten a soft cloth with a weak solution of water and a mild neutral detergent, wring out all excess moisture from the cloth, and then wipe the product. After that, wipe again with a separate soft dry cloth.
- Do not use any cleaning agents, chlorine disinfectants, sanitizing wipes, or other items that include benzene, organic solvents, alcohol, or other solvents for cleaning. Doing so can cause discoloration, deformation, paint peeling, cracking, etc.

■ Sterilization and Disinfection

- After wiping the product two or three times with a non-alcohol sanitizing wipe, use a soft, dry cloth to wipe it dry.
- Note that failure to wipe the product dry can cause streaks to remain.
- If the product is used by multiple parties, hand disinfection before each use is recommended.

■ Included and Optional Accessories

Use only accessories that are specified for use with this product. Use of unauthorized accessories creates the risk of fire, electric shock, and personal injury.

■ Weld Lines

Lines may be visible on the exterior of the product. These are "weld lines" that result from the plastic molding process. They are not cracks or scratches.

■ AC Adaptor Handling Precautions

- Never connect the AC adaptor (JEITA Standard, with unified polarity plug) that is specified with this Digital Piano to any other device besides this Digital Piano. Doing so creates the risk of malfunction.
- The AC adaptor cannot be repaired. If your AC adaptor malfunctions or becomes damaged, you need to purchase a new one.
- AC adaptor operating environment:
  Temperature: 0 to 40°C
  Humidity: 10% to 90% RH
- Output polarity: ◇—●—◇
- Use of a different type AC adaptor can cause smoking or malfunction.

■ Batteries

Note the precautions below when using rechargeable batteries.
(Models that support use of rechargeable batteries only)

- Use Panasonic Group AA-size eneloop rechargeable batteries.
  Do not use any other type of batteries.
- Use only the specified charger to charge batteries.
- Rechargeable batteries must be removed from the product for charging.
- For information about using eneloop batteries or their specified charger, be sure to read the user documentation and precautions that come with each item, and use them only as directed.

Be sure to replace batteries at least once a year, even if there is no indication of low battery power. Dead rechargeable batteries (eneloop) in particular may deteriorate if they are left in the product. Remove rechargeable batteries from the product as soon as possible after they go dead.

■ About the front panel

Operating the front panel when it is dusty or dirty may scratch it.
Gently wipe the panel with a soft, clean cloth to remove dust and dirt before use.
Use your fingers to operate the front panel. Using fingernails or sharp objects may scratch the surface.

Tone List

Tone Name	Keyboard Key Note Name	Sending and Receiving		Receiving Only	
		Program Change	Bank Select MSB	Program Change	Bank Select MSB
GRAND PIANO CONCERT	A0	0	16	0	0
GRAND PIANO BRIGHT	B♭0	1	16	1	0
GRAND PIANO MELLOW	B0	2	16	0	1
ROCK PIANO	C1	3	16	1	1
JAZZ PIANO	C♯1	4	16	0	2
POP PIANO	D1	5	16	1	2
MODERN PIANO	E♭1	6	16	1	3
DANCE PIANO	E1	7	16	1	4
HONKY-TONK PIANO	F1	8	16	3	0
PIANO PAD	F♯1	9	16	0	5
ELEC.PIANO	G1	10	16	4	0
DIGITAL E.PIANO 1	A♭1	11	16	5	0
DIGITAL E.PIANO 2	A1	12	16	5	1
60'S E.PIANO	B♭1	13	16	4	1
HARPSICHORD	B1	14	16	6	0
VIBRAPHONE	C2	15	16	11	0
STRINGS 1	C♯2	16	16	49	0
STRINGS 2	D2	17	16	48	0
PIPE ORGAN	E♭2	18	16	19	0
JAZZ ORGAN	E2	19	16	17	0
ELEC.ORGAN 1	F2	20	16	16	0
ELEC.ORGAN 2	F♯2	21	16	16	1
BASS (LOWER)	G2	22	16	32	0

BASS (LOWER) Key Map	
Key	Sound
C1 - G♯0	Ghost Note
A0 - C5	Normal Finger w/ Off Noise
C♯5 - G9	Harmonics

NOTE
- The BASS (LOWER) tone can be assigned to the low range of the keyboard only. It cannot be used alone across the full keyboard range.

Music Library List

No.	*1	Title
1	C2	Nocturne Op.9-2
2	C♯2	Fantaisie-Impromptu Op.66
3	D2	Étude Op.10-3 "Chanson de l'adieu"
4	E♭2	Étude Op.10-5 "Black Keys"
5	E2	Étude Op.10-12 "Revolutionary"
6	F2	Étude Op.25-9 "Butterflies"
7	F♯2	Prélude Op.28-7
8	G2	Valse Op.64-1 "Petit Chien"
9	A♭2	Valse Op.64-2
10	A2	Moments Musicaux 3
11	B♭2	Impromptu Op.90-2
12	B2	Marche Militaire 1 (Duet)
13	C3	Frühlingslied [Lieder Ohne Worte Heft 5]
14	C♯3	Fröhlicher Landmann [Album für die Jugend]
15	D3	Von fremden Ländern und Menschen [Kinderszenen]
16	E♭3	Träumerei [Kinderszenen]
17	E3	Tambourin
18	F3	Menuet BWV Anh.114 [Clavierbüchlein der Anna Magdalena Bach]
19	F♯3	Inventio 1 BWV 772
20	G3	Inventio 8 BWV 779
21	A♭3	Inventio 13 BWV 784
22	A3	Praeludium 1 BWV 846 [Das Wohltemperierte Klavier 1]
23	B♭3	Le Coucou
24	B3	Gavotte
25	C4	Sonatina Op.36-1 1st Mov.
26	C♯4	Sonatine Op.20-1 1st Mov.
27	D4	Sonate K.545 1st Mov.
28	E♭4	Sonate K.331 3rd Mov. "Turkish March"
29	E4	Rondo K.485
30	F4	Für Elise
31	F♯4	Marcia alla Turca
32	G4	Sonate Op.13 "Pathétique" 1st Mov.
33	A♭4	Sonate Op.13 "Pathétique" 2nd Mov.
34	A4	Sonate Op.13 "Pathétique" 3rd Mov.
35	B♭4	Sonate Op.27-2 "Moonlight" 1st Mov.
36	B4	Rhapsodie 2
37	C5	Waltz Op.39-15 (Duet)
38	C♯5	Liebesträume 3
39	D5	Blumenlied
40	E♭5	La Prière d'une Vierge
41	E5	Csikos Post
42	F5	Humoresque Op.101-7
43	F♯5	Melodie [Lyrische Stücke Heft 2]
44	G5	Sicilienne Op.78
45	A♭5	Berceuse [Dolly] (Duet)
46	A5	Arabesque 1
47	B♭5	La Fille aux Cheveux de Lin [Préludes]
48	B5	Passepied [Suite bergamasque]
49	C6	Gymnopédie 1
50	C♯6	Je Te Veux
51	D6	Salut d'Amour
52	E♭6	The Entertainer
53	E6	Maple Leaf Rag
54	F6	L'arabesque [25 Etüden Op.100]
55	F♯6	La Styrienne [25 Etüden Op.100]
56	G6	Ave Maria [25 Etüden Op.100]
57	A♭6	Le retour [25 Etüden Op.100]
58	A6	La chevaleresque [25 Etüden Op.100]
59	B♭6	No.13 [Études de Mécanisme Op.849]
60	B6	No.26 [Études de Mécanisme Op.849]

*1 Keyboard Key Note Name

Keyboard Function List

■ Basic Settings Such as Tuning

Select a key while holding down the **❸ FUNCTION**.

Note name	Assigned function		
A0	Factory Reset		
B♭0	Auto Power Off	disable/enable	
B0			
C1	Execution		
C#1	Wireless MIDI & Audio Adaptor	Wireless Audio Pairing	
D1		Wireless Function	off/on
E♭1		Connection Notification Tone Volume	−
E1			+
F1		Delete Connection History	
F#1			
G1	USB Flash Drive	Save SMF	
A♭1		Save MRF	
A1		Load	
B♭1		Delete	
B1		Format	
C2	Scale Tuning base note	C	
C#2		C#	
D2		D	
E♭2		E♭	
E2		E	
F2		F	
F#2		F#	
G2		G	
A♭2		A♭	
A2		A	
B♭2		B♭	
B2		B	
C3	Scale Tuning selection	Equal Temperament	
C#3		Pure Major	
D3		Pure Minor	
E♭3		Pythagorean	
E3		Kirnberger 3	
F3		Werckmeister	
F#3		Mean-Tone	
G3		Rast	
A♭3		Bayati	
A3		Hijaz	
B♭3		Saba	
B3		Dashti	
C4		Chahargah	
C#4		Segah	
D4		Gurjari Todi	
E♭4		Chandrakauns	
E4		Charukeshi	
F4	Stretch tuning	off/on	
F#4			
G4	Tuning	−0.1Hz	
A♭4		+0.1Hz	
A4		Tuning 440.0Hz	
B♭4		Tuning 442.0Hz	
B4			
C5	Keyboard Volume	−	
C#5		+	
D5	MIDI Song Volume	−	
E♭5		+	
E5	Audio Song Volume	−	
F5		+	
F#5	Audio Song Center Cancel	off/on	
G5	Wireless Audio Volume	−	
A♭5		+	
A5	Wireless Audio Center Cancel	disable/enable	
B♭5	Duet	Duet Mode	off/on/pan
B5		Left-side Keyboard Octave Shift	−
C6			+
C#6		Right-side Keyboard Octave Shift	−
D6			+
E♭6	Song Type	MIDI	
E6		Audio	
F6	MIDI settings	Local Control	off/on
F#6		Keyboard Channel	−
G6			+
A♭6		Hi-Reso Velocity MIDI OUT	disable/enable
A6	Pedal Function		
B♭6			
B6	Touch Button Luminosity		
C7	Touch Button Sensitivity	−	
C#7		+	
D7	Speaker Out	disable/enable/Auto	
E♭7	Headphones mode	off/on	
E7			
F7	Battery type	Alkaline/Ni-MH	
F#7	Power On Alert	disable/enable	
G7	Panel Light setting	Off/5 seconds/30 seconds/60 seconds/120 seconds	
A♭7	Auto Resume	disable/enable	
A7	Notification Tone Volume	−	
B♭7		+	
B7	Notification Tone Set selection		
C8	Panel Lock	disable/enable/Auto	

■ Changing Settings Such as the Sound Mode

Select a key while holding down the **4 SOUND MODE**.

Note name	Assigned function		
A0	Sound Mode Effects	N.Y.Club	
B♭0		Opera Hall	
B0		Berlin Hall	
C1		British Stadium	
C#1		Room 1	
D1		Room 2	
E♭1		Room 3	
E1		Large Room	
F1		Hall 1	
F#1		Hall 2	
G1		Hall 3	
A♭1		Stadium	
A1		Hall Simulator/Reverb depth	−
B♭1			+
B1		Wireless Hall Simulator/Reverb depth	−
C2			+
C#2			
D2		Surround Type	1
E♭2			2
E2	Chorus	Chorus	Tone
F2			1
F#2			2
G2			3
A♭2			4
A2	Brilliance	−	
B♭2		+	
B2			
C3	Acoustic Simulator	String Resonance	Tone
C#3			off
D3			1
E♭3			2
E3			3
F3			4
F#3		Damper Resonance	Tone
G3			off
A♭3			1
A3			2
B♭3			3
B3			4
C4		Damper Noise	Tone
C#4			off
D4			1
E♭4			2
E4			3
F4			4
F#4		Key On Action Noise	Tone
G4			off
A♭4			1
A4			2
B♭4			3
B4			4
C5		Key Off Action Noise	Tone
C#5			off
D5			1
E♭5			2
E5			3
F5			4
F#5			
G5			
A♭5			
A5			
B♭5			
B5			
C6			
C#6			
D6			
E♭6			
E6			
F6			
F#6			
G6			
A♭6			
A6			
B♭6			
B6			
C7			
C#7			
D7			
E♭7			
E7			
F7			
F#7			
G7			
A♭7			
A7			
B♭7			
B7			
C8			

■ Changing the Metronome and Tempo Settings

Select a key while holding down the **5 METRONOME**.

Note name	Assigned function	
A0		–
B♭0		+
B0		0
C1		1
C#1		2
D1		3
E♭1	Tempo setting (10-key)	4
E1		5
F1		6
F#1		7
G1		8
A♭1		9
A1		Largo
B♭1		Lento
B1		Adagio
C2		Andante
C#2	Tempo setting(tempo markings)	Moderato
D2		Allegretto
E♭2		Allegro
E2		Vivace
F2		Presto
F#2		
G2		
A♭2		
A2		
B♭2	Metronome Volume	–
B2		+
C3		Off
C#3		1
D3		2
E♭3		3
E3		4
F3	Metronome Beat	5
F#3		6
G3		7
A♭3		8
A3		9
B♭3		
B3		
C4		
C#4		
D4		
E♭4		
E4		
F4		
F#4		
G4		
A♭4		
A4		
B♭4		
B4		
C5		
C#5		
D5		
E♭5		
E5		
F5		
F#5		
G5		
A♭5		
A5		
B♭5		
B5		
C6		
C#6		
D6		
E♭6		
E6		
F6		
F#6		
G6		
A♭6		
A6		
B♭6		
B6		
C7		
C#7		
D7		
E♭7		
E7		
F7		
F#7		
G7		
A♭7		
A7		
B♭7		
B7		
C8		

■ Selecting Songs

Select a key while holding down the **6** ▶/■.

Note name	Assigned function			
A0	Song Playback Part selection	LR/L/R		
B♭0		–		
B0		+		
C1		0		
C#1		1		
D1		2		
E♭1	Song selection (10-key)	3		
E1		4		
F1		5		
F#1		6		
G1		7		
A♭1		8		
A1		9		
B♭1				
B1				
C2			1	Nocturne Op.9-2
C#2			2	Fantaisie-Impromptu Op.66
D2			3	Étude Op.10-3 "Chanson de l'adieu"
E♭2			4	Étude Op.10-5 "Black Keys"
E2			5	Étude Op.10-12 "Revolutionary"
F2			6	Étude Op.25-9 "Butterflies"
F#2			7	Prélude Op.28-7
G2			8	Valse Op.64-1 "Petit Chien"
A♭2			9	Valse Op.64-2
A2			10	Moments Musicaux 3
B♭2			11	Impromptu Op.90-2
B2			12	Marche Militaire 1 (Duet)
C3			13	Frühlingslied [Lieder Ohne Worte Heft 5]
C#3			14	Fröhlicher Landmann [Album für die Jugend]
D3			15	Von fremden Ländern und Menschen [Kinderszenen]
E♭3			16	Träumerei [Kinderszenen]
E3			17	Tambourin
F3			18	Menuet BWV Anh.114 [Clavierbüchlein der Anna Magdalena Bach]
F#3			19	Inventio 1 BWV 772
G3			20	Inventio 8 BWV 779
A♭3			21	Inventio 13 BWV 784
A3			22	Praeludium 1 BWV 846 [Das Wohltemperierte Klavier 1]
B♭3			23	Le Coucou
B3			24	Gavotte
C4			25	Sonatina Op.36-1 1st Mov.
C#4			26	Sonatine Op.20-1 1st Mov.
D4			27	Sonate K.545 1st Mov.
E♭4			28	Sonate K.331 3rd Mov. "Turkish March"
E4			29	Rondo K.485
F4		Built-In Song	30	Für Elise
F#4			31	Marcia alla Turca
G4			32	Sonate Op.13 "Pathétique" 1st Mov.
A♭4			33	Sonate Op.13 "Pathétique" 2nd Mov.
A4			34	Sonate Op.13 "Pathétique" 3rd Mov.
B♭4	Music Library		35	Sonate Op.27-2 "Moonlight" 1st Mov.
B4			36	Rhapsodie 2
C5			37	Waltz Op.39-15 (Duet)
C#5			38	Liebesträume 3
D5			39	Blumenlied
E♭5			40	La Prière d'une Vierge
E5			41	Csikos Post
F5			42	Humoresque Op.101-7
F#5			43	Melodie [Lyrische Stücke Heft 2]
G5			44	Sicilienne Op.78
A♭5			45	Berceuse [Dolly] (Duet)
A5			46	Arabesque 1
B♭5			47	La Fille aux Cheveux de Lin [Préludes]
B5			48	Passepied [Suite bergamasque]
C6			49	Gymnopédie 1
C#6			50	Je Te Veux
D6			51	Salut d'Amour
E♭6			52	The Entertainer
E6			53	Maple Leaf Rag
F6			54	L'arabesque [25 Etüden Op.100]
F#6			55	La Styrienne [25 Etüden Op.100]
G6			56	Ave Maria [25 Etüden Op.100]
A♭6			57	Le retour [25 Etüden Op.100]
A6			58	La chevaleresque [25 Etüden Op.100]
B♭6			59	No.13 [Études de Mécanisme Op.849]
B6			60	No.26 [Études de Mécanisme Op.849]
C7			61	User 1
C#7			62	User 2
D7			63	User 3
E♭7			64	User 4
E7		User Song	65	User 5
F7			66	User 6
F#7			67	User 7
G7			68	User 8
A♭7			69	User 9
A7			70	User 10
B♭7	MIDI Recorder Song			
B7	USB drive MIDI Song (USB memory song)			
C8				

■ Changing Settings Such as the Tone

Select a key while holding down the **8 GRAND PIANO**.

Note name	Assigned function		
A0		GRAND PIANO CONCERT	
B♭0		GRAND PIANO BRIGHT	
B0		GRAND PIANO MELLOW	
C1		ROCK PIANO	
C#1		JAZZ PIANO	
D1		POP PIANO	
E♭1		MODERN PIANO	
E1		DANCE PIANO	
F1		HONKY-TONK PIANO	
F#1		PIANO PAD	
G1		ELEC.PIANO	
A♭1	Tone Selection	DIGITAL E.PIANO 1	
A1		DIGITAL E.PIANO 2	
B♭1		60'S E.PIANO	
B1		HARPSICHORD	
C2		VIBRAPHONE	
C#2		STRINGS 1	
D2		STRINGS 2	
E♭2		PIPE ORGAN	
E2		JAZZ ORGAN	
F2		ELEC.ORGAN 1	
F#2		ELEC.ORGAN 2	
G2		BASS (LOWER)	
A♭2			
A2			
B♭2			
B2			
C3		Upper1 Volume	−
C#3			+
D3	Upper1 Settings	Upper1 Octave Shift	−
E♭3			+
E3	Transpose	−	
F3		+	
F#3		off	
G3		Light	
A♭3	Touch Response	Medium light	
A3		Normal	
B♭3		Medium heavy	
B3		Heavy	
C4		Tone	
C#4		off	
D4		Fast	
E♭4	Hammer Response	Moderately Fast	
E4		Moderately Slow	
F4		Slow	
F#4		Tone	
G4	Key Off Response	Fast	
A♭4		Normal	
A4		Slow	
B♭4		Layer	disable/enable
B4		Upper2 Volume	−
C5			+
C#5		Upper2 Octave Shift	−
D5	Layer settings		+
E♭5		Upper2 Detune	−
E5			+
F5		Upper2 Damper	disable/enable
F#5		Lower Volume	−
G5			+
A♭5	Split settings	Lower Detune	−
A5			+
B♭5		Lower Damper	disable/enable
B5			
C6			
C#6			
D6			
E♭6			
E6			
F6			
F#6			
G6			
A♭6			
A6			
B♭6			
B6			
C7			
C#7			
D7			
E♭7			
E7			
F7			
F#7			
G7			
A♭7			
A7			
B♭7			
B7			
C8			

MIDI Implementation Chart

Function		Transmitted	Recognized	Remarks
Basic Channel	Default	1 - 16	1 - 16	
	Changed	1 - 16	1 - 16	
Mode	Default	Mode 3	Mode 3	
	Messages	X	X	
	Altered	✳ ✳ ✳ ✳ ✳ ✳ ✳	✳ ✳ ✳ ✳ ✳ ✳ ✳	
Note Number		12 - 120	0 - 127	
	True Voice	✳ ✳ ✳ ✳ ✳ ✳ ✳	0 - 127	
Velocity	Note ON	O 9nH v = 1 - 127	O 9nH v = 1 - 127	
	Note OFF	O 8nH v = 0 - 127	O 8nH v = 0 - 127, 9nH v = 0	
After Touch	Key's	X	X	
	Ch's	X	O	
Pitch Bender		X	O	
Control Change	0, 32	O	O	Bank select LSB/MSB
	1	X	O	Modulation
	5	X	O	Portamento time
	6, 38	O *1	O *1	Data entry LSB/MSB
	7	O	O	Volume
	10	X *3	O	Pan
	11	X *3	O	Expression
	64	O *2	O	Hold 1
	65	X	O	Portamento switch
	66	O *2	O	Sostenuto
	67	O *2	O	Soft pedal
	71	X *3	O	Filter resonance
	72	X *3	O	Release time
	73	X *3	O	Attack time
	74	X *3	O	Filter cutoff
	76	X	O	Vibrato rate
	77	X	O	Vibrato depth
	78	X	O	Vibrato delay
	84	X	O	Portamento control
	88	O	O	High resolution velocity prefix
	91	X *3	O	Reverb send level
	93	X *3	O	Chorus send level
	94	X *3	O	Delay send level
	100, 101	X *1	O *1	RPN LSB/MSB
Program Change		O	O	
	:True #	✳ ✳ ✳ ✳ ✳ ✳ ✳	0 - 127	
System Exclusive		O *1	O *1	
System Common	: Song Pos	X	X	
	: Song Sel	X	X	
	: Tune	X	X	
System Real Time	: Clock	X	X	
	: Commands	X	X	
Aux Messages	: All Sound Off	X *3	O	
	: Reset All Controller	X *3	O	
	: Local ON/OFF	X	X	
	: All Notes OFF	X *3	O	
	: Active Sense	O	O	
	: System Reset	X	X	
Notes		*1: For details about RPN and system exclusive messages, see MIDI Implementation at https://support.casio.com/global/en/emi/manual/PX-S5000/ *2: Depends on the setup of the pedal connected to the DAMPER PEDAL jack. *3: Output along with certain operations.		

Mode 1 : OMNI ON, POLY   Mode 2 : OMNI ON, MONO   O : Yes
Mode 3 : OMNI OFF, POLY   Mode 4 : OMNI OFF, MONO   X : No

CASIO.