



DUAL MANUAL KEYBOARD

DDK-7

DDK-7 Version 1.1 New Functions

Yamaha has updated the firmware of DDK-7 from Version 1.0 to Version 1.1. This version provides additional functions and has some changed LCDs. This manual provides instructions for the new and updated functions.

Contents

1. Music Data Recorder (M.D.R.)	page 5
2. Registration Memory Copy	page 43
3. Rhythm Sequence Copy	page 48
4. Disable Mode	page 49
5. Voice Edit Display	page 51
Other Changes	page 57

Please replace the instructions in your Owner's Manual with the corresponding instructions in this manual. For the corresponding pages in your Owner's Manual, refer to "New/Updated Functions" on page 2 and "Other Changes" on page 4.

New/Updated Functions

This manual can be used with your DDK-7 Owner's Manual. To fully understand the new or updated functions, simply replacing the relevant part of your Owner's Manual with the instructions in this manual.

1. Music Data Recorder (M.D.R.)

This section corresponds to "Chapter 7 Music Data Recorder (M.D.R.)" of the Owner's Manual.

The M.D.R. display has been changed significantly, giving you greater and more intuitive control over the songs and storage media.

Chapter of the Owner's Manual	Corresponding pages
Chapter 7	Pages 5 – 42

The [SEARCH] button has been added in the M.D.R. display, allowing you to find desired songs/folders by using keywords.

Chapter of the Owner's Manual	Corresponding pages
New function	Pages 13 – 15

The [SCORE] button has been added to the SONG Page, allowing you to display the score (notation) while recording/playing back a song.

Chapter of the Owner's Manual	Corresponding pages
New function	Pages 34 – 35

The TOOL Page has been changed.

The new Copy function can copy individual folders/media as well as individual songs.

Chapter of the Owner's Manual	Corresponding pages
Chapter 7 — 11 Other Functions (Tools) — Song Copy	Pages 36 – 37

2. Registration Memory Copy

The Regist Section Copy Page has been added to the Voice display.

A specific Registration saved to a registration number can be copied to another Registration number for each individual section.

Chapter of the Owner's Manual	Corresponding pages
New function	Pages 43 – 44
Chapter 1 — 4 Voice Display	Pages 45 – 47

3. Rhythm Sequence Copy

The Sequence display has been changed.

A specific rhythm sequence can be copied to another sequence or added to the end of another rhythm sequence.

Chapter of the Owner's Manual	Corresponding page
New function	Page 48

4. Disable Mode

The GLOBAL Page in the Utility display has been changed.

The DISABLE MODE buttons have been added to allow you to select specific functions you want to prevent from changing when you select a different Registration Memory number.

Chapter of the Owner's Manual	Corresponding pages
Chapter 6 — 2 Selecting Registrations	Pages 49 – 50

5. Voice Edit Display

The Voice Edit Display has been changed to give you more intuitive editing control over the Voices.

Chapter of the Owner's Manual	Corresponding pages
Chapter 8 — 2 Editing a Voice — Editing an AWM Voice	Pages 51 – 56

Other Changes

The Popup displays for an effect and reverb close automatically when you select items in the display, whereas in the previous versions you needed to press the [CLOSE] button after selecting items.

Chapter of the Owner's Manual	Corresponding pages
Relevant pages	—

To copy rhythms using Rhythm Programming functions, you will need to first select COPY FROM, then COPY TO.

Chapter of the Owner's Manual	Corresponding pages
Chapter 9 — 2 Rhythm Pattern Program — Basic settings for the Rhythm Pattern: ② ASSEMBLE	Page 57
Chapter 9 — 2 Rhythm Pattern Program — Creating Backing Patterns (Rhythmic Chord Function)	Page 58

Information on functions and settings that cannot be memorized on the Registration Memory has been updated.

Chapter of the Owner's Manual	Corresponding page
Chapter 6 — 1 Storing Registrations: Functions and setting that cannot be memorized	Page 59

The Disable Mode has been added to the MIDI Parameters of Electone Exclusive.

Chapter of the Owner's Manual	Corresponding pages
Chapter 13 — MIDI Data Format — Electone Exclusive	Page 60

Music Data Recorder (M.D.R.)

The Music Data Recorder (M.D.R.) is a sophisticated recording system built into the DDK-7 that lets you record your performances and Registration settings to a USB flash memory or other external media. If you install the optional floppy disk drive such as the UD-FD01 to the DDK-7, you can record your performances/settings to floppy disks. Before using an external media such as USB flash memory, carefully read “Precautions when using the USB TO DEVICE terminal” section on page 10.

Contents

1 Calling Up the M.D.R. Display	5	8 Recalling Recorded Registrations.	27
2 Using the LCD Display	6	9 Playing Back a Song	29
• Song Icons	8	• Playing Back the Selected Part(s)	30
• Precautions when using the USB TO DEVICE terminal	10	• Fast Forward, Rewind and Pause	31
• Using USB Storage Devices	10	• Changing the Tempo	31
3 Formatting External Media	11	• Repeat Playback	32
4 Selecting a Song	12	10 Displaying the Score	34
• Search a Song	13	• Changing the score contents and settings	35
5 Recording	16	11 Other Functions (Tools)	36
• Recording Your Performance	16	• Song Copy	36
• Re-recording (Retry)	17	• Song Delete	38
• Recording each part separately	17	• Converting to XG	39
• Punch-in Recording	19	• Converting to EL format	40
6 Changing the Song Name	19	• Converting from EL format	41
7 Saving Registrations as Registration Data (File)	22	• Checking the Remaining Memory/media ID	42
• Saving Two or More Registration Banks to One Song	23		
• Replacing Registrations	24		
• Next Regist (Registration) Settings (Changing the order of the Registration data)	24		

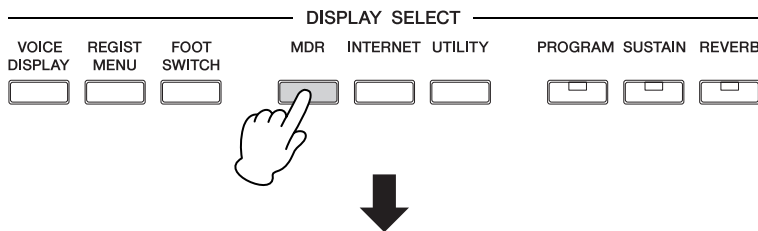
1 Calling Up the M.D.R. Display

Press the [MDR] button in the panel to call up the M.D.R. display. All operations related to the M.D.R., such as recording and playing your performances, can be done in the M.D.R. display.



NOTE

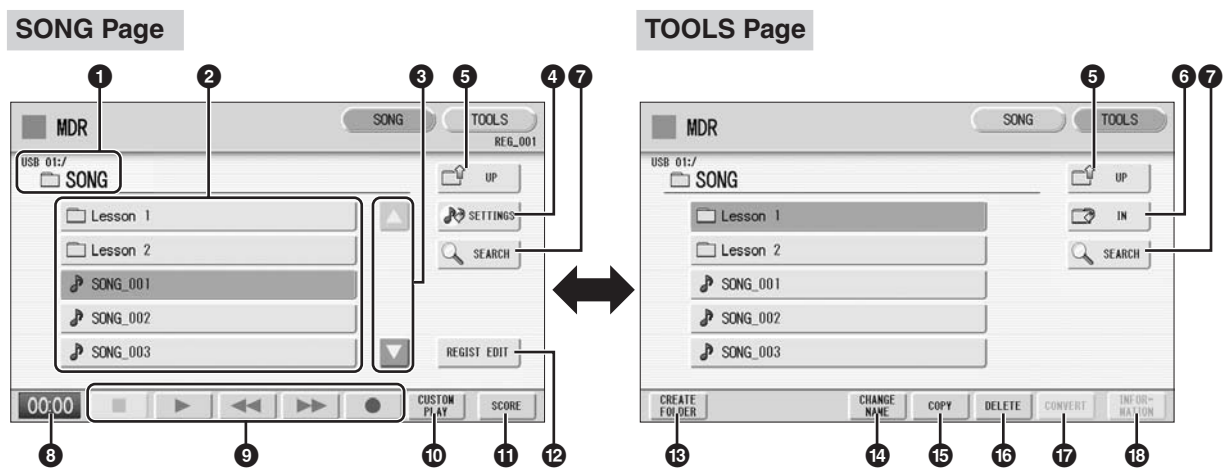
The items shown in the display and their order differ depending on the connected external media.



Pressing any button other than the [MDR] button while the M.D.R. display is open exits from the M.D.R. display. If you exit from the function inadvertently, simply press the [MDR] button again to recall the M.D.R. display. All the instructions in this chapter are related to the M.D.R. display. To call up the M.D.R. functions and the M.D.R. display, press the [MDR] button.

2 Using the LCD Display

The M.D.R. display consists of two display pages: the SONG Page and the TOOLS Page. In the SONG Page, you can select a song, then play it back or record it. The TOOLS Page has a variety of song utility operations, such as copy, delete, rename, etc. Pressing the [SONG] or [TOOLS] button at the top right of the display switches between the SONG Page and the TOOLS Page.



1 Current Media/Folder

Displays the currently selected media and folder(s). The left side of the indication (before “:/”) shows the particular media and the right side shows the path with currently selected folder name at the end. For example, “USB 01:/Folder1/” indicates that the folder named “Folder1” contained in the USB flash memory is selected.

2 Media/Folder/Song List

Displays the media, folders or songs. Up to 120 folders can be displayed (5 folders at once).

3 Scroll Buttons

If the Media/folder/Song List contains more than 5 media/folders/songs, you can scroll through the display with these buttons.



Reference Page

Setting a Song (page 13)

4 SETTINGS

Displays/changes the settings for the currently selected song.

5 UP

Selects the higher layer folder or media. For example, when “USB 01:/Folder1/” (Folder1 in the USB flash memory) is selected, pressing the [UP] button selects “USB 01:/” (USB flash memory).

6 IN

Selects the next lower (or deeper) layer folder or media. For example, when “USB 01:/Folder1/” (Folder1 in the USB flash memory) is selected, pressing the [IN] button selects “USB 01:/Folder1/SONG/” (the SONG folder contained in Folder1 of the USB flash memory).

7 SEARCH

Search for the song/folder in the selected media.

8 Elapsed Time

Displays the elapsed time when recording/playing back a song (up to 59 min. 59 sec.).

9 Song Control

Controls song recording, playback, etc.

10 CUSTOM PLAY

Records/plays back only the performance data of the selected songs. Using this button does not recall the Registration data.

11 SCORE

Displays the selected song’s score.

12 REGIST EDIT

Displays the Regist (Registration) Edit display for the selected song’s Registration data.

13 CREATE FOLDER

Creates a new folder in the Media/Folder/Song List. Up to 120 folders can exist in one media or within a single upper folder. Pressing this button calls up the New Folder display in which you can enter the desired name. Enter the name and press the [OK] button to create a new folder. The method for entering a folder name is the same as that of the song name. See page 19.

14 CHANGE NAME

Changes the folder/song name.

15 COPY

Copies the selected media/folder/song.

16 DELETE

Deletes the selected folder/song.

17 CONVERT

Converts the selected song for use on the EL-series Electone, such as EL-900 or other instruments, or converts songs recorded on EL-series Electone for use on the DDK-7. Songs can be converted to XG format, EL format, or from EL format.

18 INFORMATION

Displays remaining memory in the media is shown, as well as whether or not the media has an ID when a USB storage device is selected and displays information such as the title and composer when a song is selected. The information to be displayed depends on the songs.



Reference Page

Search a Song (page 13)



Reference Pages

Recording Your Performance (page 16)
Playing Back a Song (page 29)



Reference Page

Displaying the Score (page 34)



Reference Pages

Saving Registrations as Registration Data (File) (page 22)
Recalling Recorded Registrations (page 27)



Reference Page

Changing the Song Name (page 19)



Reference Page

Song Copy (page 36)



Reference Page

Song Delete (page 38)



Reference Pages


Converting to XG (page 39)
Converting to EL format (page 40)
Converting from EL format (page 41)





Reference Pages

Checking the Remaining Memory/media ID (page 42)
About Protected Songs (page 28)

If media cannot be found:

- 1 Press the  button until the button is grayed out.
The Media List will be displayed. If there are more than five media selections, scroll through the display with the Scroll buttons (page 6) to display the desired media.

If songs cannot be found:

- 1 Check the current media/folder (page 6).
- 2 If the desired song is stored in the currently displayed folder, use the Scroll buttons (page 6) to display the song.
If the desired song is stored in a different folder, use the  and  buttons to select the folder in which the desired song is stored.

If you are not sure of the folder in which the desired song is stored, search a song by using SEARCH function.



NOTE

If the message "Registration data will be initialized" is displayed when you select a folder, press [OK] button (media is not initialized). The message will appear when recalling the protected song.

Song Icons

These icons are shown when you select a media, folder, and song.



Indicates media such as a USB flash memory or floppy disk. This icon is displayed in the Media/Folder List.



Indicates a folder.



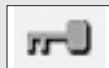
Indicates that write-protect or copy-protect is effective for the media.



Indicates that performance data is contained in the song.



Indicates an XG-compatible song.



Indicates a Protected Original Song. See page 28 for more information.

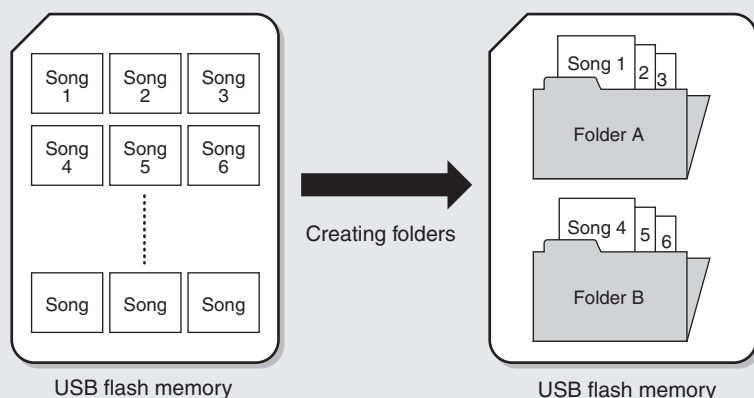


Indicates a Protected Edit Song. See page 28 for more information.

Media Contents: Folders, Songs, and Files

Folders:

A folder is a storage location in the media, used to organize multiple songs in groups. If you've saved hundreds of songs to a USB flash memory, it may be difficult to find the desired song quickly. Organizing your songs in folders, with similar songs grouped together (for example, according to genre or tempo), makes it easier to find the songs you want.



Songs:

A song is the DDK-7 data for a piece of music, recorded to external media. A single song can contain a variety of data, including the recorded performance, Registrations, and so on.

Files:

A file is an element of data in a song. For example, a single song consists of various files, such as Registration files and performance files. The following files are created with the M.D.R. (The extension will not appear in the DDK-7 display. They will, however, be displayed on a computer.)

Files in the song

File	Explanation	Extension
Performance data	This file contains performance data, played on the keyboards and pedals of the DDK-7.	.mid
Registration data	This file contains Registration settings, User Voices, User rhythms, and Rhythm Sequences.	.b00
XG-converted data	This file contains XG song data, for which Electone performance data is converted to XG-compatible format.	.mid

In addition, one file (extension: .name) is automatically created in each folder for organization/maintenance of the folder contents. It does not appear on the DDK-7 display.

Precautions when using the USB TO DEVICE terminal

This instrument features a built-in USB TO DEVICE terminal. When connecting a USB device to the terminal, be sure to handle the USB device with care. Follow the important precautions below.



NOTE

For more information about the handling of USB devices, refer to the owner's manual of the USB device.

■ Compatible USB devices

- USB storage devices (flash memory, floppy disk drive, hard disk drive, etc.)
- USB hub

The instrument does not necessarily support all commercially available USB devices. Yamaha cannot guarantee operation of USB devices that you purchase. Before purchasing a USB device for use with this instrument, please visit the following web page: <http://download.yamaha.com/>



NOTE

Other USB devices such as a computer keyboard or mouse cannot be used.

■ Connecting USB device

- When connecting a USB device to the USB TO DEVICE terminal, make sure that the connector on the device is appropriate and that it is connected in the proper direction.
- When connecting a USB cable, Use it less than 3 meters.
- If you intend to connect two or three devices at the same time to a terminal, you should use a USB hub device. The USB hub must be self-powered (with its own power source) and the power must be on. Only one USB hub can be used. If an error message appears while using the USB hub, disconnect the hub from the instrument, then turn on the power of the instrument and re-connect the USB hub.
- Though the instrument supports the USB 1.1 standard, you can connect and use a USB 2.0 storage device with the instrument. However, note that the transfer speed is that of USB 1.1.

Using USB Storage Devices

By connecting the instrument to a USB storage device (external media), you can save data you've created to the connected device, as well as read data from the connected device.

■ The number of USB storage device to be used

Up to two USB storage devices can be connected to the USB TO DEVICE terminal. (If necessary, use a USB hub. The number of USB storage devices that can be used simultaneously with musical instruments even when a USB hub is used is a maximum of two.)

■ Formatting USB storage media

When a USB storage device is connected or media is inserted, a message may appear prompting you to format the device/ media. If so, execute the Format operation (page 11).



The format operation overwrites any previously existing data. Make sure that the media you are formatting does not contain important data. Proceed with caution, especially when connecting multiple USB storage media.

■ To protect your data (write-protect)

To prevent important data from being inadvertently erased, apply the write-protect provided with each storage device or media. If you are saving data to the USB storage device, make sure to disable write-protect.

■ Connecting/removing USB storage device

Before removing the media from the device, make sure that the instrument is not accessing data (such as in the Save, Copy and Delete operations).



Avoid frequently turning the power on/off to the USB storage device, or connecting/disconnecting the device too often. Doing so may result in the operation of the instrument "freezing" or hanging up. While the instrument is accessing data (such as during Save, Copy, Delete, and Format operations) or is mounting the USB storage device (shortly after the connection), do NOT unplug the USB connector, do NOT remove the media from the device, and do NOT turn the power off to either device. Doing so may corrupt the data on either or both devices.


3 Formatting External Media

If you find that you are unable to use new, blank external media (such as floppy disks or USB flash memory) or old one that have been used with other devices, you may need to format them. Formatting erases all the data in the media and makes it ready to record. The data erased by formatting will be lost permanently. Check whether or not the media contains any important data you wish to keep before executing the operation. Proceed with caution, especially when connecting multiple USB storage media.



NOTE

Before purchasing a USB flash memory device, please consult your Yamaha dealer, or an authorized Yamaha distributor for advice, or see the Yamaha website (<http://download.yamaha.com/>).

- 1 **Connect the media to the USB TO DEVICE terminal.**
- 2 **Press the [TOOLS] button at the top right of the display to call up the TOOLS Page.**
- 3 **Press the button repeatedly if necessary until the  button is grayed out.**
- 4 **Select the desired media you want to format.**
To format a USB flash memory, select [USB XX] (USB 01, USB 02, etc.). To format a floppy disk, select [USB-FD01].



NOTE

The indications USB 1, USB 2, etc. will be displayed depending on the number of the connected media.



NOTE

"USB-FD01" appears in the display only when a floppy disk drive has been installed to the DDK-7.



- 5 **Press the [FORMAT] button in the display.**
A message appears, prompting confirmation of the operation. Select [FORMAT] to format the media, or [CANCEL] to abort the operation.



Do not remove the media while formatting.

4 Selecting a Song

In the M.D.R. display, you can select a blank song to which you want to record your performance or save the Registration settings, or you can select a desired song for playback.

In the M.D.R. display, songs in the currently selected media are displayed. First call up the desired media (and folder, if necessary) in the display, then select the desired song.

1 Check the currently selected media at the top of the display.

Confirm that the desired media is displayed at the top of the display.



Do not remove the media while the instrument is accessing the media. (If you are using a USB flash memory which has a lamp, the lamp will flash when the instrument is accessing the USB flash memory.)

Currently selected media/folder



For information on selecting the desired media, see page 8.

2 Press desired song button in the display.

Referring to the song name and icons, select the desired song. The selected song button is highlighted in orange.

Song containing data



Blank song (containing no data)




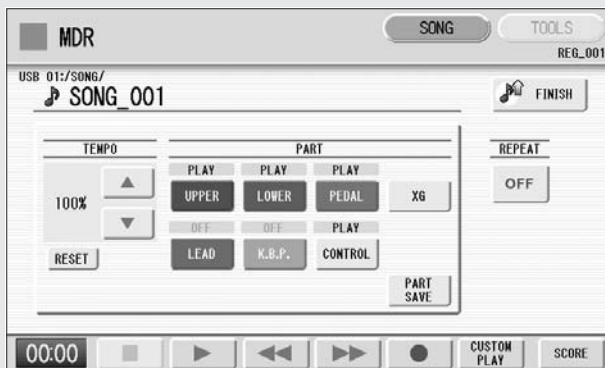
Reference Pages

Changing the Song Name
(page 19)

Song Icons (page 8)

About the [SETTINGS] button

Pressing the  button calls up a display of the currently selected song, letting you confirm the tempo and parts that are played when playing the song.



When playing back the song (by pressing the [►] button), only those parts that are set to “PLAY” in the display actually play at the indicated tempo (over a range of 50% to 200% of the original tempo when recording). If the song contains no performance data, all parts are set to “OFF.” Pressing the [PART SAVE] button saves each part playback setting (the tempo is not saved).



Reference Pages

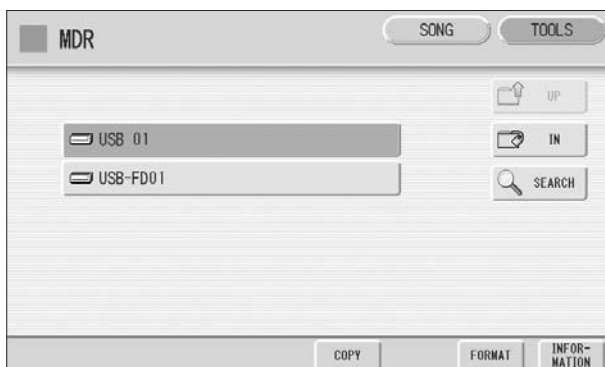
Playing Back the Selected Part(s) (page 30)

Changing the Tempo (page 31)

Search a Song

Search for a desired song by using the Search function.

- 1 Insert the media containing the desired song/folder.
- 2 Select the desired media and/or folder in the Media/Folder List.

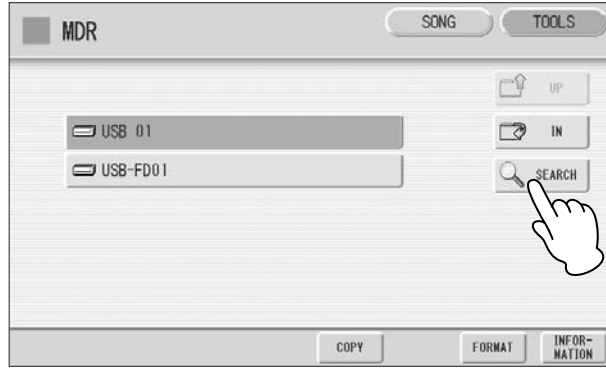




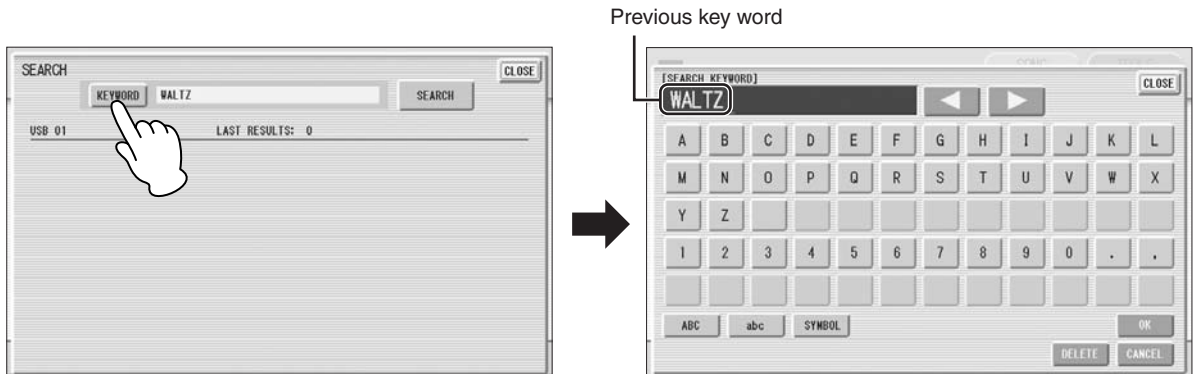
NOTE

Previous searched data can be shown on the display. However, the data does not appear if you've turned off the power, removed the media or saved the song after performing the search operation.

3 Press the [SEARCH] button in the display.



4 Press the [KEYWORD] button.



5 Enter the folder/song name for searching.

If necessary, press the [DELETE] button so that the previous key word can be deleted, then enter the new key word. (See page 19 for instructions on changing the song name.)

6 Press the [OK] button.

The search will begin, and the detected folder/song name will be shown on the display.



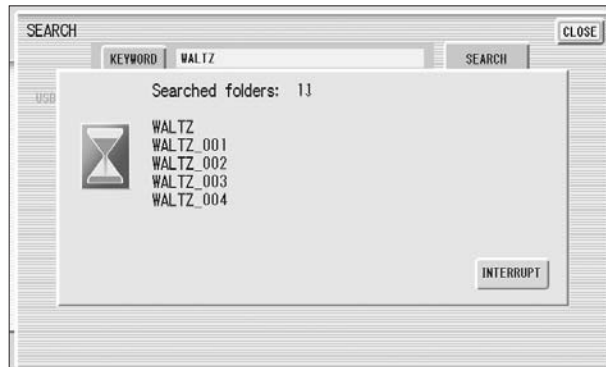
NOTE

This function does not distinguish between capital and lowercase letters.

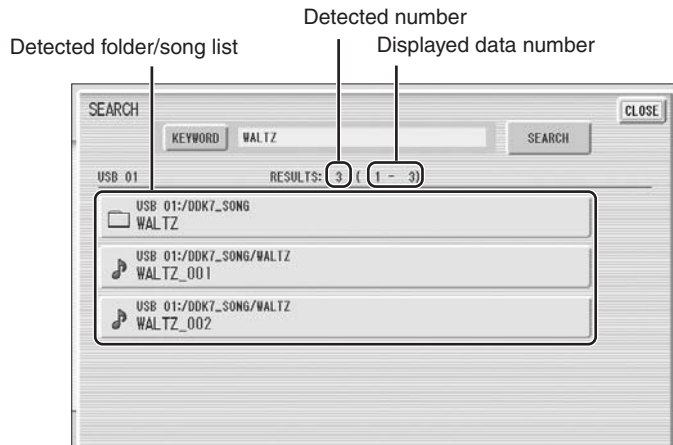


NOTE

When searching for XG songs, entering the extension ".mid" is unnecessary.



7 Confirm the detected folder/song name.



8 Press the desired folder/song.

The display will automatically exit from the SEARCH display and the selected folder/song appears.

If nothing is detected, try the search again by using another name (see step 4 above).

5 Recording

Recording Your Performance



Never attempt to eject the media or turn the power off during recording, reading and playing back.

Set the desired Registrations on the DDK-7. Make all the DDK-7 settings necessary for the song you will record. This means entering the all Registrations you will need for the entire performance in the Registration Memory. Make sure also to select the Registration that you will use at the beginning of the song.

1 Insert a media to the USB TO DEVICE terminal.

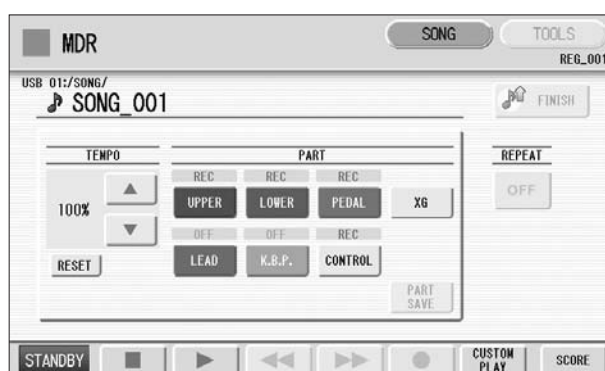
2 Select a blank song for recording your performance.

For details on selecting a song, see page 12.

If you want to overwrite an existing song already containing performance data, you will need to delete it beforehand.

3 Press the [SONG] button at the top right of the display to call up the SONG Page, then select the [●] (Record) button.

The following display appears, indicating that you can record your performance.



4 Press the [►] (Play) button.

An hourglass icon appears at the bottom left of the display, indicating that Registration data is currently being read.

5 After the hourglass disappears, begin playing.

6 When you finish playing, press the [■] (Stop) button in the display.

The recording is finished and the LCD returns to the M.D.R. display. The song to which your performance is recorded is automatically named "SONG_XXX" (XXX indicates song number). You can change the song name as desired. (For details, see page 19.)



NOTE

If a message appears indicating there is not enough free space in media, press the [CANCEL] button, then delete any unnecessary songs if possible or insert new media. To continue recording your performance on media that does not have enough space, press the [CONTINUE] button.

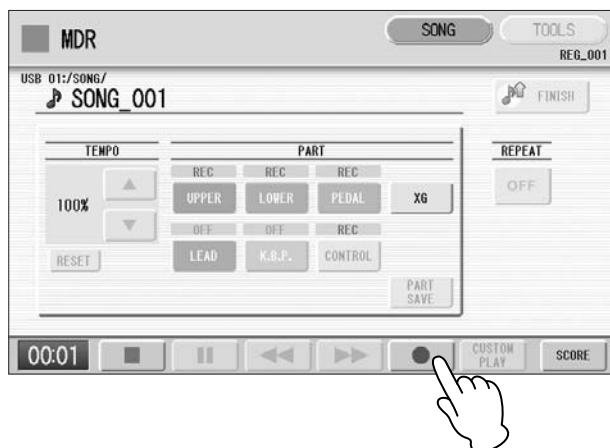


Do not remove the media from the DDK-7 while data is being recorded (while the hourglass icon or other message is shown).

Re-recording (Retry)

If you make a mistake during recording, you can re-record the song from the beginning.

- 1 Press the [●] (Record) button while the song is still running.**
This automatically stops recording and returns you to the starting point of the song.



- 2 Press the [►] (Play) or [CUSTOM PLAY] button to begin rerecording the song.**

Re-recording starts from the beginning of the song and replaces the previously recorded performance with the newly recorded performance.



NOTE

Pressing the [■] (Stop) button cancels the rerecording and records the previous performance.

Recording each part separately

You can also record the parts of your performance independently. This function lets you record Keyboard Percussion and performance control data, such as Registration changes and expression pedal operation, separately from the other parts of the song. Even Keyboard Percussion and Lead Voice 1 Voices can be recorded separately, though, the Lead Voice 2 Voices will be included in the performance data of the Upper Keyboard. The following instruction is an example: First, record the chords and bass to the song using the Lower and Pedalboard, and then record the melody using the Upper Keyboard.

- 1 Follow steps 1 – 3 on page 16 to call up the Rec Standby display.**

- 2 Select the parts for recording.**

Each pressing of a part button switches the status: PLAY, OFF, and REC.

PLAY: Playback the parts that have been recorded.

OFF: Recording or playback is not active.

REC: Records the part.

If you set the Upper part to “REC,” the performance on the Upper Keyboard (including Lead Voice 1 Voices) is recorded. Setting Lead to “REC,” however, records only the Lead Voice 1 Voices. You cannot set both Upper and Lead to “REC” at the same time; neither can the Lower and Keyboard Percussion parts be recorded at the same time.



NOTE

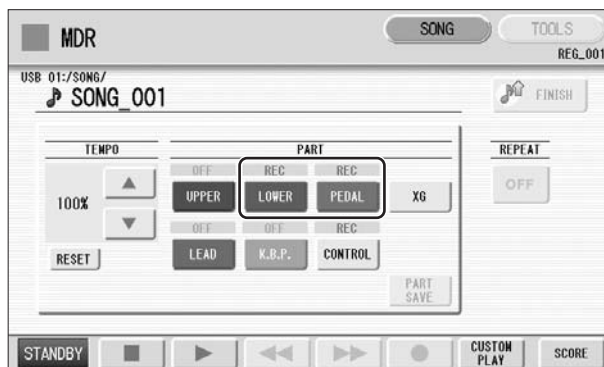
When you record the Keyboard Percussion, make sure that the [K.B.P.1] or [K.B.P.2] button is set to on.

The following setting lets you record only Lower Keyboard and Pedalboard parts.



NOTE

You should also set the Control button to “REC,” in order to record Registration changes and expression pedal operation.



3 Press the [►] (Play) button, and start playing after the hourglass icon disappears.

4 Press the [■] (Stop) button when you are finished with your performance to stop recording.

Now you've recorded the first parts of your performance.

5 Press the [●] (Record) button to set up recording of the next part—Upper part in this case.

A message appears prompting confirmation of operation. Select [OVERWRITE] to overwrite and the Rec Standby display appears.

6 Select the parts for recording.

Set the next parts you want to record (in this case, the Upper part) to “REC.” Also set the part already recorded (in this case Lower and Pedal parts) to “PLAY,” so you can hear the previously recorded parts as you record new ones.



NOTE

Use the TEMPO [RESET] button in the display to reset the tempo to its original value (100%).

7 Change the playback tempo for the selected part.

The playback tempo can be set over a range of 50% to 200% of the original. The original recorded tempo is 100%; values less than 100% result in a slower tempo while values greater than 100% result in a faster tempo.

8 Press the [CUSTOM PLAY] button to start recording of the new part or parts (Upper part).

Playback of the previously recorded parts starts immediately. The [CUSTOM PLAY] button is used here to record only the parts that have been selected for recording, and plays back only those parts that have been selected for playback. While you listen to the parts being played back, start playing the melody on the Upper Keyboard.

When the end of the recorded performance is reached, playback is automatically stopped. The length of a subsequently recorded part cannot exceed the length of the previously recorded parts.

Punch-in Recording

This lets you re-record a specific phrase or section which you don't want to use, either that of a specific part(s) or all parts.

- 1 Select the song which contains the phrase you want to change.**
For details on selecting a song, see page 12.
- 2 Press the [▶] (Play) button to start playback of the song.**
- 3 Press the [■■] (Pause) button at the point you want to execute punch-in recording.**
- 4 Press the [●] (Record) button.**
The recording display appears, indicating that the Music Data Recorder is ready to record.
- 5 Set the parts which you want to change to “REC” status and other parts to “PLAY.”**
- 6 Press the [▶] (Play) button to start punch-in recording. Play the new phrase, as you want it to be changed.**
- 7 Press the [■] (Stop) button to quit the punch-in recording as soon as you reach the end of the phrase.**



NOTE

This function is best used when the phrase to be rerecorded has definite beginning and end points, with slight pauses before and after.

6 Changing the Song Name

You can name the song, such as giving it a title or indicating the date on which it was recorded. However, song names of the EL-series Electone, such as the EL-900, cannot be changed.

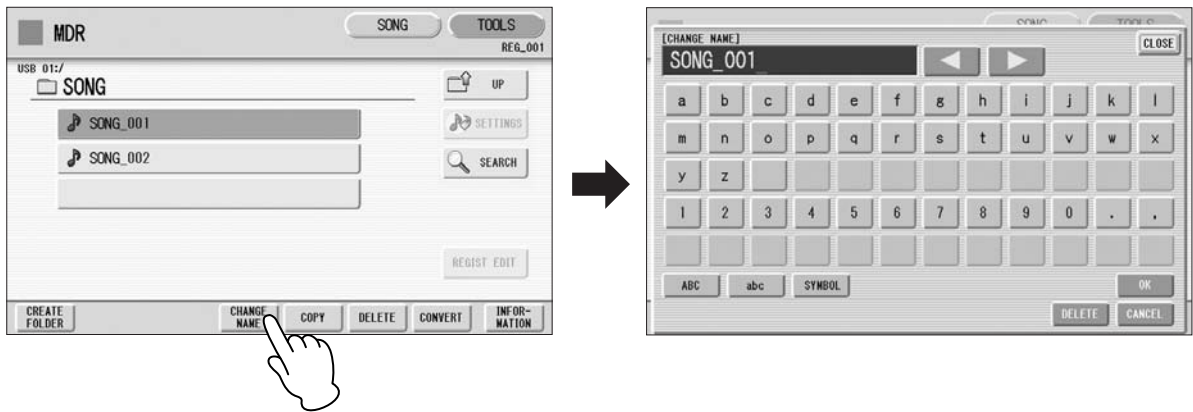
- 1 Select the song whose name you want to change.**
For details on selecting a song, see page 12.
- 2 Press the [TOOLS] button at the top right of the display to call up the TOOLS Page.**



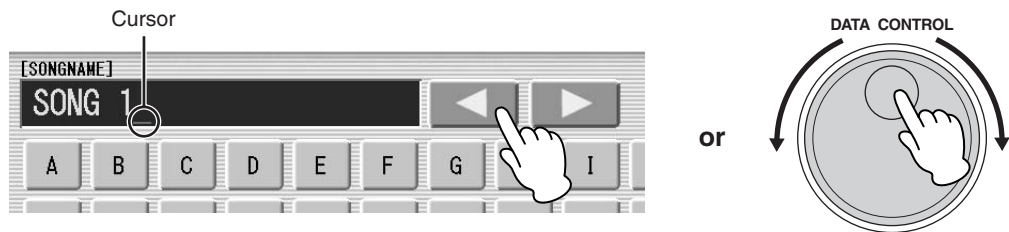
NOTE

When you change the name of an XG song, the extension (.mid) cannot be changed.

3 Press the [CHANGE NAME] button.
The following display appears.



4 Move the cursor to the desired point by using the [◀][▶] buttons in the display or the Data Control dial.



NOTE

If you select Japanese as the Language in the Utility display (Owner's Manual, Chapter 1), you can also select Japanese language characters (hiragana and kanji, normal size katakana, half size katakana, full size alphabet, and full size symbols).

5 Select the desired character type: alphabet, upper or lowercase, or symbol.

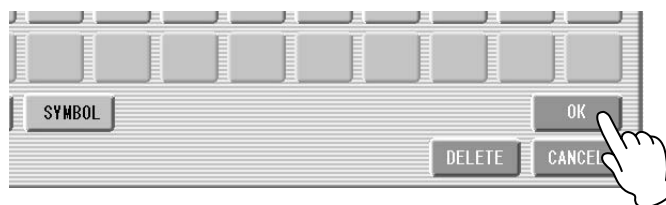


NOTE

An XG song name can contain up to 46 characters.

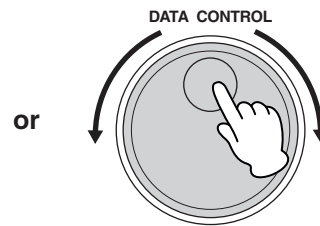
6 Select the desired character for entry.
A song name can contain up to 50 characters.

7 After finished, select [OK] to actually enter the name.
The LCD will return to the TOOLS Page display.

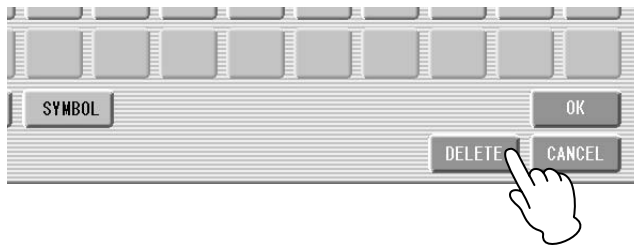


To delete the entered character:


- 1 Move the cursor to the character you want to delete.






- 2 Press the [DELETE] button at the bottom right in the display.
The character is deleted.



To convert into kanji (Japanese language):

This applies only if you are using the  (Kana-Kan) button in Japanese.

- 1 When the input “Hiragana” characters are shown in the reverse display (highlighted), press the  (kanji-conversion) button one or several times to convert to the characters into the appropriate kanji.
 - The reversed area can be changed by the [◀] [▶] buttons in the display or the Data Control dial.
 - The converted area can be cleared at once by pressing the  (cancel) button.
- 2 To actually enter the change, press the [OK] button or enter the next character. To enter the hiragana character itself (without converting it), press the  (delete) button.

A “name is not available” message may appear when you press the [OK] button to finish entering the name. If this message appears, the name is invalid and you should enter another name.

The following names cannot be used. (“xx” indicates numbers.)

MDR_xx.EVT	ELS_SONG.NAM	MDR_xxx.TMP	TMP
MDR_xx.MID	MDR_xxx.MID	REG_xxx.TMP	TMPE02
MDR_xx.Bxx	REG_xxx.B00	ELS_SONG.TMP	
MDR_xx.Vxx	SONG_xxx	SONG_xxx.C02	
SONG.NAM			



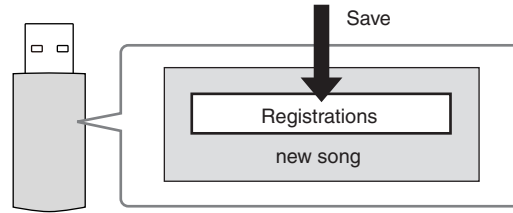
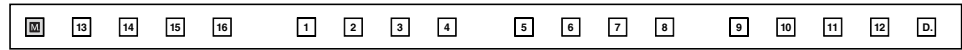
NOTE

Songs are ordered in the following sequence: symbol, number, alphabet, hiragana, kanji, other symbols. Names with an asterisk (*) at the top are exceptions to this rule.

7 Saving Registrations as Registration Data (File)

You can also record Registrations by themselves, without recording a performance. Bulk data, including Registration Memory and Registration Shift settings, Rhythm Patterns (User rhythms) Rhythm Sequence data, and User Voices, are also saved in the operation.

Registrations 1 – 16 stored to the numbered buttons are saved together as a bank.



1 First create your original settings you want to save then select the destination (blank song).

For details on selecting a song, see page 12.

2 Press the [REGIST EDIT] button in the display to call up the Regist (Registration) Edit display.

3 Press the [SAVE] button in the display.

A message appears, indicating the Registration data is currently being saved. After the message disappears, exit from the Regist (Registration) Edit display by pressing the [CLOSE] button and return to the SONG SELECT Page. The song to which the Registration is recorded is automatically named "SONG XXX" (XXX indicates song number).

Saving Two or More Registration Banks to One Song

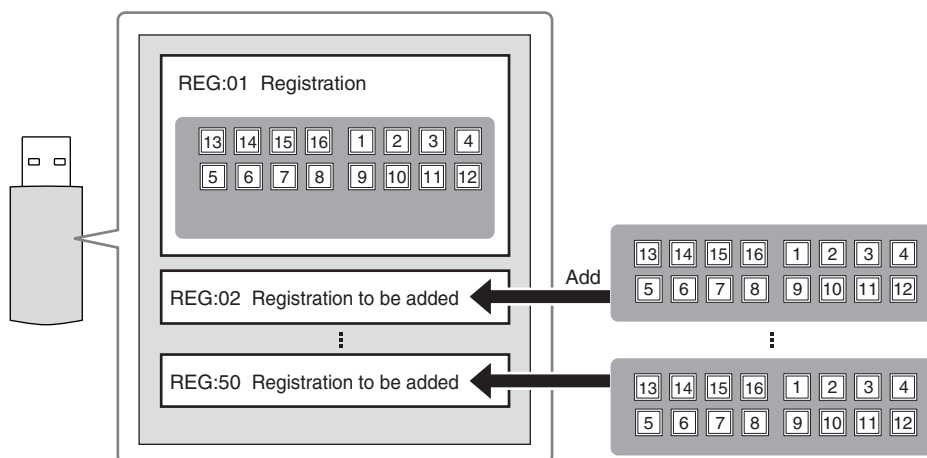
When you want to use more than 16 Registration numbers, you can save additional Registration banks to a single song, with the following procedure.



Reference Page

Next Regist. (Owner's Manual, Chapter 6)

Programming a Registration Sequence (Owner's Manual, Chapter 9)



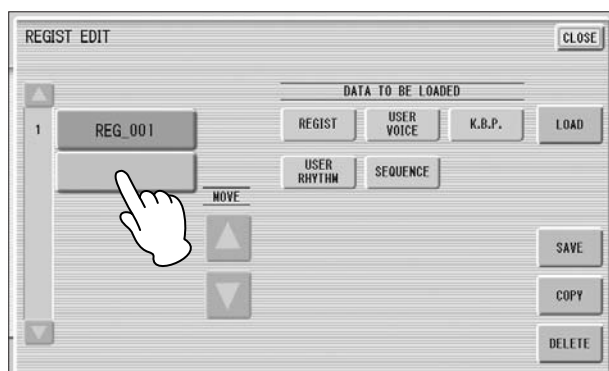
1 First create the original settings you want to save, then select the destination song.

For details on selecting a song, see page 12.

2 Press the [REGIST EDIT] button in the display to call up the Regist (Registration) Edit display.

The Registration data which has previously been saved to the song is shown.

3 Press the lowest blank (empty) Registration button.



4 Press the [SAVE] button.

The Registration data will be added. When you play back this song, the top Registration bank in this display will be loaded to the DDK-7. You can also change the order of the Registration bank. See page 24.

Replacing Registrations

The M.D.R. also lets you change the Registrations of an existing song without changing the performance data. In advance, you need to create the original Registration that will replace the old one.

1 Select the song for which you wish to replace the Registrations.

For details on selecting a song, see page 12.

2 Press the [REGIST EDIT] button in the display to call up the Regist (Registration) Edit display.

The Registration bank which has been saved to the song is shown.

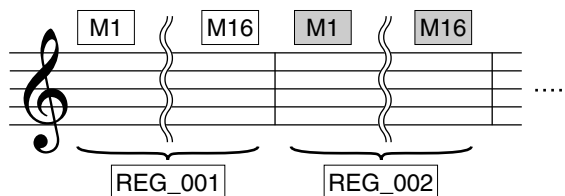
3 Select the Registration data you wish to replace.

4 Press the [SAVE] button.

A message appears, prompting confirmation of overwriting the Registration bank. Select [OVERWRITE] to overwrite (replace), or select [CANCEL] to abort the operation.

Next Regist (Registration) Settings (Changing the order of the Registration data)

When playing back a song which uses more than 16 Registration numbers, you can use two or more Registration banks saved in a single song and recall them one by one as you play the song. This function is called Next Regist (Registration).



If you want to use the Next Regist (Registration) function, you'll have to make one of the following settings in advance:

- Set the Registration Shift mode to User, and select Next Regist (Registration) as the Shift End, in advance. Refer to the Owner's Manual, chapter 6 for the details.
- Enter the Next Regist (Registration) data in the Registration Sequence. Refer to the Owner's Manual, chapter 9 for the details.



NOTE

If the next Registration data contains User voices, the DDK-7 may produce no sound for a few seconds while the Registration is being loaded.



NOTE

If the Next Regist (Registration) function is used while the rhythm is being played back, the sequence data and User rhythm will not change.

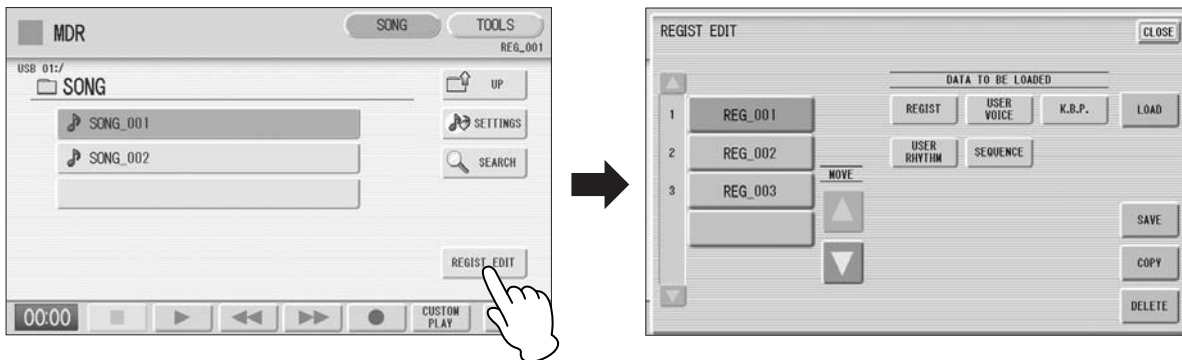
1 Save the desired Registrations to a song.

For instructions on saving two or more Registration banks to a song, see page 23.

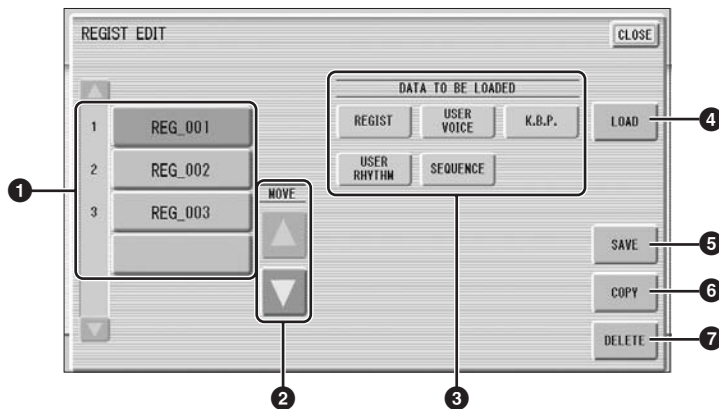
2 Select the song containing the Registrations for which you want to change the order.

For details on selecting a song, see page 12.

3 Press the [REGIST EDIT] button in the SONG Page to call up the Register (Registration) Edit display.



4 Change the Registration order, in the order you want to recall.
First select the specific Registration bank you want to edit, then move, copy or delete the selected data as needed to change the order.



1 Registration Data List

From this list, select the Registration you want to move, copy or delete. The selected Registration is highlighted in orange. When more than five Registration banks are saved in the song, a scroll button is available for scrolling through the Registration Data List.

2 MOVE

Moves the selected Registration bank up or down.

3 DATA TO BE LOADED

When loading the Registration bank to the panel, select the desired data you want to load. For more information, see page 27.

4 LOAD

Loads the selected Registration bank to the panel/keyboards. After loading, press one of the Registration Memory button and play the keyboard to check the Registration.

5 SAVE

Saves the current panel settings as a Registration bank in the song. The currently selected Registration in the Registration Data List (1) will become the destination location.

6 COPY

Copies the currently selected Registration to the lowest blank location in the Registration Data List.

7 DELETE

Deletes the currently selected Registration bank in the Registration Data List.

5 Exit from the Regist (Registration) Edit display by pressing the [CLOSE] button at the top right of the display.

8 Recalling Recorded Registrations

Registrations (and bulk data) recorded to song numbers can be easily loaded back to the DDK-7 by the following procedure. The M.D.R. independently recalls the following five types of data:

- REGIST
- USER VOICE
- K.B.P.
- USER RHYTHM
- SEQUENCE

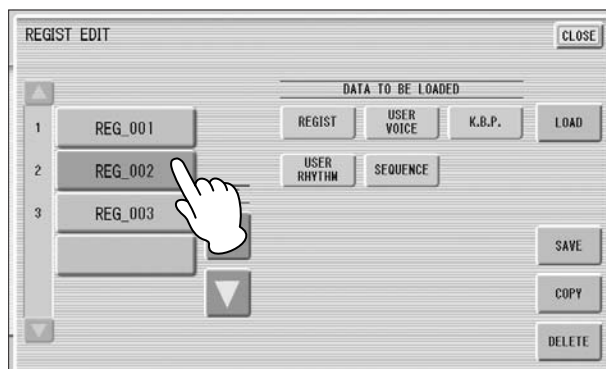
You can select and recall the desired data independently.

1 Insert the appropriate media and select the song you want to load back to the DDK-7.

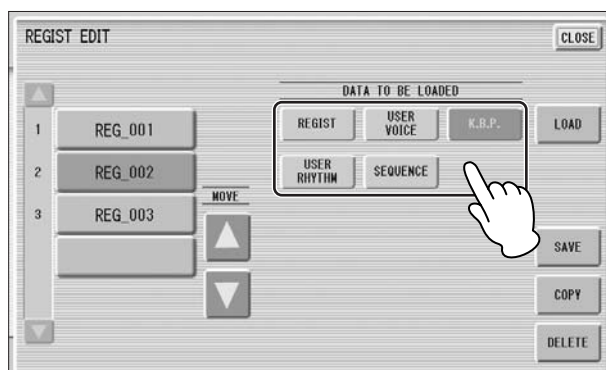
For details on selecting a song, see page 12.

2 Press [REGIST EDIT] button in the display to call up the Regist (Registration) Edit display.

3 Select the Registration you want to load to the DDK-7.



4 Using the five "DATA TO BE LOADED" buttons, select the desired data you want to load.



NOTE

When you load the Registration data by using the Next Regist function, all data will be loaded no matter which buttons you select here.



NOTE

If you load a Registration while a rhythm is playing, sequence data and User rhythms in the Registration data cannot be loaded.

5 Press the [LOAD] button.

A message appears, prompting confirmation of the operation. Press the [LOAD] button to load the Registration data. Press [CANCEL] to cancel the operation.

6 Exit from the Regist (Registration) Edit display by pressing the [CLOSE] button at the top right of the display.

When you select the protected song, the buttons (DATA TO BE LOADED) may be unavailable (grayed out). For example, combining a part of one protected song with another protected song is not allowed.

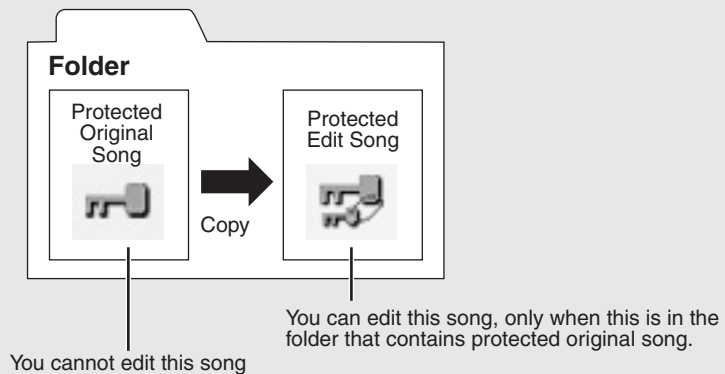


When you want to edit a protected song, first initialize the Registration Memory, then select the desired song. If you have not initialized the Registration first, the edited song may not be saved.

About Protected Songs

If you buy or download the song data, it may be protected so that you cannot delete or copy, in order to prevent accidental erasure or protect copyright. This is “Protected Song.” Protected songs can be saved to a Yamaha-confirmed USB flash memory device with ID.

The protected song can be played back as well as the song you created, but it cannot be converted to XG format, or EL format. It is not possible to edit the Registration data in the protected song, nor to overwrite the performance data. If you want to edit the protected song, first copy it within one media/folder, then edit the copy. (You cannot copy to another media/folder.) The copy song (called “protected edit song”) is available only when the original song (called “protected original song”) exists in the same folder. Be careful not to delete the protected original song.



To move the protected song in a USB flash memory with a computer, you'll need to use the Musicsoft Downloader application. If you move the song without Musicsoft Downloader, the song cannot be played back. Musicsoft Downloader can be obtained at the following Internet address: <http://download.yamaha.com/>

9 Playing Back a Song

The M.D.R. enables you to play back commercially available XG-compatible song data and MIDI data created with a computer as well as songs recorded on the DDK-7 itself.

1 Select the song to be played back.

For details on selecting a song, see page 12.

2 Press the [►] (Play) button in the display to load the Registration data.

An hourglass icon appears, indicating the Registration data is loading. If the song contains more than two Registration banks, the first one will be loaded. You can check the Registration order in the Regist (Registration) Edit display. If the song contains no performance data, after loading the Registration data, the LCD returns to the SONG Page.

3 Playback starts automatically after reading the Registration data (the elapsed time is shown).

In general, all parts recorded to the song are played back; however, you can mute specific parts and playback only selected parts. For more information, see page 30.

When the end of the recorded performance is reached, playback automatically stops. You can, however, stop playback in the middle of the song by pressing the [■] (Stop) button in the display.



NOTE

When you play Electone data, the resulting song balance will vary according to the speakers you are using.



NOTE

The functions intended for control with the Knee Lever on the Electone must be assigned to the Foot Pedal.



Reference Page

Next Regist Settings (Changing the order of the Registration data) (page 24)



Reference Page

About the [SETTINGS] button (page 13)

Custom Play

If you want to play back the song without resetting the Registrations, press the [CUSTOM PLAY] button instead of the [►] (Play) button. This displays the song time and starts playback immediately.



When you play the song using the Next Regist function, always press the [►] (Play) button to start the song, not the [CUSTOM PLAY] button.

Playing Back the Selected Part(s)

You can also play back selected parts of your recorded performance, while other parts are temporarily turned off. This function is especially useful for playing a single part, such as the melody, over previously recorded accompaniment parts.

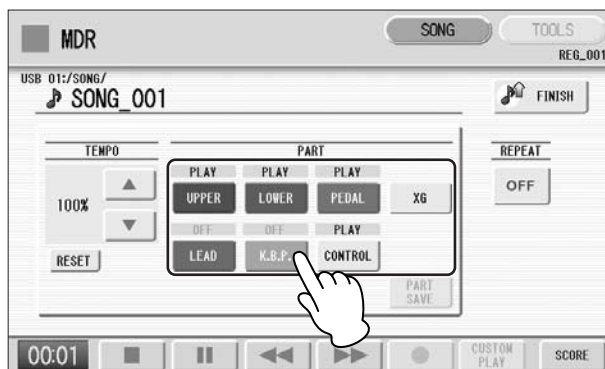


Reference Page

Setting a Song (page 13)

To play back the selected part(s):

During playback or in the Settings display, press each part button to turn the part you want to playback to “PLAY” and the part you want to mute to “OFF.” Each pressing of a part button switches the status between PLAY and OFF. Pressing the [PART SAVE] button saves each part’s playback status.

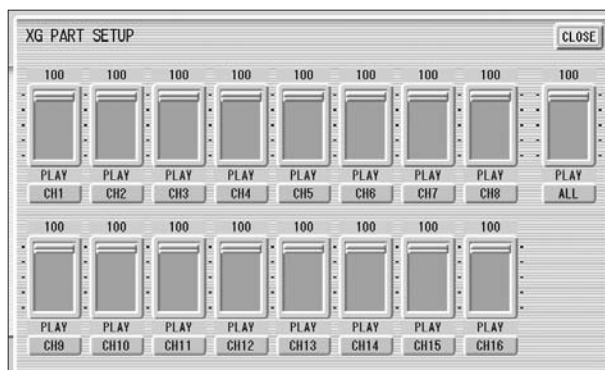


Reference Page

Converting to XG (page 39)

To play back the selected part(s) of XG-compatible song data:

Press the Part [XG] button while XG-compatible song data is being played back. The following XG Part Setup display appears.



Press the appropriate channel buttons (e.g., the [CH1] button) to set each channel to playback or mute. Each pressing of a button switches the status: PLAY and OFF. Set a part to [PLAY] if you want to play it back and [OFF] if you do not. The [ALL] button enables you to switch all channels to PLAY/OFF at once.

To set each channel’s volume use the sliders. Each channel’s volume can be adjusted between 0 and 100.

The [ALL] slider adjusts the overall volume.

Fast Forward, Rewind and Pause

Fast Forward and Rewind:

During playback, press the [▶▶] (Fast forward) button or [◀◀] (Rewind) button and hold it down until the time reaches the desired position. Even when the button is released, playback is paused. To resume playback from the point you've advanced or reversed to, press the [▶] (Play) button or [CUSTOM PLAY] button.

Pause:

If you want to temporarily stop playback of the song or songs, press the [■] (Pause) button.

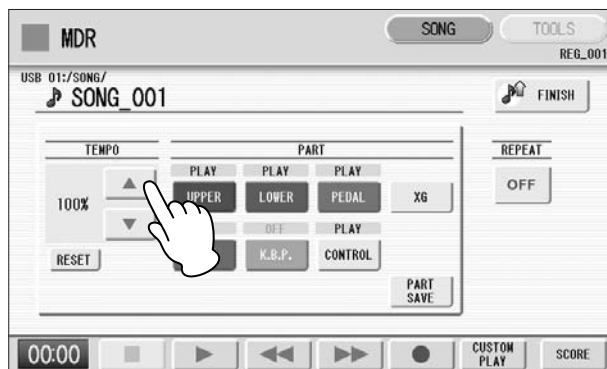
To resume playback from the point at which the song was paused, press the [▶] (Play) or [CUSTOM PLAY] button.

Changing the Tempo

You can change the tempo of the song as the song is playing in the M.D.R. display, either while the song is stopped or while it is playing.

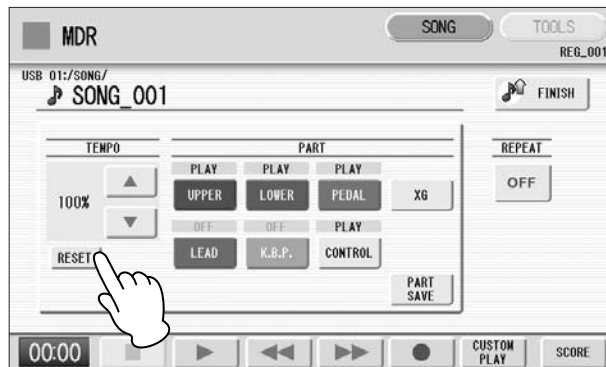
To Change the Tempo:

Use the TEMPO ▲ ▼ buttons in the display to change the tempo. (The TEMPO buttons on the panel cannot be used to change the tempo for the Music Data Recorder.) The range is 50 – 200%. The original recorded tempo is 100% and values less than 100% indicate slower tempo; values greater than 100% indicate faster tempo.




To reset the changed tempo:

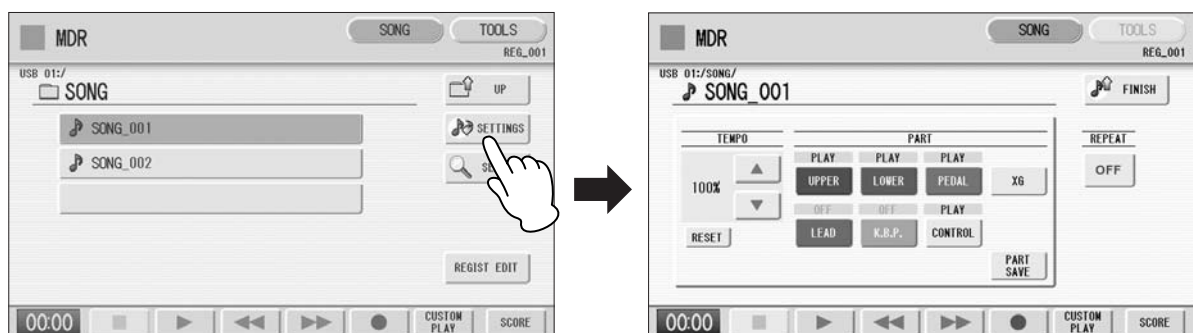
Use the TEMPO [RESET] button in the display to reset the tempo to its original value (100%).



Repeat Playback

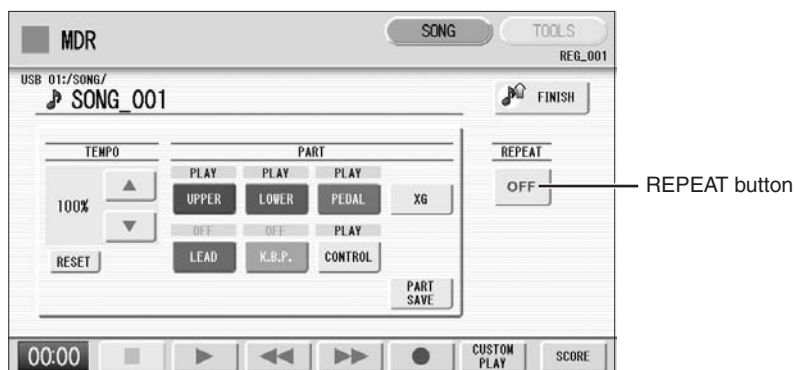
This feature allows you to repeatedly play back either all songs on a folder or only one specific song.

- 1 Select the song you wish to play back.**
If you wish to play back all songs on a folder, select the first song that will be played back. For details on selecting a song, see page 12.
- 2 Press the [SONG] button at the top right of the display to call up the SONG Page.**
- 3 Press the  button on the panel to call up the Settings display.**



4 Press the REPEAT button to select the repeat mode.

Each press of the button switches the mode



SINGLE

Repeats the currently selected song again and again.

ALL

Repeats all songs in the currently selected folder in order.

RANDOM

Repeats all songs in the currently selected folder randomly.

OFF

Cancels repeat playback.

5 Exit from the Settings display by pressing the button at the top right of the display.

6 Press the [▶] (Play) button in the SONG Page to begin playback.

10 Displaying the Score

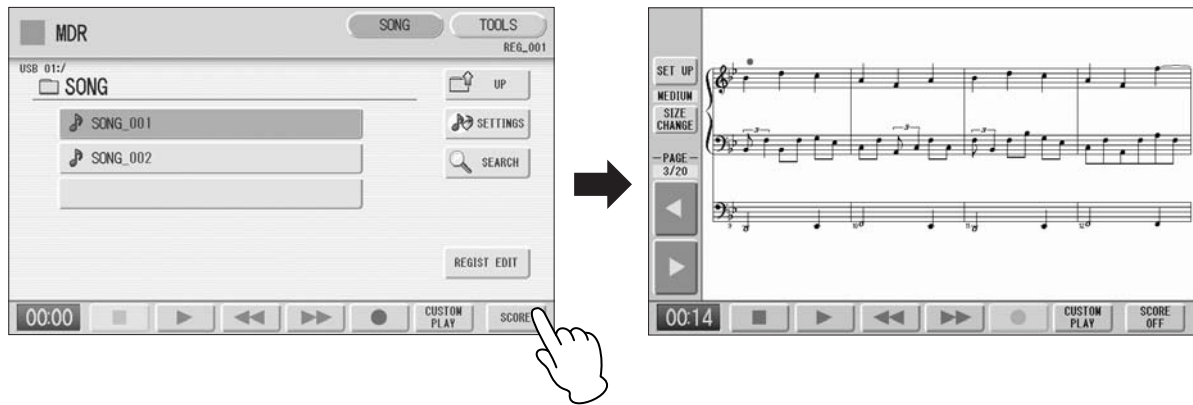
The M.D.R. display can display a music notation (score) of the performance data recorded to media. You can change the size and the number of staves to be displayed. While a song is being played back, the cursor moves according to the performance and the pages are automatically turned.

1 Select the song containing performance data.

For details on selecting a song, see page 12.

2 Press the [SCORE] button in the display.

The currently selected song score will be displayed.



3 Press the [▶] (Play) button in the display to start playing back the song.

As the song plays back, the cursor moves accordingly and the page is automatically turned at the appropriate point.

In this condition, pressing the [●] (Record) button in the display lets you record a song and have the score displayed for you.

The score size can be adjusted by pressing the [SIZE CHANGE] button in the display. Each press of the [SIZE CHANGE] button alternates the score size in the following sequence: normal, large, extra large, small, normal, and so on. Please note that the size cannot be changed while a song is being recorded.

4 You can manually turn the page, by stopping playing back a song using the [■] (Stop) or [⏸] (Pause) button, and then pressing the PAGE [◀] or [▶] buttons in the display.

Pressing these buttons moves to the previous or next page. The PAGE [▶] button can be assigned to the left foot switch (page 35).

5 To exit the score, press the [SCORE OFF] button in the display.



NOTE

The score size setting cannot be stored to a Registration Memory.



NOTE

Scores for protected songs cannot be displayed, excepting those songs that specifically allow score display.

Changing the score contents and settings

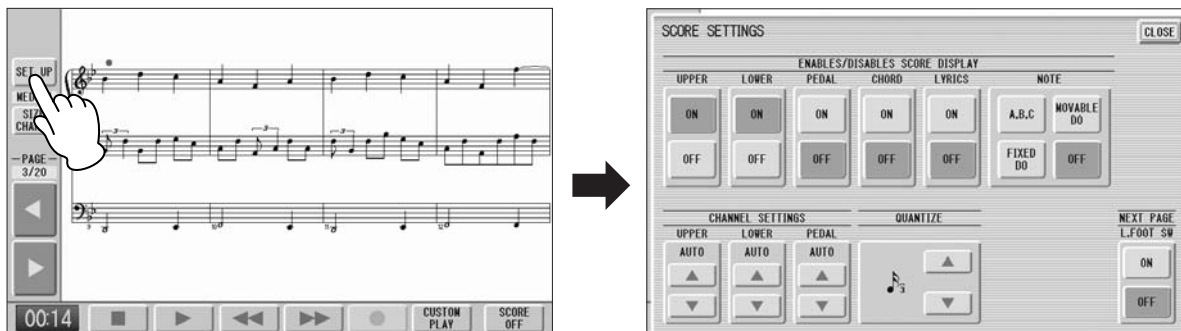
The Score Settings display lets you choose the contents to be displayed. In this display, you can also assign the Next Page function to the left foot switch:



NOTE

Please note that the score settings cannot be changed while the song is being recorded. The [SET UP] button is disabled during recording.

- 1 Display the score.
- 2 Press the [SET UP] button in the display to call up the Score Settings display.



- 3 Change the score settings.

To set whether a specific part is displayed or not in the score, press the appropriate [ON] or [OFF] buttons of each part. Please note that at least one of the upper keyboard, lower keyboard or pedalboard will be set to [ON].

Available settings for notes and how they will be displayed (NOTE) include [A, B, C] (conventional C-D-E indications), [FIXED DO] (solfeggio), [MOVABLE DO] (relative solfeggio) and [OFF].

For the CH SETTINGS, the upper keyboard, lower keyboard and pedalboard can be assigned to the channels with the [▲] or [▼] button. You can also use the Data Control dial to select channels after pressing the [▲] or [▼] button. Selecting [AUTO] automatically assigns parts to the channels according to the song data.

To set the QUANTIZE value use the [▲] or [▼] button. You can also use the Data Control dial to select channels after pressing the [▲] or [▼] button. The shorter the note value is selected, the more precisely the score is displayed.

Setting the NEXT PAGE L. Foot SW [ON] lets you turn the score to the next page with the left foot switch. You can also turn the score to the next page with the PAGE [▶] button in the display. If rhythm, glide and/or rotary speaker are assigned to the left foot switch and set on, both the assigned functions and the Next Page function work.

- 4 Exit from the Score Settings display by pressing the [CLOSE] button at the top right of the display.



NOTE

The score display settings cannot be stored to a Registration Memory. Only the left foot switch setting can be stored to USB flash memory as Registration data common to all Registration Memory numbers.



NOTE

Setting the NOTE to [MOVABLE DO] displays each key note as "Do."



Reference Page

About Quantize (Owner's Manual, Chapter 9)

11 Other Functions (Tools)

The TOOLS Page in the M.D.R. display has many functions, such as song copy, song delete, etc.



NOTE

If the folder already contains 120 XG songs the songs can not be copied, or if the folder already contains 120 folders the folder can not be copied.



NOTE

In the following cases, it may not be able to copy even if the number of folder/XG song has not yet reached to the maximum number. Destination root is selected and song name/path are too long.



NOTE

Copy operation is automatically stopped if there is containing unrecognizable file in MDR.

Song Copy

This function lets you copy a folder/song. You can copy and exchange the data even between two different media. (Songs created with the EL-series Electone, such as EL-900, one by one copy can not be executed.) Make sure to check the remaining memory of the destination media in advance.

Moving a Protected Song

A protected song can be copied within a folder, but it cannot be copied to another folder or media. If you specify another folder or media as the copy destination, a message appears prompting moving of the song — not copying. When the [MOVE] button is pressed, the protected original song and all protected edit songs which come from the same protected original song will be moved together. This effectively “moves” a protected song, but does not “copy” it. If copy the folder which contains both non-protected songs and protected songs, the copy operation will be automatically executed for only non-protected songs, and protected song will be moved (no copy).

To copy a song:

Insert the media that contains a folder/song to be copied and the destination media.

• To copy within one media

Insert the media that contains a song to be copied.

• To copy a song from USB flash memory to another

Insert both the USB flash memory that contains a song to be copied and the destination USB flash memory. When there are not enough terminals available, use a self powered USB hub.



NOTE

If you copy a protected song to the same folder as the source song, the copied song will be the protected edit song.



To avoid losing your important data in Media. Firmly connect the media to the USB TO DEVICE terminal.

1

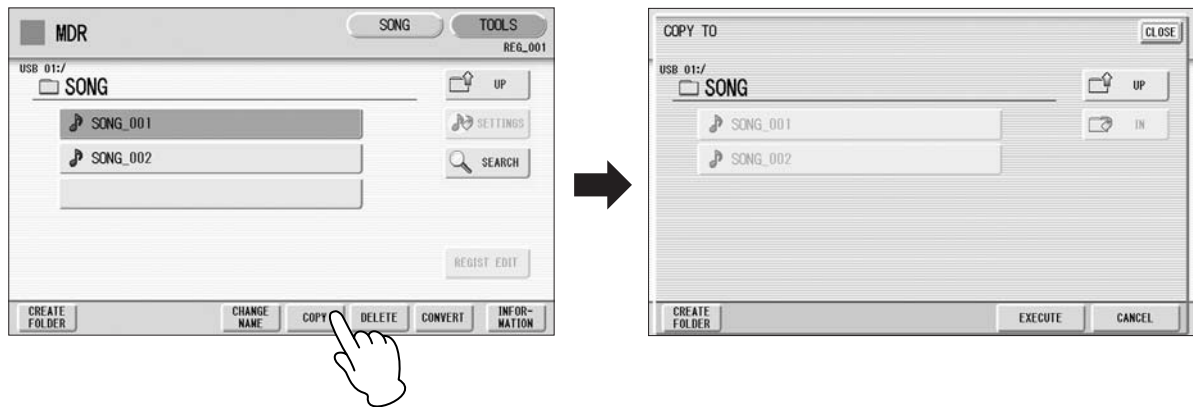
Select the song to be copied.

For details on selecting a song, see page 12.

2

Press the [TOOLS] button at the top right of the display to call up the TOOLS Page.

3 Press the [COPY] button in the display to call up the Copy To display.



4 (If necessary) Change the destination.
For details on changing the destination, see page 12.

5 Press the [EXECUTE] button to execute the copy.
The folder/song name in the destination is the same as the one of the source song. If you copy a folder/song to a folder that contains a song whose name is the same as the source song, the copied name will be “source song name_XXX” (XXX indicates song number). If you want to change the folder/song name, see page 19.

If you copy an XG-compatible song to another folder or media that contains a song with the same name as the source song, a message appears prompting confirmation of overwriting the song. Selecting [OVERWRITE] overwrites the XG-compatible song in the destination.

How to cancel the folder-copy operation

If you want to cancel the folder-copy operation while the copy operation is in progress, press the [CANCEL] button. However, the operation may take a long time since the stop operation will be executed only after all files in current folder are copied. If you cancel the operation, make sure to check which files have been properly copied and which have not.



Never attempt to eject the media or turn the power off during copying (or moving a protected song). Data may be lost.



NOTE

While the copy operation is in progress, the approximate time of copying appears on the display; keep in mind that the actual time need may differ.



NOTE

If the media copy is executed, the folder name “#MEDIA” will be created in the destination folder.



NOTE

If the message “The source folder hierarchy is too deep” is displayed, copy each folder in the folder, one by one manually.

If the “Path name is too long” message is displayed, change the hierarchy or rename the folder name shortly.



NOTE

The copy operation will automatically be stopped if an unrecognizable file is detected in the folder.

Song Delete

You can delete the data of one song. You can specify for deletion only Registration data, only the performance data, or both of them (entire song). Also, only the songs created on the DDK-7 and XG-compatible songs can be deleted. Songs created on the EL series instruments such as the EL-900 cannot be deleted.

- 1 Select the song to be deleted.**
For details on selecting a song, see page 12.
- 2 Press the [TOOLS] button at the top right of the display to call up the TOOLS Page.**
- 3 Press the [DELETE] button in the display.**
A message appears, prompting confirmation of the operation. Confirm that the song to be deleted is shown in the display. If you want to change the song, press the [CANCEL] button and select the desired song.
- 4 Press the button of the specific data you want to delete (“DELETE ALL,” “ALL,” “DELETE REGIST” or “DELETE PERFORMANCE”). The selected data will be deleted.**



- **DELETE ALL:** Deletes the entire song.
- **DELETE REGIST:** Deletes only Registration data in the song.
- **DELETE PERFORMANCE:** Deletes only performance data in the song.

Pressing [CANCEL] aborts the operation.

When deleting folders, songs with only registration, songs with only performance data, protected songs or XG-compatible songs:



Select [DELETE] to actually delete the data, or select [CANCEL] to abort the operation.

Converting to XG

This function allows you to convert the DDK-7 song data to XG format data. You can playback the data using XG devices. The converted XG song data may sound differently from the original data.

Confirm that the media should contain enough amount of available memory before the conversion. The protected songs cannot be converted to XG format.

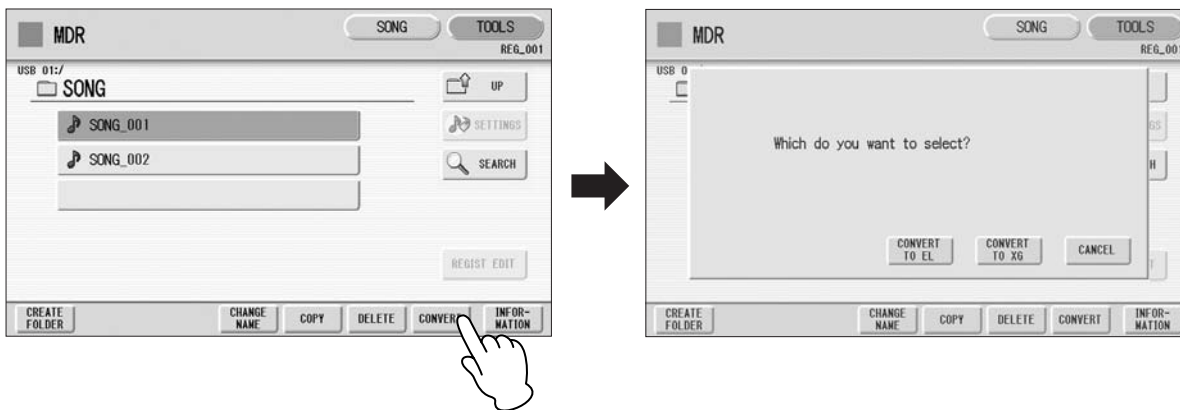
1 Selects a song to be converted to XG.

For details on selecting a song, see page 12.

2 Press the [TOOLS] button at the top right of the display to call up the TOOLS Page.

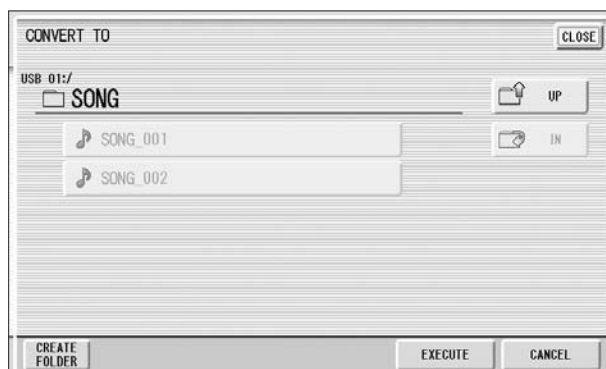
3 Press the [CONVERT] button.

A message “Which do you want to select?” appears.



4 Press the [CONVERT TO XG] button.

The following display appears.



5 (If necessary) Changes the destination to save the converted song.

For details on changing the destination, see page 12.

6 Press the [EXECUTE] button.

A message appears indicating that the converted data is being checked and the M.D.R. starts playback of the selected song. When playback is finished, the display returns to the previous display.



NOTE

Playing the keyboard or pressing the panel controls during the confirmation of the conversion will be recorded to the converted XG-compatible song.

Converting to EL format



Reference Pages

About Protected Songs
(page 28)



NOTE

User rhythms cannot be converted to EL format.

You can convert songs created on the DDK-7 to EL-series format, and save them to a floppy disk. The converted data can be used with EL-series Electones, such as the EL-900. This function is not available for protected songs.

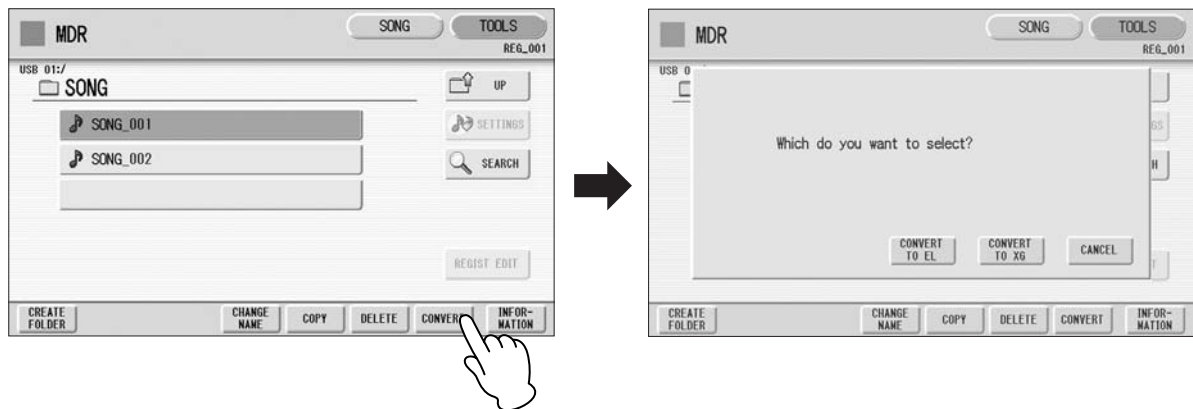
You'll need to install the optional floppy disk drive such as UD-FD01.

1 Select the song to be converted to EL-series format.

For details on selecting a song, see page 12.

2 In the TOOLS Page, press the [CONVERT] button.

A “Which do you want to select?” message appears.



NOTE

If the source song's name contains full size characters or Japanese characters, these characters will be shown as question marks (such as “????”).

3 Press the [CONVERT TO EL] button.

If the source song contains two or more Registration banks, you'll need to make ready the same number of destination songs to save the converted data.

4 Insert the floppy disk, then press the [EXECUTE] button in the display.

If the remaining memory of the floppy disk is insufficient, conversion cannot be executed. (An error message appears and the operation is cancelled.)

Converting from EL format

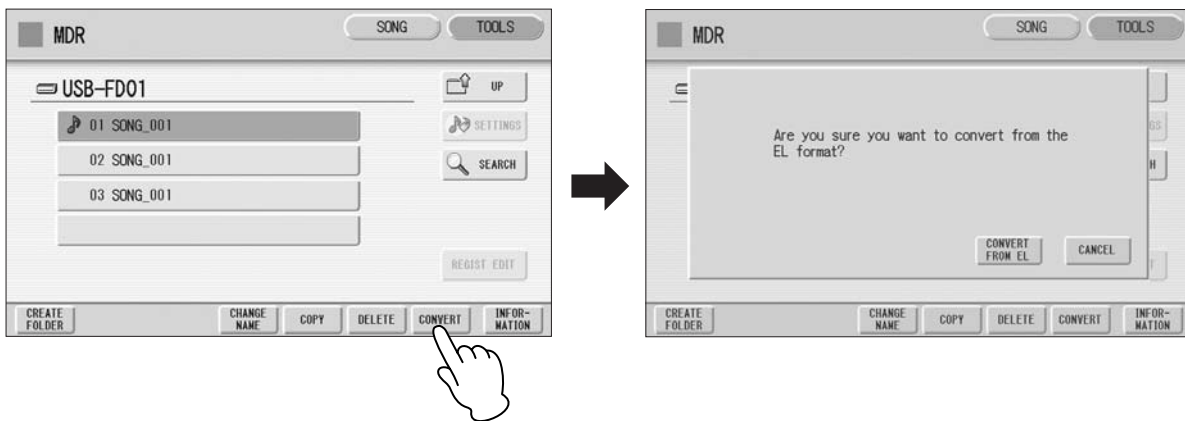
You can convert the songs in the floppy disk created with an EL-series Electone, such as the EL-900, to the DDK-7 format, and save it to a USB flash memory confirmed by Yamaha. You'll need to install the optional floppy disk drive such as UD-FD01. Depending on the original song, the sound or tempo of the converted song may differ from the original song, or the Next Song function of the original song may not be effective.

1 Insert the floppy disk that contains the song you want to convert from EL format, then select the source song.

For details on selecting a song, see page 12.

2 In the TOOLS Page, press the [CONVERT] button.

A message appears confirming if you want to convert from the EL format to the DDK-7 format.



3 Press the [CONVERT FROM EL] button in the display, then specify the destination for the converted song.

To use the converted song on the DDK-7, the destination must be USB flash memory.

4 Press the [EXECUTE] button in the display to start conversion.

If the remaining memory of the USB flash memory is insufficient, conversion cannot be executed. (An error message appears and the operation is cancelled.)



NOTE

When you convert the protected EL data to DDK-7 format, set the write-protect tab of the EL disk to the "overwrite" position (tab closed).

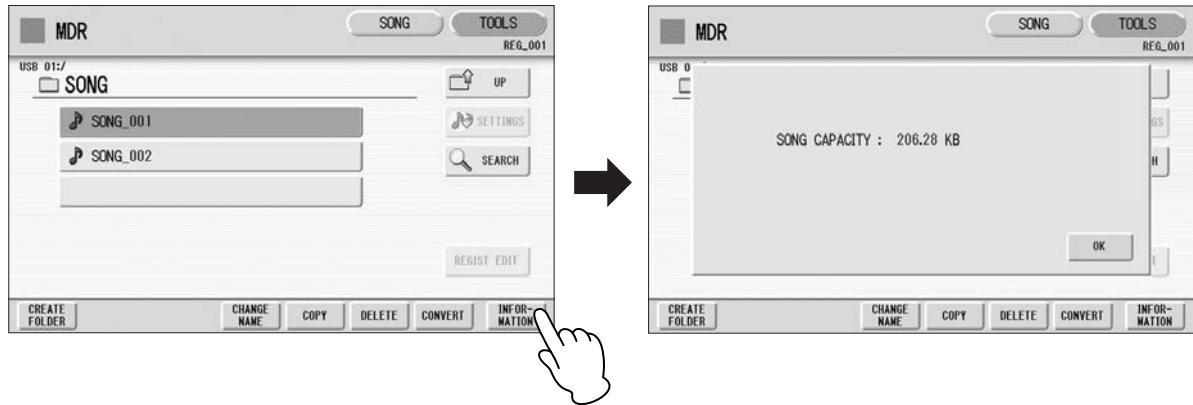


NOTE

When converting a protected EL song to the DDK-7 format, make sure to use a Yamaha-confirmed USB flash memory device with ID.

Checking the Remaining Memory/media ID

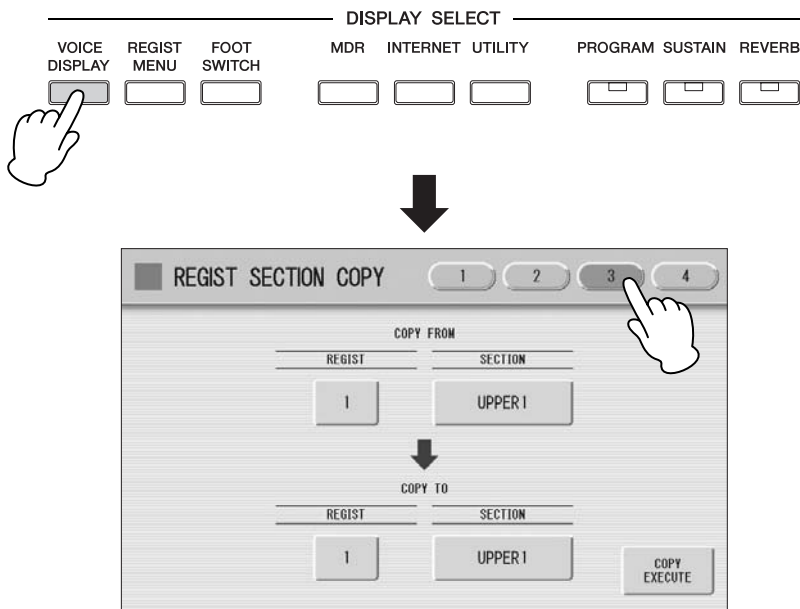
In the TOOLS Page, press the [INFORMATION] button. If a USB storage device is selected, the remaining memory in the media is shown, as well as whether or not the media has an ID. If a song is selected, the song data capacity, title, composer, etc. are shown.



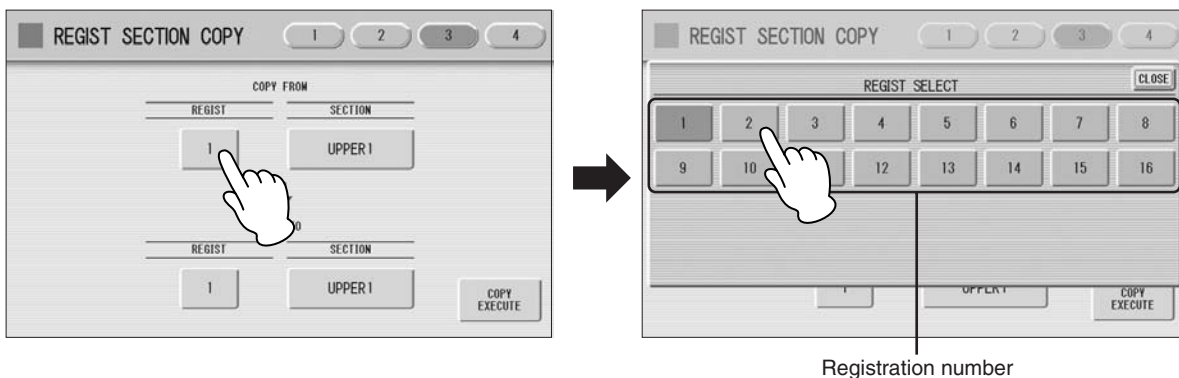
Copying Registrations

In the Voice Display, Page 3, you can copy a Registration stored to a specific Registration Memory number to another number on a specific section basis (Voices, rhythm, keyboard percussion). (The function is called Regist Section Copy.) This is useful, for example, when you want the upper keyboard Voice 2 in Registration number 2 to be the same as the upper keyboard Voice 1 in Registration number 1.

- 1 Press the [VOICE DISPLAY] button on the panel to call up the Voice Display.
- 2 Press the [3] button at the top right of the display to call up Page 3.

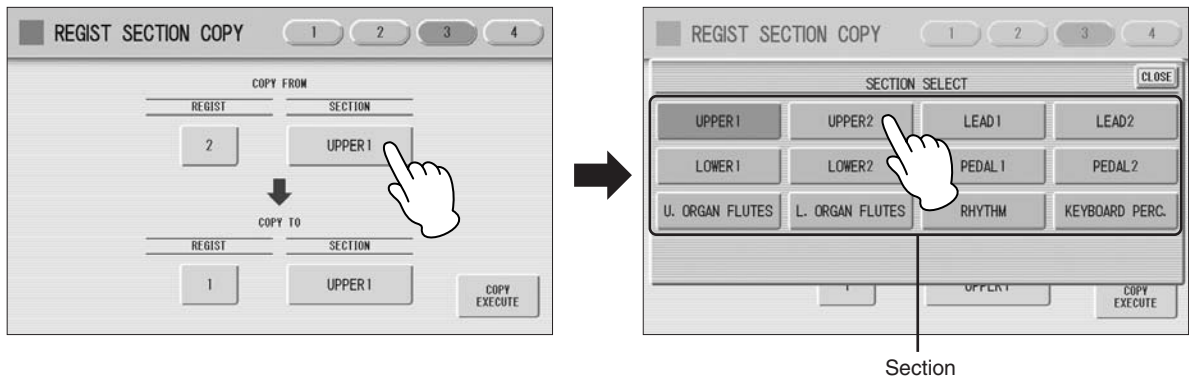


- 3 Press the COPY FROM [REGIST] number button and select the Registration number that you wish to copy.
To abort the operation press the [CLOSE] button.



4 Press the COPY FROM [SECTION] button and select the Regist Section that you wish to copy.

To abort the operation press the [CLOSE] button.



NOTE

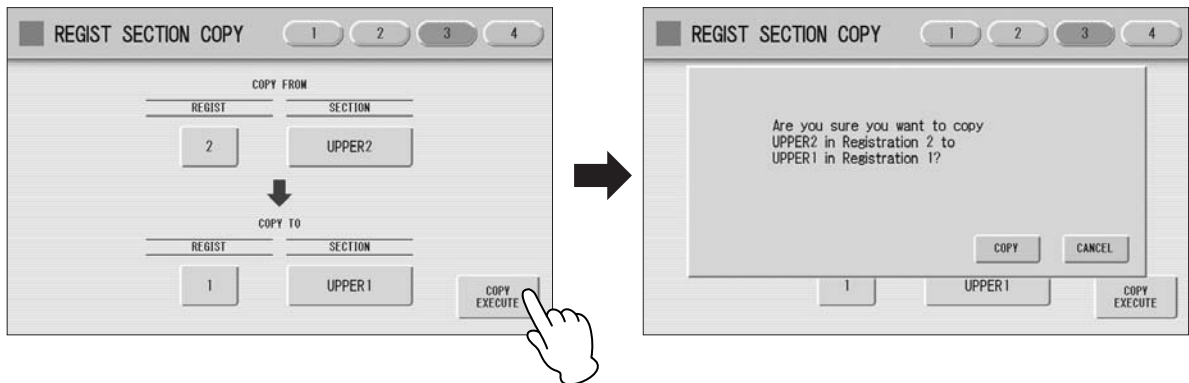
If you change the source Regist Section after changing the destination Regist Section the destination may automatically change to the section selected as the source Regist Section.

5 In the same way, select the COPY TO Registration number and Regist Section.

The COPY TO Regist Section depends on the Regist Section selected for COPY FROM.

6 Press the [COPY EXECUTE] button at the bottom right in the display.

The following display appears, prompting confirmation of the operation.



7 Press the [COPY] button in the display to copy the Registration and a message momentarily appears in the display indicating that the Registration has been copied.

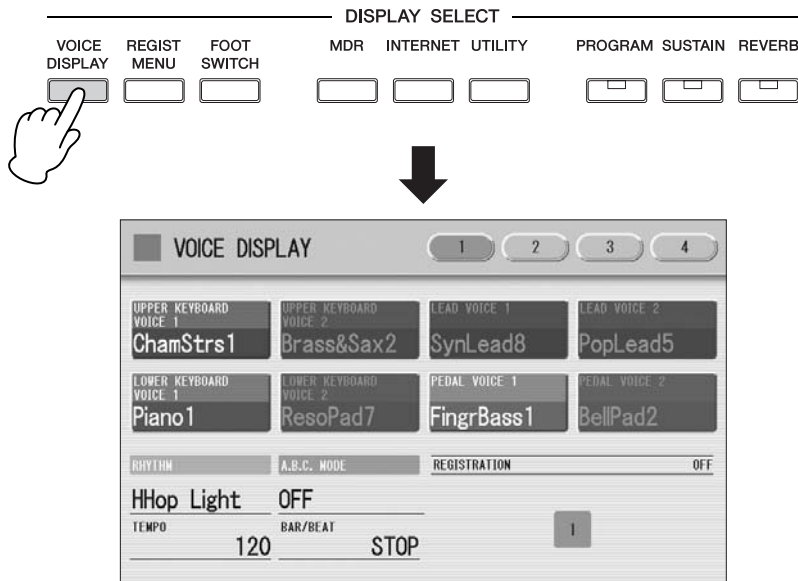
Select [CANCEL] to abort the operation.

Voice Display

You can visually confirm the currently assigned Voices to each keyboard, currently selected rhythm, Registration Shift, and so on, in the Voice Display.

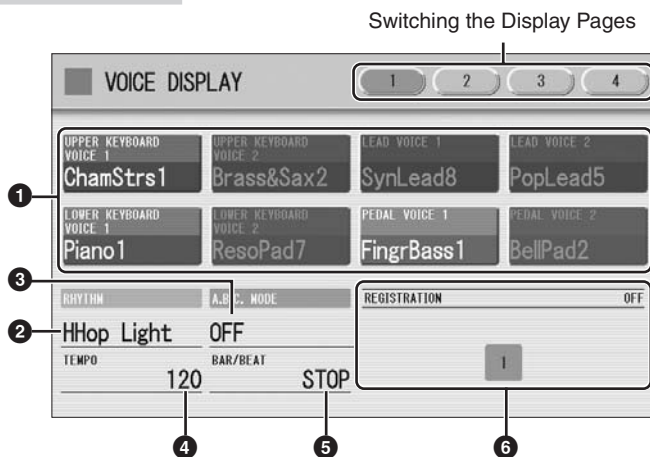
How to call up the Voice Display:

The Voice Display always appears when the DDK-7 is turned on. To call up the Voice Display from any other display, press the [VOICE DISPLAY] button.



The Voice Display consists of four different pages that can be switched by pressing the [1], [2], [3] or [4] button at the top right of the display.

Voice Display [Page 1]





Reference Page

Selecting a Voice (Owner's Manual, Chapter 2)



Reference Page

Selecting a rhythm (Owner's Manual, Chapter 5)



Reference Page

Auto Bass Chord (Owner's Manual, Chapter 5)



Reference Page

Adjusting the tempo (Owner's Manual, Chapter 5)



Reference Page

Registration Shift (Owner's Manual, Chapter 6)

1 Voice Sections

Shows the Voices currently assigned to each Voice section. You can also mute specific Voice section by pressing its button (the button is grayed-out).

2 RHYTHM

Shows the currently selected rhythm.

3 A.B.C. MODE

Shows the mode of the Auto Bass Chord.

4 TEMPO

Shows the current rhythm tempo.

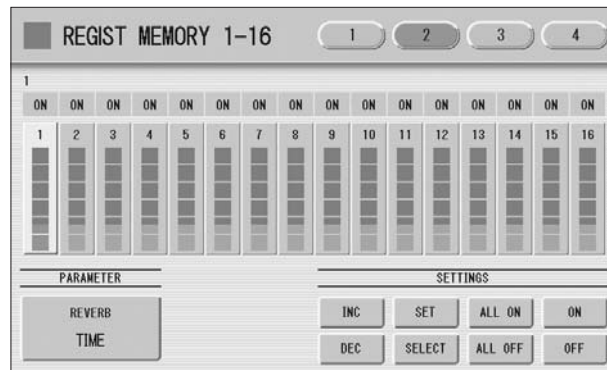
5 BAR/BEAT

Shows the bar/beat when the rhythm is playing.

6 REGISTRATION

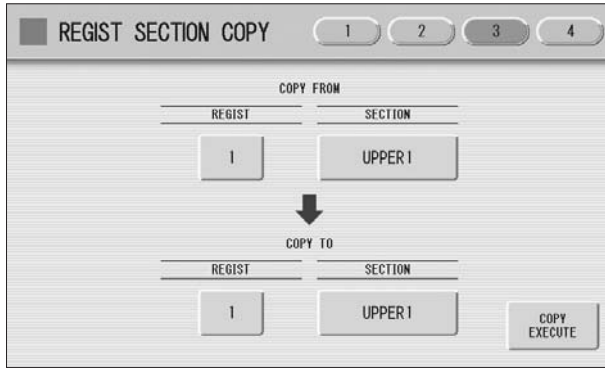
Shows the current position of the Registration Shift.

Voice Display [Page 2]



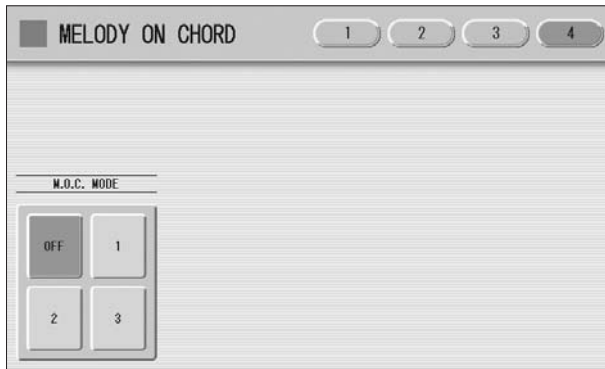
You can confirm the parameter values (for example, Reverb, Volume, Pan) for each Registration Memory simultaneously. Moreover, you can unify a specific parameter used in various Registration Memories at one time. Refer to the Owner's Manual, chapter 6 for the details.

Voice Display [Page 3]



The Registrations stored to the Registration number can be copied to another Registration number for each individual section. Refer to the Owner's Manual, chapter 6 for the details.

Voice Display [Page 4]



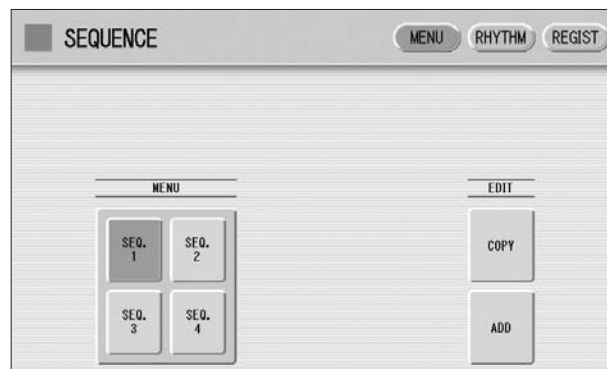
Determines the Melody On Chord modes. Refer to the Owner's Manual, chapter 5 for the details.

Copying a Sequence

You can copy a rhythm sequence stored on a sequence button to another button. You can also add a rhythm sequence to the end of another rhythm sequence.

1 Press the EDIT [COPY] or [ADD] button in the Sequence Menu page.

The Copy From or Add From Display appears.



2 Select the number of the desired rhythm sequence program to which you want to copy or to which you want to add.

A message appears prompting confirmation of operation.

3 Press the [COPY] or [ADD] button to copy or add the rhythm sequence.

Press [CANCEL] to abort the operation.

4 If necessary, edit the sequence.

Refer to the section “Editing an Existing Rhythm Sequence” and/or “Editing an Existing Registration Sequence” of the Owner’s Manual, chapter 9.

Selecting Registrations

Simply press the numbered button that corresponds to the Registration you wish to select.

- You can also recall Registrations by using the Foot Controllers. This function is called “Registration Shift” (Owner’s Manual, Chapter 6).
- You can also program the Registrations to change automatically at specific points within the Rhythm Sequence. This function is called “Registration Sequence” (Owner’s Manual, Chapter 9).

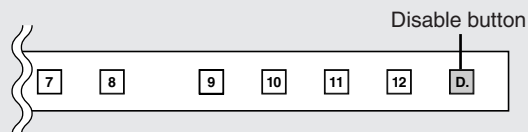


Reference Page

Controlling the Registration Shift (Owner’s Manual, Chapter 10)

Using the [D.] (Disable) button:

Rhythm and automatic accompaniment patterns also change when you select different Registration Memory buttons. Pressing the [D.] (Disable) button allows you to keep the same rhythm, accompaniment patterns, tempo, and so on throughout all your Registration changes, or make your own rhythm selections if you want to.

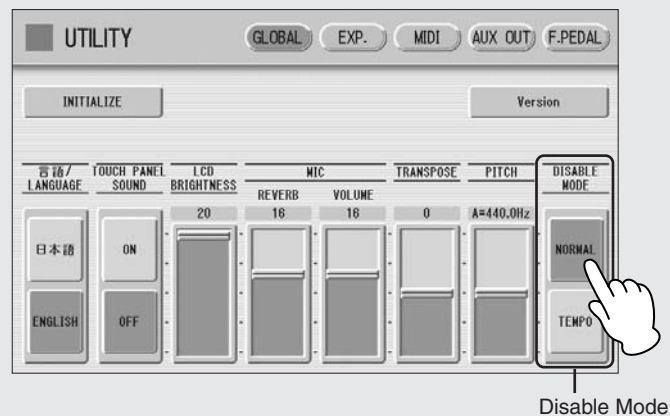


The particular settings that do not change when the [D.] (disable) button is on depend on the Disable mode setting. For details on the Disable mode, see “Selecting Disable Mode” on page 50.

Selecting Disable Mode:

The Disable mode enables you to select what is to be disabled when the [D.] (Disable) button is on. There are two Disable modes: NORMAL (rhythm menu, tempo, etc. are disabled) and TEMPO (only tempo is disabled).

- 1 Press the [UTILITY] button to call up the GLOBAL Page of the Utility Display.
- 2 Press the [GLOBAL] button to call up the GLOBAL Page.
- 3 Press the DISABLE MODE [NORMAL] or [TEMPO] button.



NORMAL

When the Electone is set to the NORMAL mode and the [D.] (Disable) button is on, the following functions will not change, even when you change the Registration Memory number.

- Rhythm menu, Rhythm section, Rhythm tempo, Rhythm volume, Rhythm reverb
- Rhythm reverb time
- Accompaniment volume, Accompaniment reverb, On/Off status of Accompaniment parts
- A.B.C. mode, A.B.C. memory
- M.O.C. mode
- Second expression pedal control for rhythm tempo

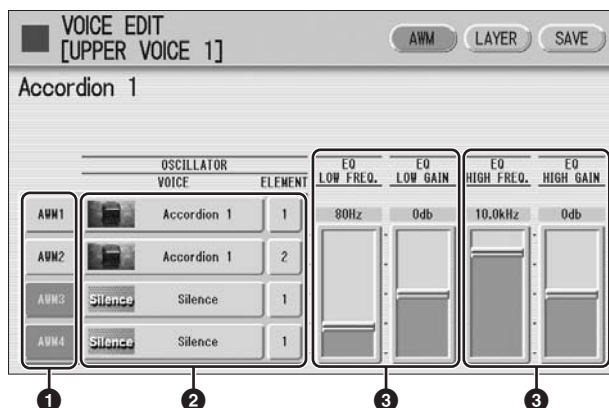
TEMPO

When the Electone is set to the TEMPO mode and the [D.] (Disable) button is on, the rhythm tempo will not change, even when you change the Registration Memory number.

Editing an AWM Voice

You can edit an AWM Voice on the AWM Page and LAYER Page in the Voice Edit display. In the AWM Page, the tonal balance of the entire Voice can be corrected by some EQ parameters. In the LAYER Page, you can make detailed edits to each Element.

AWM Page



1 Element On/Off switches

The [AWM1] – [AWM4] buttons indicate the Elements which make up the selected Voice. You can mute any of the Elements by simply pressing the corresponding button. Pressing the button again cancels the mute.

2 VOICE/ELEMENT

Indicates the Voice/Element currently being edited. For example, the screen above shows that Element 1 of Accordion 1 is assigned to AWM1, the Element 2 of Accordion 1 is assigned to AWM2 and no Voice is assigned to AWM3 and AWM4. You can also call up another Element from another Voice and replace the currently selected Element with it. Pressing the VOICE or ELEMENT button in the display calls up the Voice or Element menu, from which you can select the desired Voice/Element (usually Element 1). If you change Voice, the Element will automatically change to the first Element of the Voice (usually Element 1).

3 EQ LOW FREQ./EQ LOW GAIN

Sets the frequency and gain (level) of the low frequency band. The EQ LOW FREQ. slider sets the desired frequency band over a range of 32 Hz – 2.0 kHz. The EQ LOW GAIN slider sets the level for the frequency band (specified by the EQ LOW FREQ. slider) over a range of -12 dB – +12 dB.

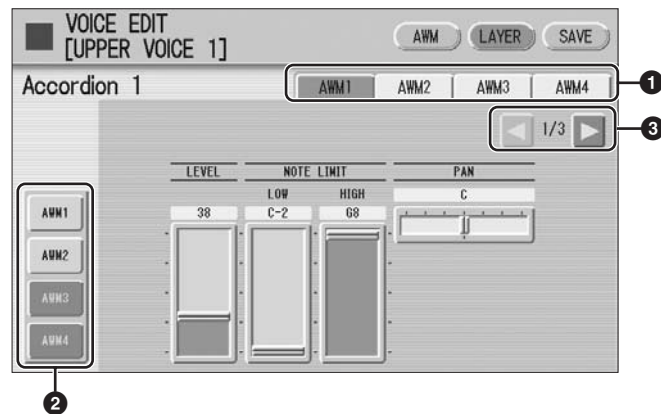
4 EQ HIGH FREQ./EQ HIGH GAIN

Sets the frequency and gain (level) of the high frequency band. The EQ HIGH FREQ. slider sets the desired frequency band over a range of 500 Hz – 16.0 kHz. The EQ HIGH GAIN slider sets the level for the frequency band (specified by the EQ HIGH FREQ. slider) over a range of -12 dB – +12 dB.

EQ (Equalizer)

Usually an equalizer is used to correct the sound output from amps or speakers to match the special character of the room. The sound is divided into several frequency bands, then by raising or lowering the level for each band, the correction is made. This DDK-7 has a two-band (high and low) digital equalizer that lets you adjust the overall sound according to the type of music you play — classical music being more refined and soft, pop music more crisp, and rock music more dynamic.

LAYER Page



❶ Element select buttons

Select the Element you wish to edit.

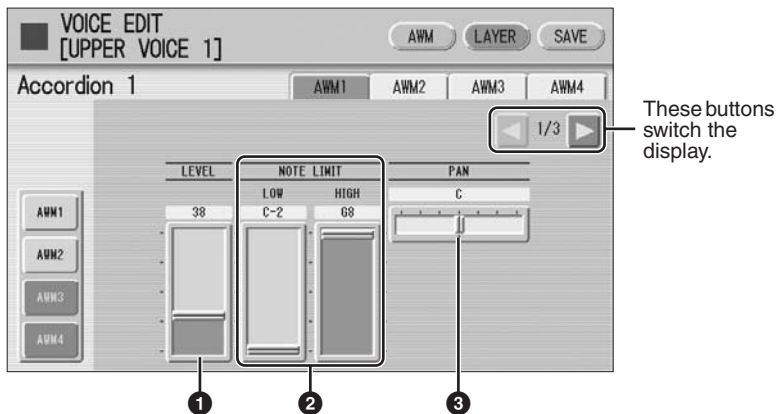
❷ Element On/Off switches

The [AWM1] – [AWM4] buttons indicate the Elements which make up the selected Voice. You can mute any of the Elements by simply pressing the corresponding button. Pressing the button again cancels the mute. Muting all other Elements except for the one you are editing lets you clearly hear that single Element for ease in editing. Note that when some Elements are muted, playing the keyboard in certain key areas or with certain velocities may result in no sound.

❸ Display switch buttons

The LAYER Page contains three pages. The ◀ ▶ buttons are used to switch among them.

LAYER Page 1



1 LEVEL

Determines the output level of the Element.

Range: 0 – 127

2 NOTE LIMIT

Determines the lowest and highest notes in the range for which the Element sounds. The setting of the HIGH slider cannot be set higher than that of the LOW slider. Some Elements are not affected by this parameter.

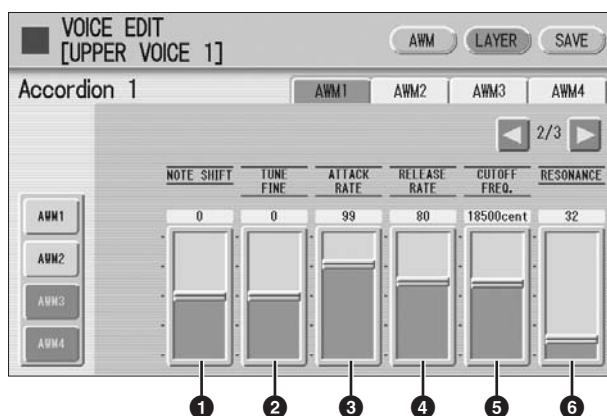
Range: C-2 – G8

3 PAN

Determines the position of the Element in the stereo image.

Range: L64 – R63

LAYER Page 2



1 NOTE SHIFT

Determines the pitch settings in semitones.

Range: -64 – +63

2 TUNE FINE

Determines the fine tuning.

Range: -64 – +63

③ ATTACK RATE

Determines how quickly the Element will reach its maximum level after the key is played. Higher values produce a faster attack.

Range: 0 – 127

④ RELEASE RATE

Determines how much time it takes for the level to reach 0 after the key is released. Higher values make the time shorter.

Range: 1 – 127

⑤ CUTOFF FREQ.

Determines the cutoff frequency of the filter.

Range: 9600 – 24000 cent

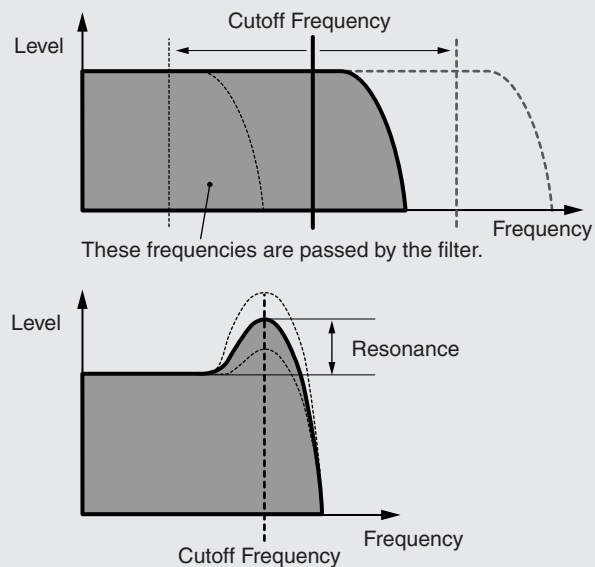
⑥ RESONANCE

Determines the amount of resonance (harmonic emphasis) applied to the signal at the cutoff frequency. Some Elements are not affected by this parameter.

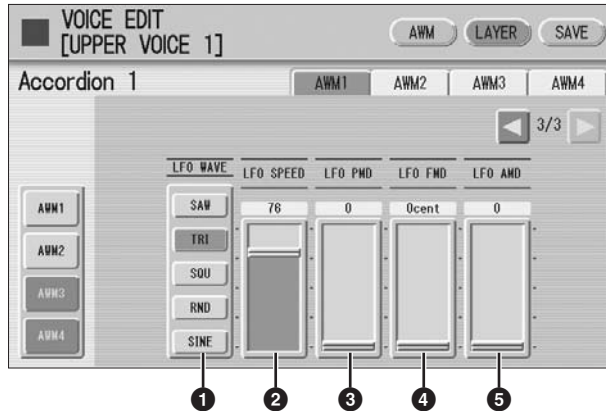
Range: 16 – 140

Filter — Cutoff frequency and Resonance

Filter modifies the tone by cutting the output of a specific frequency portion of the sound. This DDK-7 is equipped with a low pass filter, which passes only those signals below the cutoff frequency and cuts signals above the cutoff frequency.



You can produce a relatively bright or darker sound by setting the cutoff frequency. Resonance is a parameter that boosts the level of the signal in the area of the cutoff frequency. By emphasizing the overtones in this area, this can produce a distinctive “peaky” tone.



① LFO WAVE

Determines the LFO waveform used to vary the sound. For details, see page 56.

② LFO SPEED

Determines the speed of the LFO waveform. Higher values make the speed faster.

Range: 2 – 93

③ LFO PMD (Pitch Modulation Depth)

Determines the amount by which the LFO waveform varies the pitch of the sound. Higher values result in a greater amount of pitch change. For the minimum setting, the pitch does not change.

Range: 0 – 400

④ LFO FMD (Frequency Modulation Depth)

Determines the amount by which the LFO waveform varies the filter cutoff frequency. Higher values result in a greater amount of frequency change. For the minimum setting, the frequency does not change.

Range: 0 – 4800 cent

⑤ LFO AMD (Amplitude Modulation Depth)

Determines the amount by which the LFO waveform varies the amplitude of the sound. Higher values result in a greater amount of amplitude change. For the minimum setting, the amplitude does not change.

Range: 0 – 128

When playing a User Voice you have created using the LFO parameters (above), set the Vibrato setting in the Voice Condition display to “Preset,” not “User.” If Vibrato is set to “User” and the Vibrato parameters (depth and/or speed) are set fairly high, you may not be able to hear the effect of the LFO.



Reference Page

Vibrato (Owner's Manual, Chapter 4)

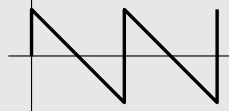
LFO (Low Frequency Oscillator)

As its name suggests, the LFO creates waveforms of a low frequency.

These waveforms can be used to vary the pitch, filter or amplitude to create effects such as vibrato, wah and tremolo.

The following five waveforms are available.

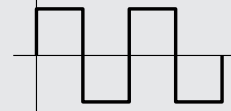
saw



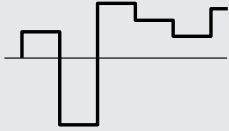
tri



squ



rnd



sine

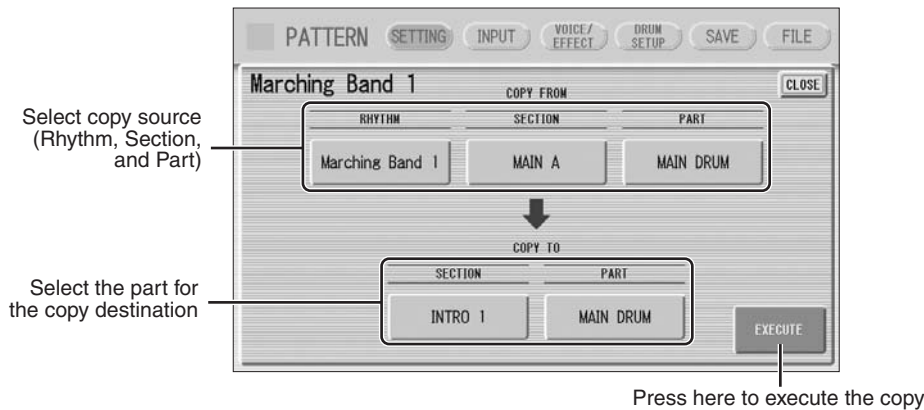


Other Changes

Copy From/Copy To Display for Rhythm

② ASSEMBLE

Copies the part from another rhythm to the currently selected rhythm. You can assemble various sections from multiple rhythms to create your original rhythm. Pressing the [ASSEMBLE] button calls up the following display.



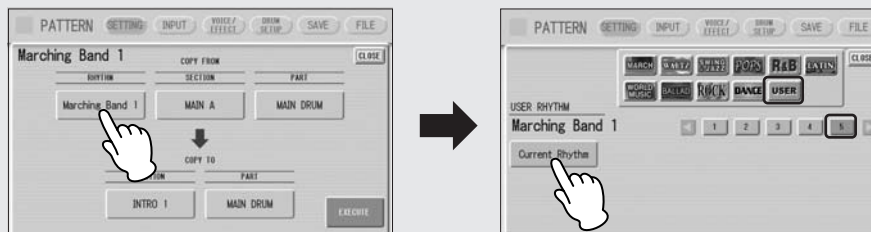
Select the copy source: Rhythm, Section and Part. Then select the destination. You can copy only one part, or all parts of a rhythm.

After setting the source and destination, press [EXECUTE]. Copy is executed and returning to the previous display.

You can also select a rhythm pattern currently being created as the COPY FROM RHYTHM.

To create a MAIN B section based on MAIN A, you can conveniently create that you create the MAIN A rhythm first and copy it to MAIN B, then edit the MAIN B rhythm.

To select the rhythm currently being created, select “Current Rhythm” on the 5th page of the “USER” category.



Creating Backing Patterns (Rhythmic Chord Function)

The Rhythm Pattern Program allows you to use one of the DDK-7's Accompaniment patterns with your original rhythm. You can select and save the Accompaniment pattern that best matches the rhythm that you have created. Moreover, Rhythm Pattern Program features a Rhythmic Chord function that lets you add your own backing patterns to the rhythms you create.

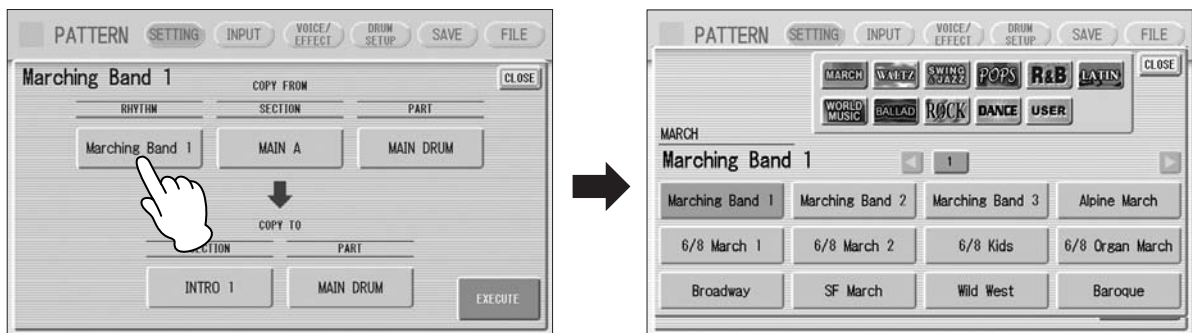
To select an appropriate Accompaniment pattern for your newly created rhythm:

- 1 Press the [SETTING] button at the top of the display to call up the SETTING Page.**
- 2 Press the [ASSEMBLE] button.**
A pop-up menu appears, letting you select the copy source and destination part.
- 3 Using the COPY FROM [RHYTHM] and [SECTION] buttons, select the rhythm and the section which has the accompaniment you wish to use.**



Reference Page

Basic settings for the Rhythm Pattern (Owner's Manual, Chapter 9)



- 4 Using the COPY FROM [PART] button, select the accompaniment part you want to copy.**
- 5 Using the COPY TO [PART] button, select the desired accompaniment part (CHORD 1 or CHORD 2) to be used for the Rhythmic Chord pattern.**
- 6 Press the [EXECUTE] button to execute the copy.**

The desired accompaniment part (Rhythmic Chord pattern) has been copied.

Functions and settings that cannot be memorized:

Version 1.1 does not allow the following settings to be stored to a Registration Memory number.

Functions and settings that cannot be memorized:

The following settings cannot be stored to a Registration Memory number.

- Pitch
- MIDI Control settings
- Mic. Volume
- AUX OUT settings
- Mic. Reverb
- LCD related settings
- Score related settings except Next Page

The following settings common to all Registration Memory numbers 1 – 16 and cannot be stored individually for each number.

- Transpose
- Attack mode in Organ Flute Voices
- Registration Shift
- Auto Fill setting
- Reverb type
- User Voices
- User rhythms
- User Keyboard Percussion
- Rhythm Sequences
- Disable setting
- Disable mode
- Next Page setting of score setting



Reference Page

Saving Registrations as
Registration Data (File)
(page 22)

MIDI Data Format

Overall

System Parameters

Address			Size	Data	Parameter	Data	Receive	Rx Range	Transmit	Tx Range
hh	mm	ll								
14	00	00	1	00-7F	Disable (On/Off)	00:OFF 01:ON	○	00-7F	×	-
14	00	01	1	00-7F	Organ Flute Attack Mode	00:Each 01:First	○	00-7F	○	00-01
14	00	02	1	3A-46	Transpose	3A:KeyDown 40:Normal 46:KeyUp	○	3A-46	○	3A-46
14	00	03	1	01-0C	2nd Expression Range	01:100 C 0C:1200 C	○	01-0C	○	01-0C
14	00	04	1	00-7F	Footswitch Mode	00:OFF 01:Rhythm 02:Glide 03:Rotary Speaker	○	00-7F	○	00-03
14	00	05	1	00-7F	Pitch	00:PitchDown 40:Normal 7F:PitchUp	○	00-7F	○	00-7F
14	00	06	1	00-7F	Footswitch Glide Time	00:FAST 7F:SLOW	○	00-7F	○	04-1C
14	00	08	1	00-7F	MIDI Control Expression (INT/EXT)	00:Internal 01:External	○	00-7F	×	-
14	00	09	1	00-7F	MIDI Control Lead 1 (INT/EXT)	00:Internal 01:External	○	00-7F	×	-
14	00	0A	3	00-04, 06 00-03 00-0B	Registration Menu	00-04, 06 00-03 00-0B	○	00-04, 06 00-03 00-0B	○	00-04, 06 00-03 00-0B
14	00	0B	1	00-01	Disable Mode	00: Normal 01: Tempo	○	00-01	○	00-01

