

EXB-FW for M3 Manual

EXB-FW option (FireWire board)

If you install the optional EXB-FW in the M3, you'll be able to use its Virtualized Hardware functionality.

Virtualized Hardware is functionality that allows audio signals and MIDI messages from a Korg hardware device supporting this functionality to be routed via a dedicated Korg editor running in your DAW software or other host application and sent to tracks in your host application, letting you use your Korg hardware device as though it were a plug-in software instrument.

In order to use the Virtualized Hardware functionality, you'll need to connect the M3 to your computer via a FireWire (IEEE 1394) cable, and use the M3 Editor/Plug-In Editor version compatible with the EXB-FW. With this setup, you'll be able to perform various types of control including total recall, as follows.


- Edit and set up the M3's various mode parameters via MIDI.
- Send and receive the M3's 2-in and 6-out digital audio signals.

You can send the M3's audio signals to tracks in your host application using the Virtualized Hardware functionality. You can apply plug-in effects to these M3 audio signals, and control them together with the data of other audio tracks.

You can also apply the M3's effects to the audio signals from audio tracks of your host application.

- Send and receive MIDI data to and from your DAW software or other host application.

Note: What you will be able to do will depend on the application you're using.

 Please note the following points.

- The two connectors have the same function. The connector that's not connected to your computer can be used for a daisy-chain connection with a FireWire device that your computer can recognize. (The M3 will not recognize this device.) If the M3 is powered-off, the daisy-chained FireWire device cannot be detected from the connected computer.
- The EXB-FW does not supply bus power.
- Don't connect the EXB-FW to two computers simultaneously.
- Don't connect the EXB-FW to two M3 units simultaneously.
- The MIDI data sent from the computer via the FireWire (IEEE 1394) port to the M3 will not be output from the M3's MIDI OUT connector.
- In order to use the M3 Editor/Plug-In Editor with the EXB-FW, you must install and use the KORG EXB-FW Audio/MIDI driver. please see "Installing the software" on page 34 of the Operation Guide.
- Each input/output device can be used only from a single item of software. Multi-client operation is not supported.
- You will need to make audio and MIDI device settings in your DAW software or other host

application. For details, refer to the manual of the software you're using.

For more about the EXB-FW, refer to the manual included with the EXB-FW.

EXB-FW parameters

When you install the EXB-FW, the following M3 parameters will become available. For details on the parameters, refer to the corresponding pages of the M3 Parameter Guide.

Program mode

- Prog P0: Play– Sampling/Audio In
"Input" (→ PG p.9)
"Source Bus" (→ PG p.10)
The menu command "Auto Sampling Setup" REC Audio Input (→ PG p.110)
- Prog P0: Play– Control Surface, Mixer Input
"Audio Play/Mute," "Audio Solo," "Audio Volume" (→ PG p.17)

Combination mode

- Combi P0: Play– Sampling/Audio In
"Input" (→ PG p.128)
"Source Bus" (→ PG p.129)
The menu command "Auto Sampling Setup" REC Audio Input (→ PG p.187)
- Combi P0: Play– Control Surface, Mixer Input
"Audio Play/Mute," "Audio Solo," "Audio Volume" (→ PG p.133)

Sequencer mode

- Seq P0–1: Play/REC– Sampling/Audio In
"Input" (→ PG p.202)
"Source Bus" (→ PG p.202)
The menu command "Auto Sampling Setup" In-Track Sampling (→ PG p.277)
- Seq P0: Play– Control Surface, Mixer Input
"Audio Play/Mute," "Audio Solo," "Audio Volume" (→ PG p.210)

Sampling mode

- Sampling P0: Recording– Audio In/Setup
"Input" (→ PG p.305)
"Source Bus" (→ PG p.305)
The menu command "Auto Sampling Setup" REC Audio Input (→ PG p.335)
- Sampling P0: Recording– Control Surface, Mixer Input
"Audio Play/Mute," "Audio Solo," "Audio Volume" (→ PG p.310)

Global mode

- Global P0: Basic Setup– Audio

“Input” (→ PG p.360)

- Global P1: MIDI– MIDI Basic
“MIDI Clock” (→ PG p.364)

Media mode

- Media– Play Audio CD
“Input” (→ PG p.395)

Example connections between a computer and an M3 with the EXB-FW installed

- For details on installing the EXB-FW option in the M3, please see “Installing the EXB-FW” on page 205 of the Operation Guide.
- For details on installing the M3 Editor/Plug-In Editor and the KORG EXB-FW Audio/MIDI driver, please see “Installing the software” on page 34 of the Operation Guide.

The connection examples described here are for using Virtualized Hardware functionality with an M3 in which the EXB-FW has been installed.

For details, please see the “M3 Editor/Plug-In Editor Manual” (PDF) of a version that supports the EXB-FW, and the manual for the application you’re using.

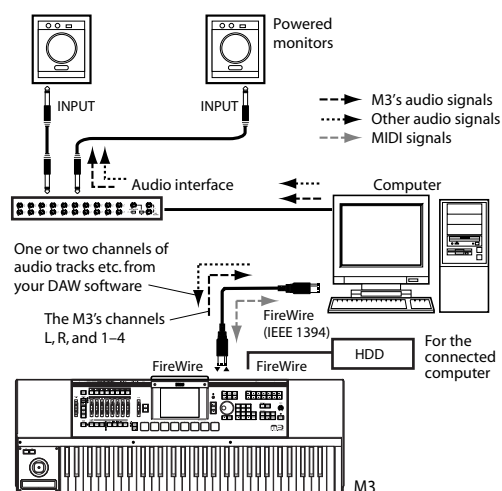
1. Use a FireWire (IEEE 1394) cable to connect the M3's FireWire connector to your computer's FireWire (IEEE 1394) port.
2. Make the necessary settings in the M3's Global mode.

For details, please see “Global mode settings on the M3” on page 32 of the Operation Guide.

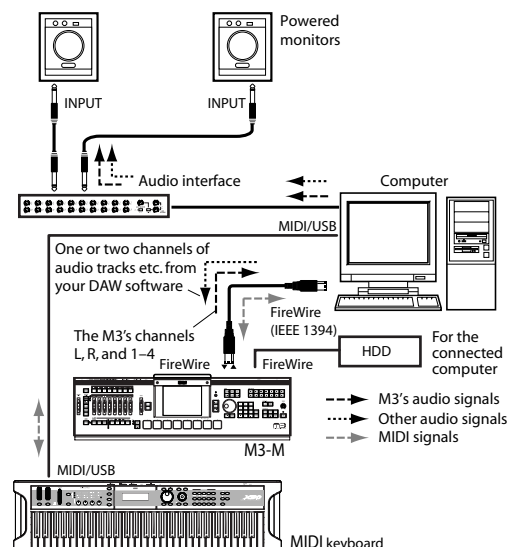
- 3. Make the necessary settings on your computer.**

Make the appropriate settings for the DAW software or other host application you're using. Refer to the manual of your software for details. For an example of a setup in a host application, please see "M3 Editor/Plug-In Editor Manual" (PDF).

Connection for the M3-61/73/88 (for the M3 Plug-In Editor)



Connection for the M3-M (for the M3 Plug-In Editor)



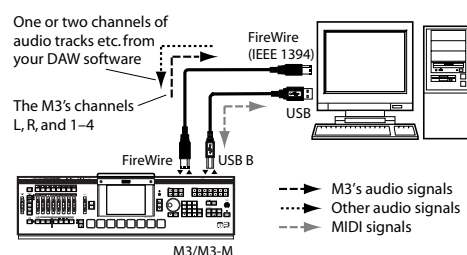
FW-MIDI baud rate

The baud rate of FW-MIDI (a MIDI connection via the FireWire cable) is the same 31.25 kBps as when using a conventional MIDI cable. Since the dump data used by the M3 is large, performing a data dump via FW-MIDI will take a long time if you execute an "all dump."

If you're using FW-MIDI, we recommend that you minimize the settings in Total Recall & Data Sync Settings. Refer to the M3 Editor/M3 Plug-In Editor owner's manual (PDF) section on Software Setup.

By using USB-MIDI in conjunction with this, you can utilize the high-speed communication rate of USB 2.0. Refer to the M3 Editor/M3 Plug-In Editor owner's manual (PDF) section on Software Setup/MIDI Settings.

Connection using FW-Audio and USB-MIDI



Specifications

EXB-FW specifications when installed in the M3

Audio:

Sample resolution 24-bit
Sampling frequency 48 kHz (fixed)
Number of input/output channels 2-in/6-out

MIDI:

Number of input/output ports 1-in/1-out