

Using Logic Pro With The Akai MPC

2nd Edition

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Utilise Logic Pro in an MPC-Based Studio

Using The Akai MPC With Logic: 2nd Edition

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Introduction

This book has been written as a guide for Akai MPC owners who wish to utilise Apple's Logic when creating beats. Throughout this book I assume that you are already familiar with the general usage of the MPC, so have a basic grasp of the main sequencer functions, like sequence recording, STEP EDIT, and adjusting MAIN page parameters like track program assignments etc. This book is not intended as a complete beginners guide to using the MPC itself (we already have those at <http://www.mpc-samples.com/section.php/8/0/>).

Similarly, this book is not intended to be a complete guide to using Logic - that would require much longer book! We've concentrated only on the issues you need to learn to successfully use Logic as a sound module and for the MPC as well as using it to record MPC MIDI and audio performances, keeping it clear and jargon-free to help explain all the core principles and techniques.

We advise that you first locate the folder marked 'Tutorial Files' and transfer these sounds to your MPC's disc (CF card, zip, hard drive etc). This means you can quickly load up the relevant MPC files when working through each tutorial. If you need help transferring files, please consult the file transfer FAQ on our site here:

<http://www.mpc-samples.com/transfer.php>

Enjoy the book, and happy beat making!

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003 Syncing Your MPC With Logic

More than a Sound Module

As we saw in the previous chapter, Logic can be a valuable sonic resource for beats and songs written within an MPC, working as a 'sound module' that can provide quality sounds triggered by MPC MIDI events. The idea here was that your entire beat is written and played back within an MPC.

Taking this idea a little further, you could also use your MPC to 'trigger' other sonic resources from Logic. Remember, Logic is a complete digital audio workstation (DAW), so is also able to record complex MIDI sequences and even complete audio performances. These Logic sequences and audio tracks can also be 'triggered' by your MPC when required.

So for example, you've written a cool beat in your MPC, but it needs some scratching. You could record your scratching onto a Logic audio track and as you continue to work on your beat within your MPC, you can have Logic automatically play this scratching back in perfect synchronisation each and every time you hit 'PLAY' in your MPC.

And when it becomes time to create a polished stereo master of your beat, Logic is ready to show you its true power, as you can transfer *everything* from your MPC into Logic, either as MIDI information or as pure audio. Once completely transferred into the Logic environment, we can then apply further processing, effects, edits and other essential mixing techniques to create a polished, professional master.

MIDI Sync Overview

In order to perform many of these tasks, we must 'synchronize' the MPC with Logic. We do this using the MIDI protocols we mentioned in chapter 1 – **MIDI Beat Clock** and **MIDI Time Code (MTC)**. These MIDI protocols continually send MIDI instructions from one machine to the other, ensuring that both machines retain a tight sync with each other.

MIDI Syncing Protocols

There are two MIDI syncing protocols used by Logic – MIDI Clock and Midi Time Code (MTC).

MIDI Clock is a signal that represents the current tempo of the music, but contains no time or location information. It can be used to keep two MIDI devices synchronised, and can also allow the ‘master’ device to start and stop the ‘slave’ device.

Midi Time Code is a signal that continually tells the slave device what time and location the master device is currently at.

When syncing via MIDI, we have to assign one machine as the ‘master’; this machine will send out all sync information, including tempo, time code, and transport control data (i.e. stop, play, forward, back etc). The machine receiving these commands is referred to as the ‘slave’. In this book, we will be providing examples where the MPC is either master or slave depending on the specific requirements of the task.

Let’s dive in – and don’t worry, MIDI sync is actually really simple to set up!

First, in your MPC load up the same ‘LOGIC’ project we used in the last tutorial. Select sequence 1, which is just the drum beat.

Now in Logic, open up ‘**Logic-Sound-Module-tempo.logic**’. This project contains three Logic Software instrument tracks, with a session tempo set to 80 BPM to match that of our MPC sequence.

The first example will be for MIDI Clock as this is the only MIDI sync protocol available in all MPCs.

Syncing With MIDI Clock

MIDI Clock is a syncing protocol present in all MPCs. It is a signal that continually tells the ‘device the current tempo of the ‘master’ device.

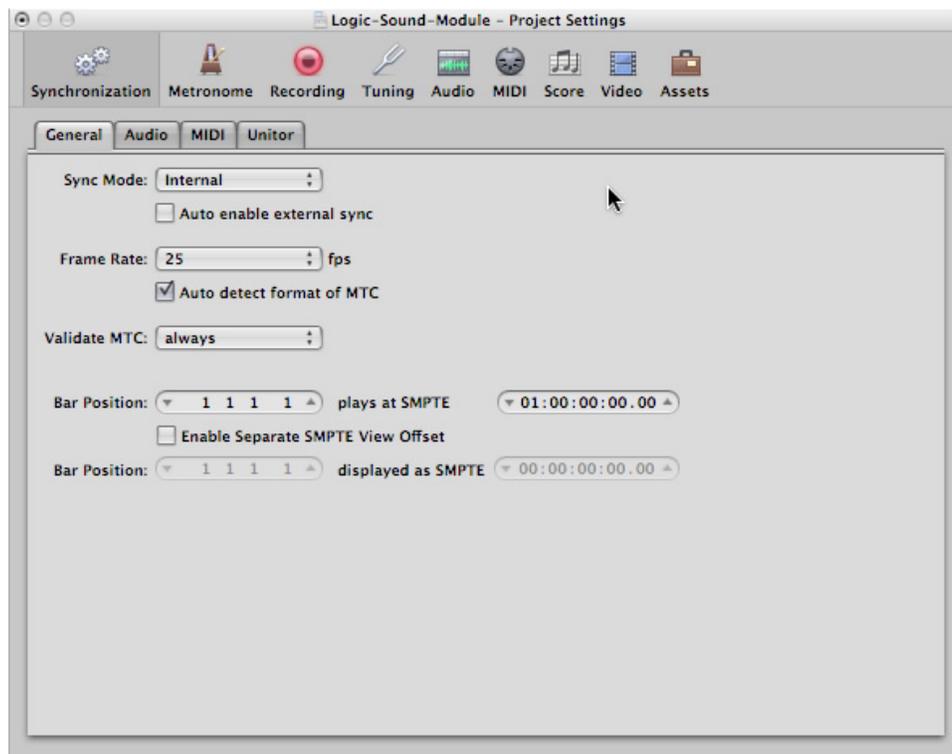
When syncing via MIDI clock, all MPCs can be either the ‘master’ or ‘slave’ device. However, Logic can only be a MIDI Clock ‘master’ - hence in this example, we’ll be using Logic to control the playback of your MPC. Hence when you press ‘record and play’ in Logic, the MPC begins to play back as well, and at

the same tempo as Logic This means that in theory, there's no need to worry about the tempo in your MPC, as it will be overridden by Logic.

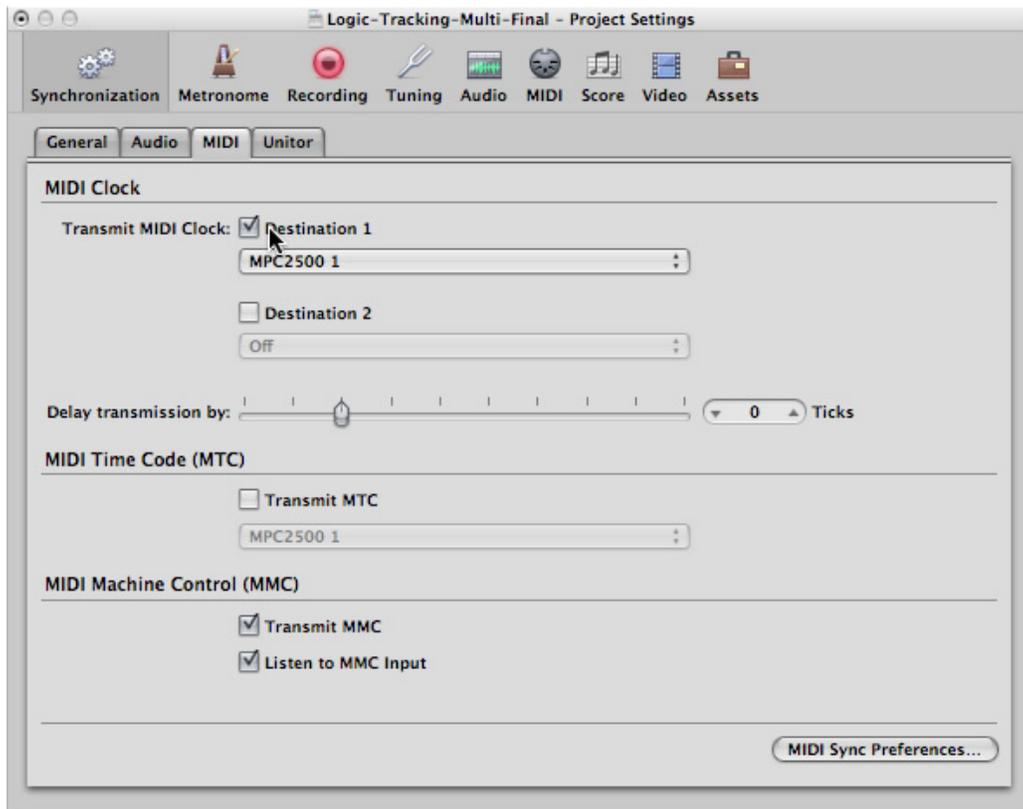
Firstly, be aware that in order for Logic to control the MPC, the MPC must be able to *receive* MIDI instructions from Logic. This means we need to have a MIDI cable going from Logic's MIDI OUT to the MPC MIDI IN. This should already be set up as per the instructions within chapter 1 (as part of the '**MIDI handshake**'). If this is not set up, make sure you now connect a MIDI cable from your audio/MIDI interface's main MIDI OUT to your MPC's MIDI IN 1.

MIDI Clock Set up – Logic

in Logic, go to '**File > Project Settings > Synchronization**'



On this page, just make sure '**Sync Mode**' is set to the default '**Internal**'. Now click the **MIDI** tab (not the MIDI icon, the third tab along under 'synchronisation'):



Here, make sure 'Transmit MIDI Clock' to 'Destination 1' is checked. In the 'Destination 1' select box, you can either choose 'All', or choose the specific MIDI port you wish it to be sent via, either setting will work.

How do I make my MPC MIDI IN port appear here?!

As mentioned previously in chapter 1, Logic will reference all MIDI ports in relation to your audio/MIDI interface, so by default, you'll most likely see something like 'Edirol FA66 Plug 1' – i.e. 'Send MIDI Clock out of Edirol MIDI Port 1'. That's fine, and it will work perfectly well.

However, if you wish to see everything in terms of MPC MIDI Ports, you can first set up your MPC as an official MIDI device using the built in Mac OSX app 'MIDI Studio Setup'. In this software, you 'add' your MPC as a device and then graphically configure all MIDI connections. The end result is that Logic will actually reference any MIDI connections from the perspective of your MPC, as in the screen shot above – 'MPC2500 1', which effectively means 'send MIDI Clock to MPC2500 MIDI IN port 1'.

You can learn how to do this in the bonus chapter at the end of the book, but just be aware that this is purely optional.

Finally, at the foot of this page, make sure that **'Transmit MMC'** is checked. MMC stands for **'MIDI Machine Control'** – this sends 'transport' signals between the two synced machines, such as 'PLAY', 'STOP' and 'GO TO BEGINNING' etc. While this is not 'essential' to syncing your two devices together, it's a nice extra feature that can come in handy, as most MPCs have the ability to receive (and transmit) MMC messages.

That is the only system settings required for MIDI Clock to function with Logic as 'master'. Now, over to the MPC...

MPC5000

To access the sync page, go to MODE & pad 8 > F2 (SYNC), and set up everything as per the screen shot below:



MPC1000/2500 (including the free JJOS 3.13)

To access the sync page, go to MODE & pad 9 > F2 (SYNC), and set up everything as per the screen shot below:

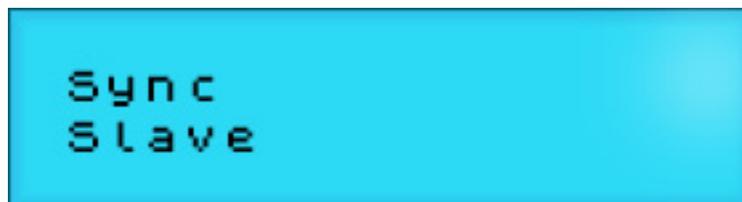


If you have JJOS 2/XL, then set up as follows:



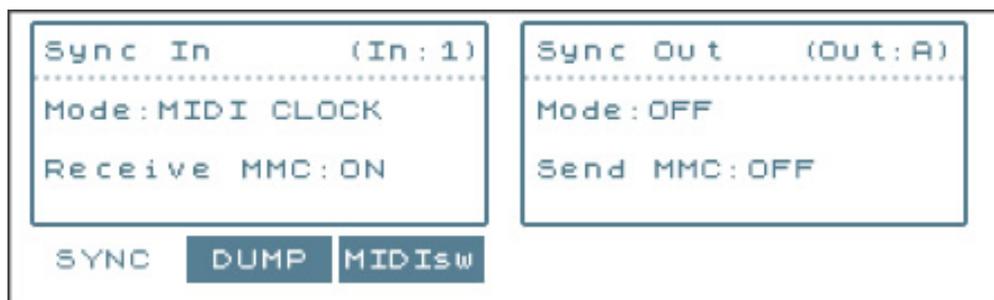
MPC500

Access the MIDI/SYNC page via MODE and pad 7. Jog wheel to the 'Sync' option and set to 'Slave':



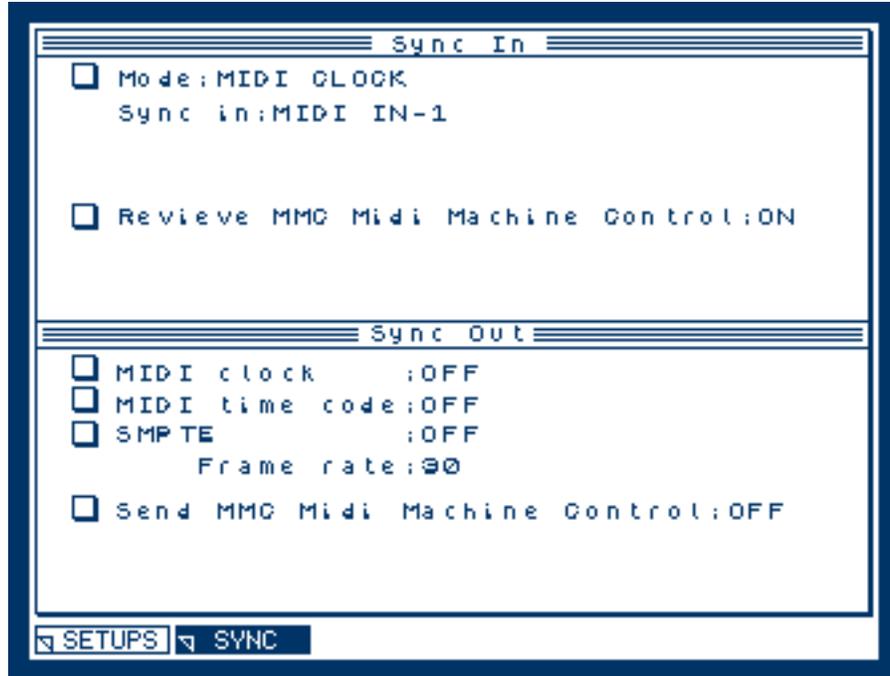
MPC2000/XL

Access the MIDI/SYNC page via SHIFT and 9. Set everything as below:



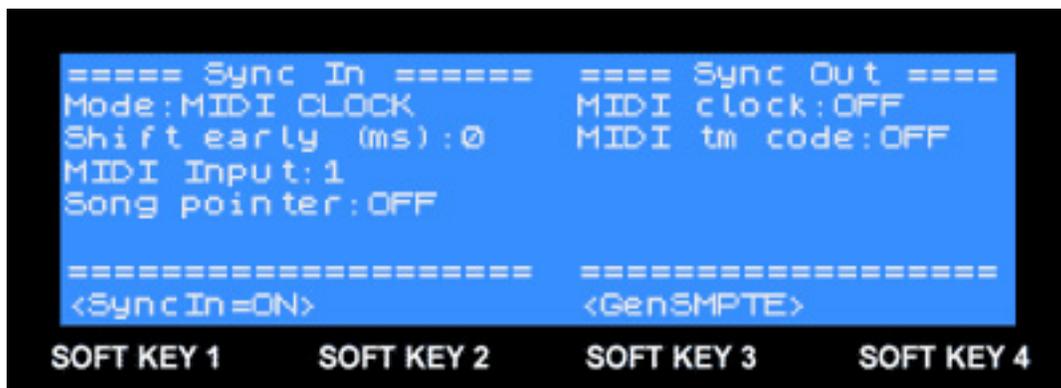
MPC4000

Access the SYNC page via [MISC.] > F2. (SYNC) Set the 'Sync in' section as seen as below:



MPC3000/60

To access the sync page, press the TEMPO/ SYNC key, followed by the <SyncScreen> soft key. Set up everything as below:



Now return to the MAIN sequence screen (this is important as with some MPCs, your sequence will not play back if you remain on the MIDI SYNC page).

That's it, all done. In Logic, hit the PLAY button and your MPC sequence '1' should begin playback. Press STOP (or space bar) in Logic, and your MPC

should stop. Press Logic's forward and rewind buttons and you'll see both Logic and the MPC sequencer forward/rewind by a bar at a time in unison.

Your MPC will also 'adopt' the tempo of the Logic project as Logic is the MIDI Clock master, so even if the MPC sequence had a tempo of 150 BPM, it will always play back at the 86 BPM of your Logic project. In many MPCs, this will be shown in your MPC sequence, where the tempo parameter will change to read 'EXT'.

If your MPC is not playing back when you hit 'PLAY' in Logic, go back through all the above steps and ensure everything has been set correctly. Also, check your MIDI cables and ensure they are plugged all the way into the MIDI ports.

If you get a CPU overload error in Logic, try enabling the 'Low Latency' mode option, to the right of the transport controls:



If you continue to have problems, quit and restart Logic, as this can sometimes solve random MIDI problems.

In chapter 4, we'll look at using MIDI Clock to record MPC MIDI and audio data into Logic, as well as how to handle the common problems that may occur. Next in this chapter we'll look at syncing using MIDI Time Code (MTC).

That's the end of this free preview of the '**Using Logic Pro With the Akai MPC**' – you can purchase the full book at MPC-Tutor.com:

<http://www.mpc-tutor.com/product/using-logic-pro-with-the-akai-mpc/>