

CONTROLLER EDITOR



MANUAL



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Table of Contents

1	Welcome	6
1.1	Document Conventions	7
2	Installation	8
2.1	Installing the Ableton Live Template on OS X	8
2.2	Installing the Ableton Live Template on Windows	8
2.3	Setup in Controller Editor	9
2.4	Setup in Ableton Live	10
3	MASCHINE including MIKRO and STUDIO	12
3.1	Layout and Basic Controls	12
3.1.1	Basic Layout MASCHINE MK2	12
3.1.2	Basic Layout MASCHINE	15
3.1.3	Basic Layout MASCHINE MIKRO MK2	18
3.1.4	Basic Layout MASCHINE STUDIO	20
3.1.5	Transport Section with MASCHINE	23
3.1.6	Navigation	25
3.2	Global Controls and Navigation	30
3.2.1	Controls and Navigation with MASCHINE STUDIO	30
3.2.2	Controls and Navigation with MASCHINE MK2	39
3.2.3	Controls and Navigation with MASCHINE MIKRO MK1 & MIKRO MK2	45
3.2.4	Controls and Navigation with MASCHINE	49
3.2.5	Edit Section	52
3.3	Controller Modes	55
3.3.1	Clip Mode	55
3.3.2	Scene Mode	63
3.3.3	Pad Mode	65

3.3.4	Note Repeat	73
3.3.5	Track Controls	77
3.3.6	Control Mode (MIKRO MK1 and MIKRO MK2 only)	81
3.4	Controller Pages	89
3.4.1	MASCHINE STUDIO Pages	90
3.4.2	MASCHINE MK2 Pages	95
3.4.3	MASCHINE MK1 Pages	99
3.4.4	MASCHINE MIKRO and MIKRO MK2 Pages	104
4	MASCHINE JAM	107
4.1	Transport and Global Functions	107
4.2	Matrix and Note Input	109
4.3	Smart Strip and Mixing	112

1 Welcome

Welcome to the Ableton Live Template Manual. This document describes how to install, setup and use the Ableton Live Template and use a MASCHINE hardware controller to operate Ableton Live. This template provides very detailed control over Ableton Live and doubles the functionality of your MASCHINE hardware. Please carefully read the entire document and follow the instructions step by step.

Included in this release are not only the remote script and template for MASCHINE STUDIO but also new advanced templates and remote scripts for MASCHINE, MASCHINE MIKRO, MASCHINE MK2 and MASCHINE MIKRO MK2. Users of the previous template should note that there have been a few changes and that some button assignments were changed to incorporate various new functions like Note Repeat, Editing etc.

There are some notable changes for users of the previous version:

- **NOTE REPEAT** button now performs actual note repeat. The Stop All clips function has been assigned to a different button depending on your version of MASCHINE.
- **CONTROL Mode** is not available for MASCHINE MK2 anymore.
- Deactivating and activating devices in Control mode is done by pressing the **Shift (ENTER)** button and the device assignment button (Pad 8).
- Pad Mode has been expanded to work with Drum Racks.
- Use Pad Mode to delete certain note values of a midi clip.
- Edit functions like deleting, duplicating or creating of tracks, scenes or clips has been added.
- Live 9's new clip automation has been incorporated. You can also use the MASCHINE controller knobs with the clear button to delete automation.
- Some functions on MASCHINE MIKRO like arm, stop track, cross fader assignment, and control mode do not have dedicated buttons anymore but are activated by using the **Shift (ENTER)** button and other mode buttons.
- You can edit the loop and start/end point of clips (not available for MIKRO).
- Launch a scene in Clip Mode using the **Shift** button

It is necessary that you familiarize yourself with the new assignments and functions by studying this manual carefully.

On behalf of the entire NATIVE INSTRUMENTS team, we hope you find this template useful.

1.1 Document Conventions

This document uses particular formatting to point out special facts and to warn you of potential issues. The icons introducing the following notes let you see what kind of information can be expected:



The speech bubble icon indicates a useful tip that may often help you to solve a task more efficiently.



The exclamation mark icon highlights important information that is essential for the given context.



The red cross icon warns you of serious issues and potential risks that require your full attention.

Furthermore, the following formatting is used:

- Text appearing in (drop-down) menus (such as *Open...*, *Save as...* etc.) in the software and paths to locations on your hard disk or other storage devices is printed in *italics*.
 - Text appearing elsewhere (labels of buttons, controls, text next to checkboxes etc.) in the software is printed in **blue**. Whenever you see this formatting applied, you will find the same text appearing somewhere on the screen.
 - Important names and concepts are printed in **bold**.
 - References to keys on your computer's keyboard you'll find put in square brackets (e.g., "Press [Shift] + [Enter]").
- Single instructions are introduced by this play button type arrow.
- Results of actions are introduced by this smaller arrow.

2 Installation

The required files for installing the Ableton Live Template for your MASCHINE controller are part of the Controller Editor installation.



Ensure that you have installed the latest version of Controller Editor before proceeding with the installation. You can download the latest version with Native Access on your computer.

2.1 Installing the Ableton Live Template on OS X

1. Ensure that Ableton Live is not running.
 2. Navigate to the following folder: *Macintosh HD/Applications/ Native Instruments/Controller Editor/Template Support Files/Ableton Live 9*
 3. Locate the Template folder named according to your MASCHINE controller (for MASCHINE MIKRO Mk1, use the *Maschine* folder).
 4. Copy this folder to your clipboard by right-clicking on it and choosing *Copy*.
 5. Open your Applications folder and right-click the *Live* application symbol. In the context menu, click on *Show Package Contents*.
 6. In the Ableton Live package, navigate to *Contents/App-Resources/MIDI Remote Scripts*.
 7. Delete any previously installed MASCHINE folders from *MIDI Remote Scripts*.
 8. Paste the folder you have copied to your clipboard into the *MIDI Remote Scripts* folder.
- You have now installed the required files for the Ableton Live Template.

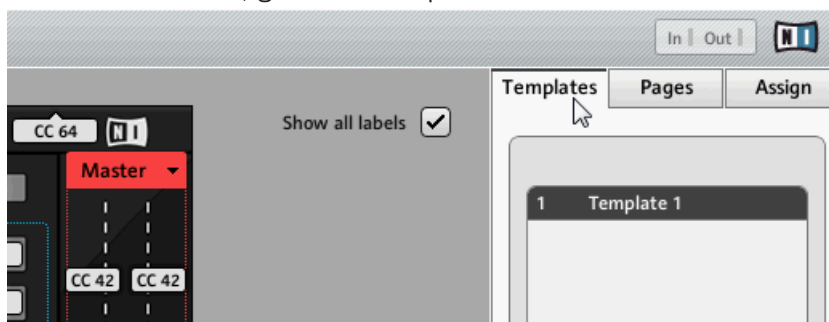
2.2 Installing the Ableton Live Template on Windows

1. Ensure that Ableton Live is not running.

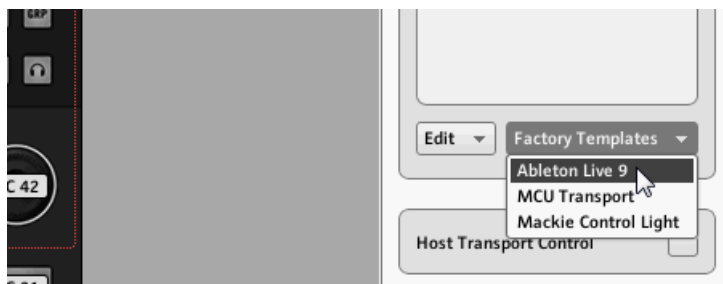
2. Navigate to the following folder: *C:\Program Files\Native Instruments\Controller Editor\Template Support Files\Ableton Live 9*
 3. Locate the Template folder named according to your MASCHINE controller (for MASCHINE MIKRO Mk1, use the *Maschine* folder).
 4. Copy this folder to your clipboard by right-clicking on it and choosing *Copy*.
 5. Go to Ableton Live's installation directory. By default, it is located here: *C:\Program Data\Ableton\Live 9*. The *Program Data* folder may be hidden. You can enable the option to [Show hidden files, folder and drives](#) in the under [Options](#) in the [View](#) settings of the Windows Explorer.
 6. In the Ableton Live installation directory, navigate to *..\Resources\MIDI Remote Scripts*.
 7. Delete any previously installed MASCHINE folders from *MIDI Remote Scripts*.
 8. Paste the folder you have copied to your clipboard into the *MIDI Remote Scripts* folder.
- You have now installed the required files for the Ableton Live Template.

2.3 Setup in Controller Editor

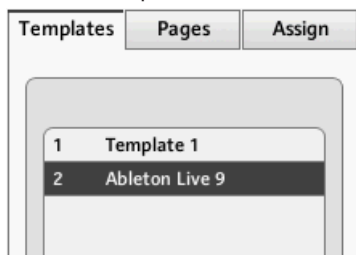
1. Connect the MASCHINE controller to your computer.
2. Start Controller Editor. It automatically recognizes your controller.
3. In Controller Editor, go to the Templates tab.



- Click on the [Factory Templates](#) drop-down menu in the Templates tab and select *Ableton Live 9*.



- The Ableton Live 9 Template is added to the Templates list and selected as the currently active Template. You can close Controller Editor.



2.4 Setup in Ableton Live



If Ableton Live was running during the installation process, you need to restart the application for the new settings to become available.

- Start Ableton Live.
- Open Ableton Live's [Preferences](#) and go to the [MIDI / Sync](#) tab.
- Assign a free [Control Surface](#) slot to your MASCHINE controller by selecting it from the drop-down list.

4. If you are on OS X, select the *Virtual Input* entry corresponding to your MASCHINE controller as the **Input**. If you are on Windows, select here the *In* entry corresponding to your controller.
 5. If you are on OS X, select the *Virtual Output* entry corresponding to your MASCHINE controller as the **Output**. If you are on Windows, select the *Out* entry corresponding to your controller.
- The Ableton Live Template is now set up and ready to use.

3 MASCHINE including MIKRO and STUDIO

3.1 Layout and Basic Controls

The Ableton Live Template has three basic controller modes. The controller is always in one of these modes and you can switch between them.

- **Clip mode** (**PATTERN** button) – for launching clips in Ableton Live's Session View, see [↑3.3.1, Clip Mode](#).
- **Scene mode** (**SCENE** button) – for launching scenes in Ableton Live's Session View, see [↑3.3.2, Scene Mode](#).
- **Pad mode** (**PAD MODE** button) – for playing notes with MASCHINE's pads, see [↑3.3.3, Pad Mode](#).

MASCHINE MIKRO has an additional Control Mode with which the pads are used to assign Control encoder to volumes, pans, sends or device parameters in Ableton Live's GUI, see [↑3.3.6, Control Mode \(MIKRO MK1 and MIKRO MK2 only\)](#).

Some Buttons have an extra function when selected while a **Shift** button is held down. The **Shift** button is different for each controller. For every layout version the **Shift** button has been highlighted with a blue box.

3.1.1 Basic Layout MASCHINE MK2

The Ableton Live Template assigns the controls of MASCHINE MK2 to the following tasks:



Overview of MASCHINE MK2 controller

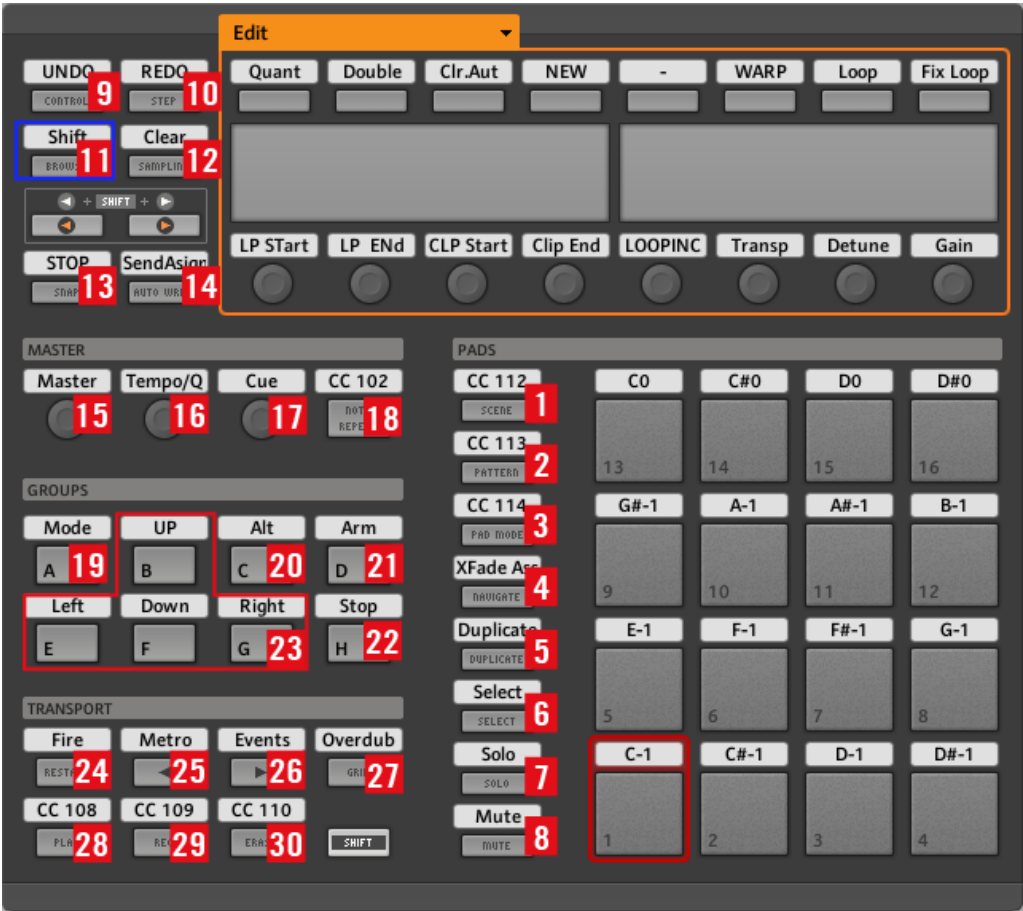
No	Button	Function
1	SCENE	Switches to Scene mode
2	PATTERN	Switches to Clip/Session mode . When used with the Shift button (ENTER button), it activates Color Editing (see ↑3.3.1, Clip Mode).

No	Button	Function
3	PAD	switches to Note/Drum mode
4	NAVIGATE	Enables Selection via the pads, basically this only works in Clip mode. + Shift : changes Ableton Live's focus, stepping through the Session View, Detail/Clip View, Detail/Device Chain View, the browser and then to the Arranger View.
5	DUPLICATE	Used to duplicate, for more details see ↑3.2.5, Edit Section
6	SELECT	Select Tracks
7	SOLO	Solo Tracks
8	MUTE	Mute Tracks
9	CONTROL	UNDO , is lit up if there is something in the undo history
10	STEP	REDO , is lit up if there is something in the redo history
11	BROWSE	NEW function (see ↑3.2.5, Edit Section)
12	SAMPLING	CLEAR/DELETE (see ↑3.2.5, Edit Section)
13	ALL	Stop all Clips (quantized); + Shift : Stop all clips immediately
14	AUTO WR.	Assign Sends; + Shift : Update display
15	VOLUME	Assigns Control encoder to master volume/cue volume
16	SWING	Assigns Control encoder to adjust record quantize/clip quantize
17	TEMPO	Assigns Control encoder to adjust tempo
18	Control encoder:	Control encoder (assignable to various parameters depending on controller mode)
19	Page buttons:	(18) Page buttons ("◀" and "▶"): Left/Right buttons (function depends on current Mode)
20	NOTE REPEAT	Note Repeat
21	ENTER	Shift button

No	Button	Function
22	GROUP A	Navigation Mode assign, assigns control encoder to certain navigation functions; + Shift switches navigation for the clip view navigation [buttons (26)] between single step and 4 steps
23	GROUP C	Track Crossfade Assign
24	GROUP D	Track Arm
25	GROUP H	Track Stop
26	GROUP B, E, F and G buttons	Clip View Navigation
27	RESTART	Fire; + Shift : tap tempo
28	Step Backward button:	Metronome
29	Step Forward button:	Session automation
30	GRID	Session Overdub
31	PLAY	Play
32	REC	Record
33	ERASE	Stop

3.1.2 Basic Layout MASCHINE

The Ableton Live Template assigns the controls of MASCHINE to the following tasks:



Overview of MASCHINE MK1 controller

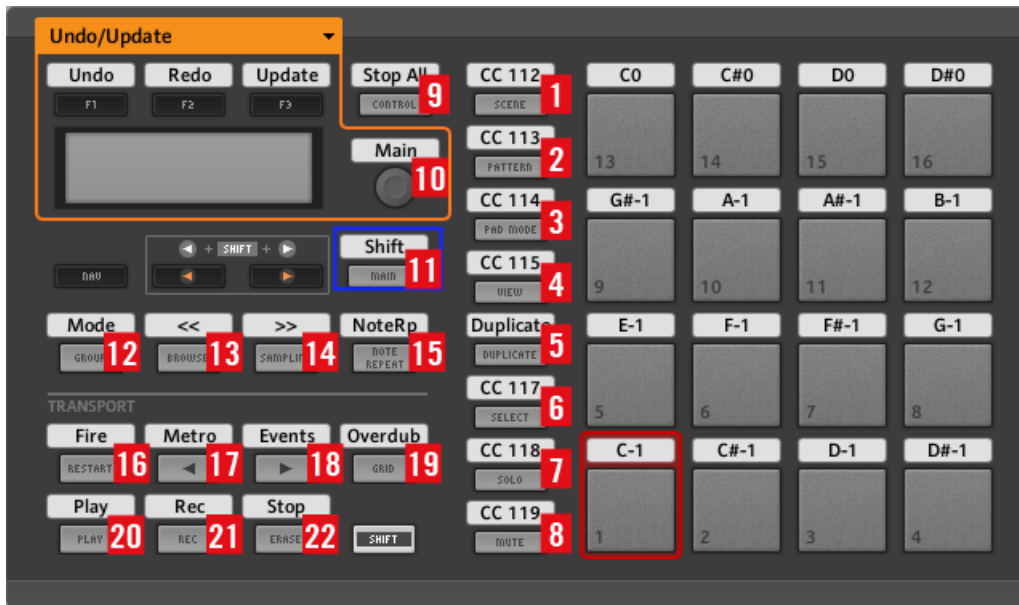
Num-ber	Button	Function
1	SCENE	switches to Scene mode
2	PATTERN	Switches to Clip/Session mode . When used with the Shift button (BROWSE button), it activates Color Editing (see ↑3.3.1, Clip Mode).

Number	Button	Function
3	PAD	switches to Note/Drum mode
4	NAVIGATE	Track crossfader assign
5	DUPLICATE	Used to Duplicate, for more details see ↑3.2.5, Edit Section .
6	SELECT	Select Tracks
7	SOLO	Solo Tracks
8	MUTE	Mute Tracks
9	CONTROL	UNDO ; is lit up if there is something in the undo history
10	STEP	REDO ; is lit up if there is something in the redo history
11	BROWSE	Shift modifier button
12	SAMPLING	Clear (function depends on Mode)
13	SNAP	Stop all Clips (quantized); + Shift : Stop all clips immediately
14	AUTO WRITE	Assign Sends ; + Shift : Update display
15	VOLUME encoder	adjust master/cue volume; in Nav Mode ((11) active): select tracks/scenes/devices
16	TEMPO encoder	adjust song tempo; in Nav Mode ((11) active): Mode dependent navigation
17	SWING encoder	adjust record quantization/clip quantization; in Nav Mode ((11) active): Mode dependent navigation
18	NOTE REPEAT	Note Repeat
19	GROUP A	activates navigation with encoders (15),(16),(16); + Shift : toggle between view navigation in steps of 4 and steps of 1; + ALT (20): switch focus in Live
20	GROUP C	Alt modifier button

Number	Button	Function
21	GROUP D	Track Arm
22	GROUP H	Track Stop
23	GROUP B, E, F and G buttons	Clip View Navigation
24	RESTART	Fire; +Shift: tap tempo
25	Step Backward button	Metronome
26	Step Forward button	Session automation
27	GRID	Session Overdub
28	PLAY	Play
29	REC	Record
30	ERASE	Stop

3.1.3 Basic Layout MASCHINE MIKRO MK2

The Ableton Live Template assigns the controls of the MASCHINE MIKRO MK2 to the following tasks:



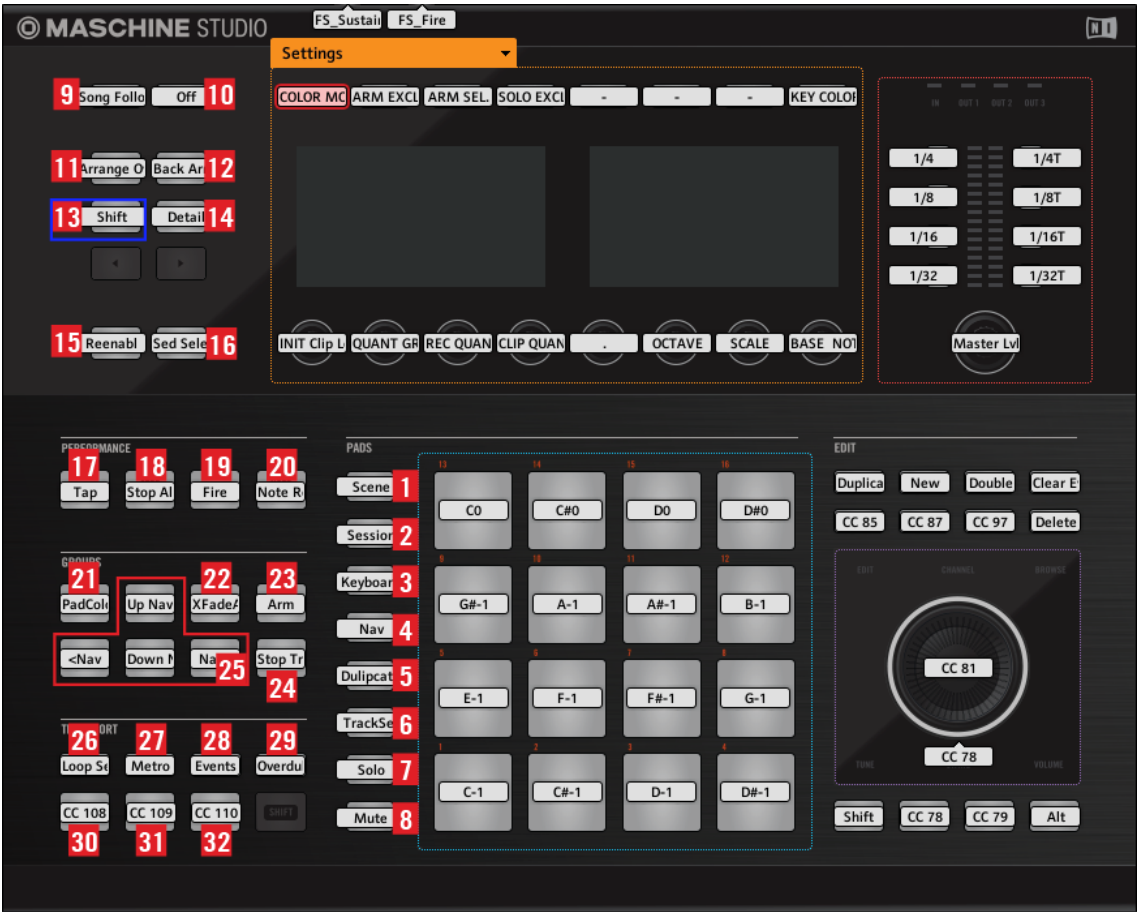
Overview of MASCHINE MIKRO MK2 controller

Call-out	Button	Function
1	SCENE	Switches to Scene mode ; with Shift button (MAIN button) switches to Control mode .
2	PATTERN	Switches to Clip/Session mode ; with Shift button (MAIN button) activates Color Editing see ↑3.3.1, Clip Mode .
3	PAD	Switches to Note/Drum mode .
4	VIEW	Enables Selection via the pads, basically this only works in Clip mode + Shift : changes Ableton Live's focus, stepping through the Session View, Detail/Clip View, Detail/Device Chain View, the browser and then to the Arranger View.
5	DUPLICATE	Used to Duplicate for more details see ↑3.2.5, Edit Section .
6	SELECT	Select Tracks ; with Shift button Crossfade Assign .

Call-out	Button	Function
7	SOLO	Solo Tracks ; with Shift button Track Stop .
8	MUTE	Mute Tracks ; with Shift button Track Arm .
9	CONTROL	Stop all Clips (quantized); + Shift : Stop all clips immediately.
10	Control encoder:	Control encoder (assignable to various parameters depending on controller mode).
11	MAIN	General Shift button.
12	GROUP	Rotary Assignment .
13	BROWSE	Navigate left depending on current mode.
14	SAMPLING	Navigate right depending on current mode.
15	NOTE REPEAT	Note Repeat . Works only with Note/Drum Mode.
16	RESTART	Fire ; + Shift : tap tempo.
17	Step Backward button:	Metronome
18	Step Forward button:	Session automation
19	GRID	Session Overdub
20	PLAY:	Play
21	REC:	Record
22	ERASE:	Stop





3.1.4 Basic Layout MASCHINE STUDIO

The Ableton Live Template assigns the controls of MASCHINE STUDIO to the following tasks:



Overview of MASCHINE STUDIO controller

Call-out	Button	Function
1	SCENE	Switches to Scene mode .
2	PATTERN	Switches to Clip/Session mode . When used with the Shift button (BROWSE button), it activates Color Editing (see ↑3.3.1, Clip Mode).

Call-out	Button	Function
3	PAD	Switches to Note/Drum mode
4	NAVIGATE	Enables Selection via the pads, basically this only works in Clip mode + Shift : changes Ableton Live's focus, stepping through the Session View, Detail/Clip View, Detail/Device Chain View, the browser and then to the Arranger View.
5	DUPLICATE button:	Used to Duplicate, for more details see ↑3.2.5, Edit Section .
6	SELECT	Select Tracks
7	SOLO	Solo Tracks
8	MUTE	Mute Tracks
9	CHANNEL	Song Follow 
10	PLUGIN	<i>inactive</i>
11	ARRANGE	Arrangement overdub ( button) in Live.
12	MIX	Back to arrangement. 
13	BROWSE	Shift button.
14	SAMPLING	Switch in Live between Detail/Clip and Detail/Device view. + Shift switch between Session and Arrangement view in Live.
15	ALL	Re-Enable Automation function. 
16	AUTO	Assign sends
17	TAP	Tap song temp
18	STEP MODE	Stop all Clips (quantized); + Shift : Stop all clips immediately
19	MACRO	Fire currently selected slot
20	NOTE REPEAT	Note Repeat
21	GROUP A	Switch between navigation in the session in steps of four or one.

Call-out	Button	Function
22	GROUP C	Track Crossfade Assign
23	GROUP D	Track Arm
24	GROUP H	Track Stop
25	GROUP B, E, F and G	Clip View Navigation
26	RESTART	Adjust arrangement loop with jog wheel.
27	METRO	Metronome
28	EVENTS	Session automation
29	GRID	Session Overdub
30	PLAY	Play

3.1.5 Transport Section with MASCHINE

All MASCHINE Models have a Transport section MASCHINE, MASCHINE MK2, MASCHINE MIKRO AND MIKRO MK2 all have the same assignment:

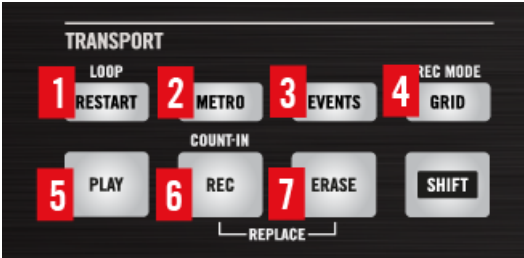


Transport section on MASCHINE controller

Call-out	Button	Function
1	RESTART	Fire; + Shift: tap tempo.
2	Step Backward button:	Metronome

Call-out	Button	Function
3	Step Forward button:	Session automation
4	GRID	Session Overdub
5	PLAY	Play
6	REC	Record
7	ERASE	Stop

MASCHINE STUDIO



Transport section on MASCHINE STUDIO controller

Call-out	Button	Function
1	RESTART	Fire; + Shift: tap tempo.
2	METRO	Metronome
3	EVENTS	Session automation
4	GRID	Session Overdub
5	PLAY	Play
6	REC	Record
7	ERASE	Stop

All buttons in the **TRANSPORT** section control their assigned functions in Live regardless of which mode the controller is in. The only exception is the **RESTART** button in MASCHINE STUDIO Transport section. It is used in conjunction with MASCHINE Studios' jog wheel.

Hold down the **RESTART** button in MASCHINE STUDIO and turn the jog wheel, this will move the Arrangement loop start point. With the **Shift** button held down can modify the loop length. If you press the jog wheel and turn it, the loop start/loop length will be modified in steps of one beat otherwise one bar.

3.1.6 Navigation

In order to be able to move around among your tracks in Live, to select and play your clips, the Ableton Live Template makes use of Navigation buttons. This come in the form of the **GROUPS** section on the MASCHINE, MASCHINE MK2 and MASCHINE STUDIO controllers.



GROUPS section on MASCHINE STUDIO controller

On both MASCHINE controller generations, the **GROUPS** buttons **B**, **E**, **F** and **G** are dedicated to navigating within Ableton Live's Session View. The buttons of the **GROUPS** section retain the same functionality, no matter which mode is active.

- ▶ Press **B** and **F** to move the colored four x four focus rectangle up and down within the Session View. The buttons **E** and **G** navigate left and right respectively.

By default the view is moved in steps of one cell. This can be modified in the following manner:

- For MASCHINE STUDIO the Group **A** button is assigned to turning the four step horizontal navigation on or off. The Group **B**, **E**, **F** and **G** buttons will turn purple indicating that track navigation is now possible in steps of four. Group **A** button will be lit up.
- For MASCHINE MK2 press **Shift** (**ENTER**) and the Group **A** button. The Group **B**, **E**, **F** and **G** buttons will turn purple indicating that track navigation is now possible in steps of four. To go back to one step just press the same combination again and the buttons will turn blue again and navigation is done in steps of one.
- For MASCHINE MK1 press **Shift** (**BROWSE**) and the Group **A** button switch between horizontal navigation in steps of one or four. The new mode is shown in Ableton Live's status bar.



Ableton Live status bar reads View Navigation in steps of 4



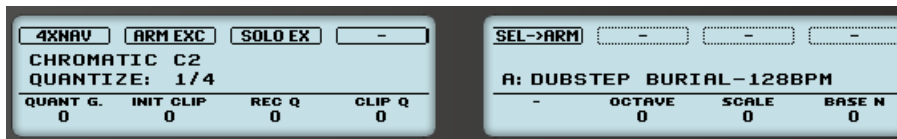
By pressing and holding any of the Navigation buttons, you can move the focus rectangle in one direction until the button is released.

Settings Page

- MASCHINE MK2 controller Settings Page



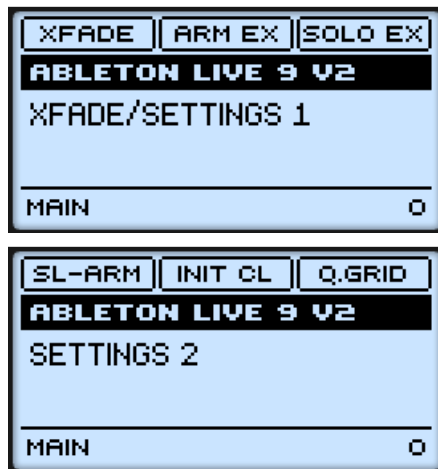
- MASCHINE controller Settings Page



- MASCHINE STUDIO controller Settings Page



- On MASCHINE MIKRO these values are on **Page 9: XFade/Settings 1** and **Page 10: Settings 2**:



On the Setting Page you can define certain basic behavior. These settings are recalled the next time you load a new song or open Live again.

Mode	Description
Color Mode	Switches between Standard Clip Color Mode (inactive) and Clip Color Mode (active) (see ↑3.3.3, Pad Mode)
Arm Exclusive	<p>This refers to the track arming behavior (for more details see ↑3.3.5, Track Controls)</p> <p>If lit up, arming tracks with the pads in track arm mode will unarm previously armed tracks. Otherwise, the previously armed tracks will remain armed. This only refers to the behavior of arming tracks with the controller and not in the software.</p>
Arm Select	This refers to general selection behavior of MASCHINE when selecting tracks via the control encoder, jog wheel or the NAVIGATE/VIEW button. If this is highlighted, then selecting tracks will also automatically arm the selected track exclusively.
Solo Exclusive	<p>This refers to the track soloing behavior (for more details see ↑3.3.5, Track Controls)</p> <p>If lit up, soloing tracks with the pads in tracks solo mode will un solo tracks. Otherwise soloed tracks will remain solo.</p>
KEY COLOR	(Not MASCHINE) Refers to the coloring of notes in Pad Mode. If lit up the notes are colored in Interval Color mode, otherwise in Individual Color mode. Individual Color mode is the default. (For more details see 5.3 Pad Mode)



It is important to note, that the Arm / Solo Exclusive settings are local to the MASCHINE controller and not to be confused with the Arm / Solo Exclusive setting, which can be set in Ableton Live's *Preference Dialog > Record Warp Launch* tab.

The knobs on the Settings page are responsible for setting certain values as follows:

Mode	Description
QUANT GRID	This refers to the edit function Quantize/Quantize 50%. The quantization value applied when quantizing a clip can be set here. The new value is displayed in Ableton Live's status bar. MACHINE MK2 and MASCHINE STUDIO also display the value on the left display. The default value is 1/16 th .
INIT CLIP LENGTH	This refers to the Edit function NEW clip. When creating a new MIDI clip with the NEW the initial size of the new empty MIDI clip is determined by the value you can set with this knob. The initial value is 4 beat. The smallest value you can set is 1 beat and the largest value is 64 beats = 16 bars. The new value is shown in Live's status bar. MACHINE MK2 and MASCHINE STUDIO show the new value on MASCHINE's page display.
REC QUANTIZE	Set the current recording quantization. This can also be set via the control encoder or jog wheel. This value is not stored with Remote Script but is linked with the current song.
CLIP QUANTIZE	Set the current recording quantization. This can also be set via the control encoder or jog wheel. This value is not stored with Remote Script but is linked with the current song.
OCTAVE	Refers to note mode and sets the current octave (see ↑3.3.3, Pad Mode).
SCALE	Refers to note mode and sets the current scale (see ↑3.3.3, Pad Mode).
BASE NOTE	Refers to note mode and sets the base note (see ↑3.3.3, Pad Mode).

To set the initial Clip length and Quantization value to be applied when using Edit **QUANTIZE** button on MACHINE MIKRO, go to Page *11: Settings 2* and hold down the corresponding buttons and turn the control encoder. The value will be changed and the new value will be displayed in Ableton Live's status bar.



Ableton Live's status bar reading MASCHINE MIKRO MK2 Quantize set to 1/16T



Ableton Live's status bar reading MASCHINE MIKRO MK2 Initial Clip Length: 4 Beats

The default value for initial clip length with the NEW function is 4 beats and the initial quantize value is 1/16 note. The initial clip length will be set in steps of 4 beats = 1 bar. If you press the encoder while turning, the length will be set in steps of 1 beat.

3.2 Global Controls and Navigation

3.2.1 Controls and Navigation with MASCHINE STUDIO

Except for MASCHINE MK1, all models of MASCHINE have a main control encoder. MASCHINE STUDIO has a jog wheel. These have different functions depending on the current Mode of the encoder.







When the encoder is assigned to a mixer parameter, turning the main encoder will modify the value in large steps. To modify the values in finer steps, press the encoder and turn it while holding it down.

Global Section



Global section of MASCHINE STUDIO controller

Call-out	Button	Function
1	CHANNEL	Activate Song follow. 
2	ARRANGE	Arrangement overdub ( button) in Live
3	MIX	Back to arrangement. 
4	BROWSE	Shift button.
5	SAMPLING	Switch in Live between the Detail/Clip and the Detail/Device view; + Shift : switch in Live between Session and Arrangement view.

Call-out	Button	Function
6	ALL	Re-Enable Automation function. 
7	AUTO	Assign Send Buttons; + Shift : synchronize the controllers display.

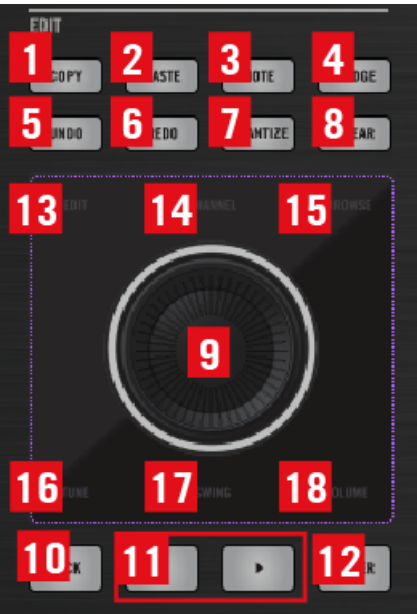
Performance Section



Performance section on MASCHINE STUDIO controller

Call-out	Button	Function
1	TAP	Tap Tempo.
2	STEP MODE	Stop all clips quantized; + Shift stops all clips immediately.
3	MACRO	Fire Button fires the highlighted clip slot.
4	NOTE REPEAT	Note Repeat (see ↑3.3.4, Note Repeat).

Edit and Jog Wheel Section



Edit and jog wheel section on MASCHINE STUDIO controller

With the buttons (1)-(8) in the edit section, you can perform basic editing in Live, like deleting clips, creating new midi clips, new tracks, new scenes etc. How the buttons work depends on the current mode you are in.

Basic functions of the edit buttons:

Call-out	Button	Function
1	COPY	Creates a duplicate.
2	PASTE	Corresponds to New.
3	NOTE	Doubles length of MIDI loop.
4	NUDGE	Clears Clip Envelops.
5	UNDO	Undo last action in Live: is lit up if there is something in the undo history.

Call-out	Button	Function
6	REDO	Redo last undo: is lit up if there is something in the redo history.
7	QUANTIZE	Quantize Clip.
8	CLEAR	Clear/Delete.

For more details see the description of the edit section for each mode

Mode	Description
Clip/Session mode	see ↑3.3.1, Clip Mode
Scene mode	see ↑3.3.2, Scene Mode
Note mode	see ↑3.3.3, Pad Mode
Track modes	see ↑3.3.5, Track Controls

The function of the jog wheel depends on the selected jog wheel mode (**13**) – (**18**). Use the ◀ and ▶ buttons (**11**) to change the jog wheel mode.

Using the Jog Wheel

Turning the wheel is assigned to a certain function determined by the current mode. If you press down the jog wheel and keep it down while turning it, an alternate function will be assigned. Holding the BACK or ENTER while will possibly give you other functions.

No	Page	Function
13	EDIT	<p>In this mode the function is determined by the current mode:</p> <p>Clip Mode Move the clip view focus up/down or left/right</p> <p>Scene Mode Access to Scene beyond the scenes 1-16</p> <p>Note Mode Set Octave, Scale, Base Note</p> <p>Drum Mode Change drum pad scroll position</p> <p>Track Assign Access to tracks beyond the tracks 1-16</p>
14	CHANNEL	The jog wheel is used to select tracks, scenes of devices in the selected track. If SEL->ARM (see 3.1.6, Navigation) is active a newly selected track will be armed..
15	BROWSE	The jog wheel is used to move the transport. Using the modifiers will move the transport in greater or lesser step with every click.
16	TUNE	Adjusts the Tempo of Live
17	SWING	Adjusts Record Quantization/Clip Quantization
18	VOLUME	Adjust the Master Volume or Cue Volume of Live

Jog wheel in **EDIT** Mode:

Mode	Modifier	Function
Clip Mode	None	Clip View Navigation left / right (tracks)
	Push	Clip View Navigation up / down (scenes)
Scene Mode		Scene Navigation (only if song contains more than 16 scenes)
Note Mode	None	Octave up/down
	Push	Next/Previous scale in scale list
	Shift	Next/Previous base note
Drum Rack Mode		Scroll in Drum Pad up/down
Track Modes		Track Navigation (only active if song contains more than 16 tracks)

All other jog wheel modes are independent from the current basic mode.

Wheel Mode	Modifier	Function
CHANNEL	None	Select Track (will automatically ARM the track if SEL->ARM is active).
		Select Scene.
	Push	
	Shift	Select Device.
BROWSE		Jump by +/- 1 Beat.
	Push	Jump by +/- 1/4Beat.
	Shift	Jump by +/- 4 Beats.
TUNE		Tempo Coarse.
	Push	Tempo Fine in steps of 0.01 BPM.
	Shift	Tempo Fine in steps of 0.1 BPM.
SWING		Recording Quantize.
	Push	Clip Start Quantize.
	Shift	Swing amount +/- 0.01. Affects MIDI recording and all direct quantize calls.
VOLUME		Master Volume (coarse).
	Push	Master Volume (fine).
	Shift	Cue Volume (coarse).
	Shift + Push	Cue Volume (fine).

In conjunction with certain buttons the current assignment of the jog wheel via the jog wheel mode is overwritten.

On MASCHINE STUDIO the **RESTART** button will overwrite this function as long as the **RESTART** button is being held down. While holding down the **RESTART** button you can adjust the position or length of the arrangement loop.

You can also overwrite the jog wheel when you enter Color Edit mode. As soon as you leave Color Edit, the wheel is assigned to its previous function. For more details on color editing, see [↑3.3.1, Clip Mode](#).

Footswitches

MASCHINE STUDIO also has 2 inputs for use with footswitches/sustain pedals.



Footswitch inputs of the MASCHINE STUDIO controller

Currently Footswitch 1 is assigned to MIDI CC 64, which is the standard sustain. Footswitch 2 is assigned to the **FIRE** function, which will trigger the currently selected slot.

You can also assign a footswitch to trigger other functions, like **PLAY** or **NOTE REPEAT**. To do this, assign the same MIDI CC settings of a button to the footswitch using the Controller Editor. For example to assign the **PLAY** button to the footswitch select the footswitch (1 or 2) in the controller editor and set the type to “Control Change”, the Channel to 1, the number to 108, the mode to “Gate”. The Off/On values should be set at 0/127.

3.2.2 Controls and Navigation with MASCHINE MK2

Global Controls



Global controls on MASCHINE MK2 controller

Call-out	Controller	Ableton Live	Function
1	CONTROL	Undo	Button is lit if there is something in the undo history.
2	STEP	Redo	Button is lit if there is something in the redo history.
3	BROWSE	New	New Button (see ↑3.2.5, Edit Section).
4	SAMPLING	Clear	Clear/Delete (function depends on Mode).
5	ALL	Stop	All clips (quantized); + Shift : Stop all clips immediately.
6	AUTO WR	Snd Asn	Assign Sends; + Shift : synchronizes the controllers display.

The **AUTO WR** button is used in conjunction with Page 4 Sends & Solo. By default the Sends are assigned to the Sends A of the respective tracks. By pressing the **AUTO WR** button you assign the send knobs to the next return track. If the knobs are assigned to the last return track, the knobs will be assigned to the first return track again (A).

Master Section



Master section on MASCHINE MK2 controller

Call-out	Button	Ableton Live	Function
1	VOLUME	Volume	Assigns the control encoder to master volume/cue volume.
2	SWING	Quant	Assigns the control encoder to selecting record quantization/clip launch quantization.
3	TEMPO	Tempo	Assigns the control encoder to adjusting Ableton Live's tempo.

Call-out	Button	Ableton Live	Function
4	Group A	Nav Mode	Assigns the control encoder to adjusting a navigation function depending on the color of the button. When holding down Shift you turn navigating horizontally in 4 steps on or off. The clip view navigation buttons (Group B/E/F/G) will be either blue (1 step) or purple (4 steps).
5	ENTER	Shift	Represents the remote scripts Shift button.
6	◀ and ▶		Page buttons are for navigation depending on the active general mode (see ↑3.3, Controller Modes).
7	NOTE REPEAT	Note Rpt	For more details see ↑3.3.4, Note Repeat .

Buttons (1)-(4) determine the function of the main control encoder.

Call-out	NAME/COLOR	Function
1	VOLUME	Control encoder modifies the master volume in large steps. Press and hold the main encoder while turning for finer adjustment. Turning the encoder while holding Shift (ENTER) button will adjust the current cue volume.
2	SWING	Selects the current Record Quantization. The new value is displayed in the Ableton Live status bar and MASCHINE MK2s text display. + PUSH : Selects Ableton Live's Clip quantization. The new value is displayed in the Ableton Live status bar and MASCHINE MK2 text display.

Call-out	NAME/COLOR	Function
3	TEMPO	Adjust Live’s tempo in 1 BPM steps: + PUSH : Adjust the Ableton Live tempo in 0.1 BPM steps. + Shift : Adjust the Ableton Live tempo in 0.01 BPM steps.
4	Group A (Green)	Navigation depending on General mode (see table below).

Call-out	NAME/COLOR	Function
4	Group A (Yellow)	<p>no modifier Select tracks left/right.</p> <p>+ Push Select Scene left/right.</p> <p>+ Shift Select Device in selected track.</p>
4	Group A (Pink)	<p>no modifier Move general transport back/forward by 1 bar.</p> <p>+ Push Move general transport back/forward by 1 beat.</p> <p>+ Shift Move general transport back/forward by 1/2 beat.</p> <p>+ Push + Shift Move general transport back/forward by 1/4 beat.</p>

Depending on the current general mode when the Group A button is lit green the following functions are assigned:

Mode	Modifier	Function
Clip Mode	None	Clip View Navigation left / right (tracks).
	Push	Clip View Navigation up / down (scenes).
Scene Mode		Move set of 16 scenes to be launched to the left or right. Let us say your song has 20 scenes. By default only the first 16 scenes will be represented by the 16 pad. By turning the control encoder by one click to the right the pads will be assigned to scene 2-17 etc.
Note Mode	None	Octave up/down.
	Push	Next/Previous scale in scale list.
	Shift	Next/Previous base note.
Drum Rack Mode		Scroll in Drum Pad up/down.
Track Modes		Track Navigation. By default only the first 16 tracks will be represented by the 16 pad. By turning the control encoder by one click to the right the pads will be assigned to tracks 2-17 etc.

The ◀ and ▶ buttons handle general navigation depending on the current mode:

Mode	Modifier	Function
Clip Mode	None	Clip View Navigation left / right (tracks).
	Shift	Clip View Navigation up / down (scenes).
Scene Mode		Move set of 16 scenes to be launched to the left or right. Let us say your song has 20 scenes. By default only the first 16 scenes will be represented by the 16 pad. By turning the control encoder by one click to the right the pads will be assigned to scene 2-17 etc.
Note Mode	None	Octave up/down.
	Shift	Next/Previous scale in scale list.
Drum Rack Mode		Scroll in Drum Pad up/down.
Track Modes		Track Navigation. By default only the first 16 tracks will be represented by the 16 pad. By turning the control encoder by one click to the right the pads will be assigned to tracks 2-17 etc.

3.2.3 Controls and Navigation with MASCHINE MIKRO MK1 & MIKRO MK2

With MASCHINE MIKRO the control encoder has even greater importance because the MASCHINE MIKRO doesn't have the additional eight knobs.

Here are the assignments for MASCHINE MIKRO:



Key	Controller	Ableton	Function
1	VOLUME	Undo	Assigns the control encoder to master volume/cue volume.
2	QUANTIZE	Redo	Assigns the control encoder to record quantization/clip launch quantization.
3	TEMPO	Update	Assigns the control encoder to Ableton Live's tempo.
4	GROUP	Mode	Assigns the control encoder to adjusting a navigation function depending on the color of the button.
5	CONTROL ENCODER	Main	The central control encoder.
6	BROWSE, SAMPLING	Navigation	◀ and ▶ buttons for navigation depending on currently active general mode (see ↑3.3, Controller Modes).
7	ENTER	Shift	Represents the remote scripts Shift button.

Key	Controller	Ableton	Function
8	COTROL	Stop All	Stop all Clips (quantized); + Shift: Stop all clips immediately.
9	NOTE REPEAT	NoteRp	For more details see ↑3.3.4, Note Repeat .

Button (1)-(3) are located on Page 1 of the template for MACHINE MIKRO.

The VOLUME, QUANTIZE, TEMPO and GROUP buttons work in the same way as for MASCHINE MK2, so for details see [↑3.2.2, Controls and Navigation with MASCHINE MK2](#).

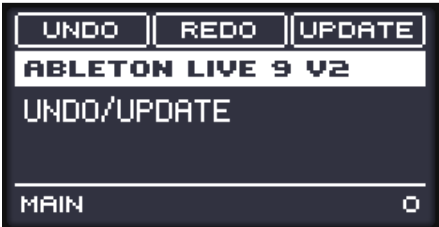
On Page 10: Xfade/Settings 1 Button F1 assigns the control encoder to Ableton Live's cross-fader.

Since MASCHINE MIKRO has no colored buttons, button (4) is lit if one of the navigation functions is active. By repeatedly pressing button (4) you step through the modes. The new state is displayed in Ableton Live's status bar.



Settings Page on the MASCHINE MIKRO MK2 controller

Undo, Redo and Display synchronization buttons are located on Page 2: Undo/Update of the MASCHINE MIKRO controller.



Undo/Update Page on the MASCHINE MIKRO MK2 controller

On the transport page (Page 6) you access the Ableton Live Reverse and Fast Forward function. The F3 button is assigned to changing Ableton Live's focus.



Transport Page on the MASCHINE MIKRO MK2 controller

Call-out	Controller	Ableton	Function
3	BROWSE	Shift	Represents the remote scripts Shift button
4	SAMPLING	Clear	Clear (function depends on Mode)
5	SNAP	STOP	Stop all clips (quantized); + Shift : Stop all clips immediately.
6	AUTO WRITE	SendAssign	Assign Sends
7	MASTER encoder	Master	Sets Master Volume; + Shift : Sets Cue Volume. If the Group A button is lit: track/scene selection.
8	TEMPO encoder	Tempo/Q	Sets Ableton Live's tempo in 1 BPM steps; + Shift : Sets Ableton Live's tempo in 0.10 BPM steps. If Group A button is lit: Mode dependent navigation
9	SWING encoder	Cue	Sets Ableton Live's record quantization; + Shift : Sets Ableton Live's clip quantization. If Group A button is lit: Mode dependent navigation.
10	NOTE REPEAT	Note Repeat	For more details see ↑3.3.4, Note Repeat .
11	Group A	Mode	Activates navigation with encoders (7),(8),(9).
12	Group C	Alt	Represents a second modifier ALT button used in conjunction with the encoders (7),(8),(9).

If the group A button is not lit, the MASTER, TEMPO and SWING encoder control:

Mode	Modifier	Function
MASTER encoder	None	Master Volume
	+ Shift	Cue Volume
TEMPO encoder	None	Tempo in 1 BPM steps
	+ Shift	Tempo in 0.1 BPM steps
SWING encoder	None	Record Quantization
	+ Shift	Clip Quantization

If the group A button is active, the MASTER encoder handles track, scene or device selection. Use the ALT button to modify the parameter for Master Volume and Cue Volume in smaller steps.

Mode	Modifier	Function
MASTER	None	Select tracks
	+ Shift	Select scenes
	+ ALT (Group C)	Select devices in selected track

The TEMPO and SWING button perform navigation actions depending on the current mode.

Mode	Modifier	Function
Clip Mode	TEMPO	Clip View Navigation left / right (tracks)
	SWING	Clip View Navigation up / down (scenes)
Scene Mode	both	Move set of 16 scenes to be launched to the left or right. The new range is also displayed in Ableton Live's status bar.
Note Mode	TEMPO	Octave up/down; +Shift base note up/down
	SWING	Next/Previous scale in scale list
Drum Rack Mode	both	Scroll in Drum Pad up/down.
Track Modes		Track Navigation. By default only the first 16 tracks will be represented by the 16 pad. By turning the control encoder by one click to the right the pads will be assigned to tracks 2-17 etc.

3.2.5 Edit Section

All MASCHINE models have an edit section. MASCHINE STUDIO is the only controller that has a dedicated edit section:



Edit Section on MASCHINE STUDIO controller

Since no copy or paste function is available via the Live Remote scripts the basic meaning of the buttons is assigned as follows.

MASCHINE STUDIO label	Basic function
COPY	DUPLICATE
PASTE	NEW
NOTE	DOUBLE LOOP (without modifiers)
NUDGE	Clear Complete Automation
CLEAR	Clear DELETE

On MASCHINE MK2 the Edit Page is located on Page 7:

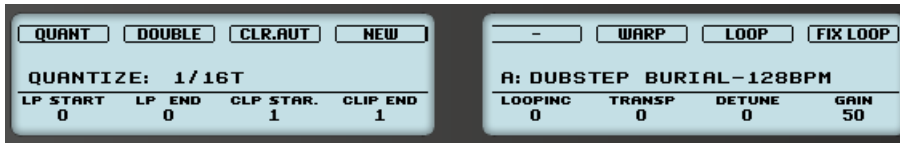


Edit Page on MASCHINE MK2 controller

The other edit functions of MASCHINE MK2 are assigned as follows:

Function	Button
New	BROWSE button
Delete	SAMPLING button
Duplicate	DUPLICATE button

On MASCHINE MK1 the Edit PAGE is located on Page 9:

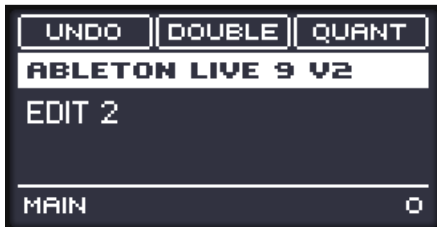


Edit Page on MASCHINE controller

The MASCHINE MIKRO models have 3 Edit Pages:



Edit Page 1 on MASCHINE MIKRO MK2 controller



Edit Page 2 on MASCHINE MIKRO MK2 controller



Edit Page 3 on MASCHINE MIKRO MK2 controller

For convenience the **F1** button is assigned to Undo/Redo (use **Shift** for Redo) on all three Edit Pages. The Duplicate function is assigned to the MASCHINE MIKRO **DUPLICATE** button.

The exact way the edit functions work depends on the current general mode you are in. These are described in detail in the following chapter.

Clearing Parameter automation using the CLEAR button

This function always relates to the highlighted clip. If the selected clip slot doesn't contain a and content, this function will have no effect.

To clear the parameter automation for a single parameter, simply hold down the CLEAR/DELETE button and turn the corresponding encoder. While holding the CLEAR button, turning the encoder will not change the assigned parameter but delete any automation that exists for the currently highlighted clip and the assigned parameter of the knob. This only works when the encoders are assigned either to device parameter or mixer parameters.



You can also clear mute automation in the same way, by holding down the CLEAR button and pressing the corresponding MUTE button. This works for the mute button on the knob pages (for instance Page 3 of MASCHINE STUDIO) for the Track Mute Mode.



Clearing parameter automation always refers to clip automation introduced into Live 9 and not to automation in the arrangement view.

3.3 Controller Modes

3.3.1 Clip Mode

In this mode your clips are triggered by the pads. In Ableton Live's Session View, a four by four rectangle is drawn around the clips the MASCHINE controller is focused on.

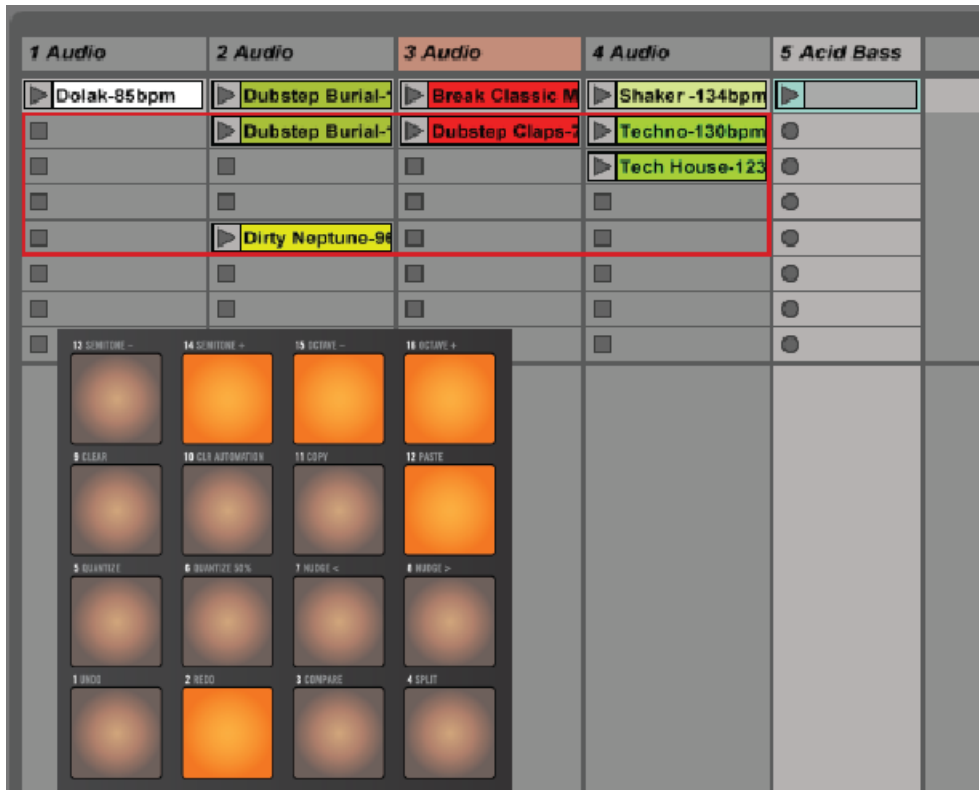


You can also launch scenes in this mode. Hold down the corresponding **Shift** button and press a pad. The complete scene that belongs to clip slot of the triggered pad will be launched.



Fold or un-fold group tracks by holding the **PATTERN** button and selecting a pad. If the pad belongs to a group track, the track will fold if previously un-folded or un-fold if previously folded.

You can use the Clip Navigation buttons (Group B/F; E/G) to move around in the Session View. Additionally in Clip mode, the Left/Right buttons allow you move the focus rectangle to the left or right. Alternatively you can use the jog wheel, or control encoder depending on the MASCHINE model you are using. For details on using the jog wheel or control encoder, please refer to the previous section.



Clips on the Pads of MASCHINE controller

The pads on MASCHINE MK1 and MASCHINE MIKRO MK1 have two colored states: dimmed or fully lit. Other states are displayed by letting the pads blink:

Pad State	Clip State
Pad dimmed (off)	No clip in slot
Pad bright (on)	Clip in slot, but not launched or triggered
Pad blinking	Clip launched
Pad blinking rapidly	Clip triggered but not launched



The colored focus rectangle is also shown if you disconnect the controller from your computer. The focus rectangle will be removed by deselecting the MASCHINE controller in the MIDI/Sync tab of Ableton Live's preference dialog. Set the selected controller to **None**.

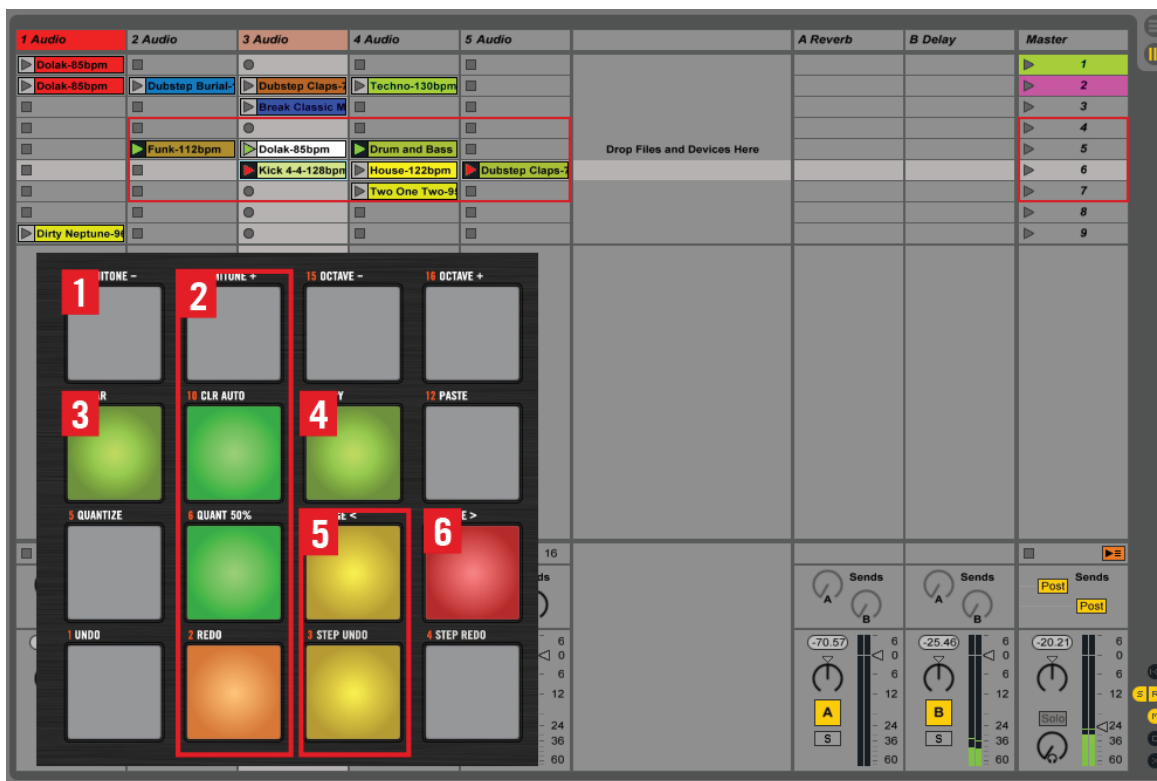
The MASCHINE MK2 and MASCHINE STUDIO controllers make full use of the colored pads. There are two Color Modes, Standard Color mode and Clip Color mode:

Standard Color Mode

In Standard Color Mode clips and their states are represented by fixed colors.

Pad State	Clip State
Pad off	No clip in slot
Yellow	Clip in slot but not active
Green	Clip launched
Red	Clip recording
Green & blinking	Clip triggered but not launched yet
Red & blinking	Clip triggered but not recording yet

Group tracks have a slightly different coloring. The slots that are not launched are orange, whereas the launched slots are represented by a slightly darker green.



Clips on the Pads of MASCHINE MK2 controller

Call-out	Pad	State
1	Pad 13	No Clip
2	Pad 2, 6, 10 and 14	Group Track
3	Pad 9	Launched Clip
4	Pad 11	Launched Clip
5	Pad 3 and 7	Clips in Slot
6	Pad 8	Clip Recording

Clip Color Mode

You can switch between Color Clip Mode and Standard Clip Color mode by pressing the following buttons:

Controller	Button
MASCHINE MIKRO MK2	Button F1 on Page 9 <i>Color Assign</i>
MASCHINE MK2	Button 1 on Page 8: Settings
MASCHINE STUDIO	Button 1 on Page 8: Settings

When the corresponding button is lit, Clip Color Mode is active otherwise Standard Clip Color Mode.

In Clip Color Mode, clips are represented by the same colors as defined in Live, as follows:

Pad State	Clip State
Pad off	No clip in slot
Dimmed Clip Color	Clip in slot but not active
Bright Clip Color	Clip launched
Switching between Red and Clip color	Clip recording
Blinking in Clip Color	Clip triggered but not launched yet
Switching rapidly between Red and Clip color	Clip triggered but not recording yet

The colors displayed on MASCHINE are approximates of the colors available in Live. Some colors will not be that easy to distinguish from one another. Very dark colors like black are displayed as dim grey, since black corresponds to an unlit pad and is therefore reserved to show an empty clip slot. Group Clip Slots will be displayed as in the regular mode (darker green or orange). This is due to certain technical limitations of Live.

This example shows a couple of clips and how the colors set in Live are represented on the controller:



Clip colors on the Pads of MASCHINE MK2 controller

Changing Clip Colors

You can modify the clip color of each clip via the controller. To do this hold the designated **Shift** button (**BACK** – STUDIO, **MAIN** – MIKRO MK2, **ENTER** – MK2) and the **PATTERN** button. When **PATTERN** Button starts to blink, pressing the pads will not launch the clips.

1. In Clip/Session mode hold **Shift** (**ENTER**-MK2, **MAIN**-MIKRO, **BROWSE**-STUDIO) + Clip mode button (**PATTERN**).
The **PATTERN** buttons begins to blink. Now you are in Color Edit mode.

2. Simply select a clip slot (can also be an empty one).
Instead of triggering the clip slot, you are presented with a color palette much in same way this is done with the F1 in Traktor.



3. Simply select a color from the palette and the clip is assigned the selected color and the display returns to the session view. If the slot did not contain a clip, nothing is changed.
 - If you hold the **Shift** button and select a color from the palette. All clips in the track of the selected clip slot will be assigned the selected color.
 - If you hold **Shift** while selecting a clip slot, selecting a color from the palette will color the track in Live. This made visible by the fact that the **PATTERN** button will blink rapidly while the color palette is being presented.
 - If you hold **Shift** while selecting a clip slot (**PATTERN** button is flashing rapidly) and then select a color from the palette while still (or again) holding the **Shift** button, the color of the scene containing the selected clip slot will be changed accordingly.

- Since you can remove the color from a track or a scene, you can do this in track/scene color edit mode (rapidly blinking **PATTERN** button) by pressing the main encoder. Hold **Shift** and the main encoder to remove the coloring from the scene.
- When presented with the palette and you decide not to choose a color, simply press the SESSION MODE button (**PATTERN**) again and you will jump back.

The script restricts the selection to sixteen distinguishable colors and does not offer the full selection of Ableton Live's sixty colors. These are basically colors that correspond more or less to the colors available in MASCHINE.

You can also change clip color while in Standard Clip Color Mode, but you will not see the change on the controller.



Editing clip colors is not available for MASCHINE MK1 and MASCHINE MIKRO MK1

Editing in Clip Mode

Using the Edit section of the MASCHINE Controllers, you can delete, duplicate, create, quantize and remove automation from clips. You can also duplicate, delete and create tracks.

This is generally achieved by holding down one of the buttons from the edit section and then pressing one of MASCHINE's pads. The edit operation (if possible) will be performed on the selected Clip Slot. In combination with the **Shift** button or the Alt button (on MASCHINE STUDIO only) alternate operation will be performed.

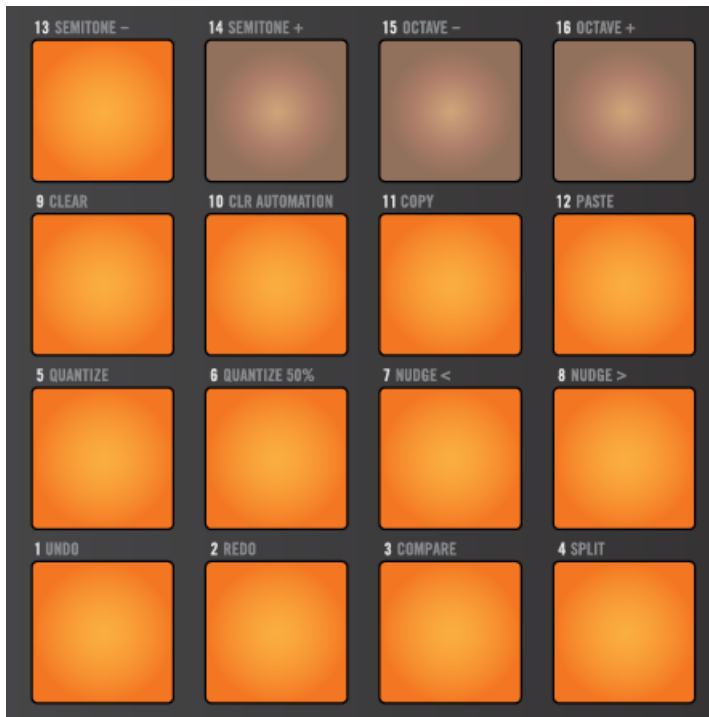
Button	Mod	Action	Destination
COPY (Duplicate)		Duplicate	clip of pad (if slot not empty)
	Shift	Duplicate Track	track of column of pad
PASTE (New)		New Clip	clip slot of pad (if slot is empty and MIDI track)
	Shift	New MIDI Track	insert MIDI Track to right of column
NOTE (Double)		Double Loop	clip of pad (only if contains MIDI clip)
	Shift	New Audio Track	insert to right of track of pressed pad

Button	Mod	Action	Destination
NUDGE (Clear Env)		Clear all automation	clip of pad
	Shift	New Return Track	
QUANTIZE		Quantize	clip of pad
	Shift	Quantize 50%	clip of pad
CLEAR		Delete	Clip of Pad
	ALT		Delete all Notes in Clip (only MASCHINE STUDIO)
	Shift		Track of Column of Pad

3.3.2 Scene Mode

In Scene mode the pads are used to launch scenes. On the MASCHINE MK1 controller, the pads are only lit up if the scene contains a clip. Initially MASCHINE controls scenes 1-16. Pad 1 controls scene 1, pad 2 controls scene 2, etc.

On the MASCHINE MK1 controllers, the pads are lit up if the corresponding scene contains at least one clip. The scenes that contain at least one launched clip are represented by blinking pads.



Scene Mode on MASCHINE controller

Scenes without clips and non-existent scenes (only if you have less than 16 scenes in your song) are represented by dimmed pads.

If you have more than 16 scenes, you can access these by pressing the Left/Right Buttons or using the Controller Encoder/jog wheel as described in the previous section.

MASCHINE MK2 and MASCHINE MIKRO MK2 use colors to represent the state of scenes. Green signifies that the scene contains at least one clip. Blue signifies that the scene has no clips. A bright green pad represents a scene with at least one launched clip. If the scene does not exist (you have less than 16 scenes) the pad is not lit at all.

Editing in Scene Mode

In Scene Mode you can use the Edit Section together with the pads to create, delete, duplicate or capture scenes.

Button	Mod	Action	Destination
COPY (Duplicate)		Duplicate Scene	Scene assigned to pad will be duplicated
PASTE (New)		New Scene	New scene will be inserted after scene of pad
	Shift	New Scene	New scene will be inserted before scene of pad
NOTE (Double)		Capture and Insert	Captured Scene will be insert at the position of the selected pad
NUDGE (Clear Env)		Clear all automation	Removes all envelopes from all clips of the selected scene
QUANTIZE		-----	Nothing as quantizing a whole scene would probably do more harm than good
CLEAR		Delete	Delete scene of selected pad

3.3.3 Pad Mode

In Pad mode you use MASCHINE's pads to play MIDI notes on whatever instrument you are controlling.



No visual feedback is given while playing the pads due to limitations of the template and Ableton Live

Depending on the Instrument Device in the highlighted track, Pad Mode is either in Note Mode or in Drum Rack Mode. If the selected track is not a MIDI track, Pad Mode will remain in its previous mode. If the highlighted MIDI track contains an Ableton Drum Rack, the mode will automatically switch to Drum Rack Mode.

Note Mode

The MK2 models make use of the colored LED by assigning colors to note values. There are two coloring modes, Individual Color mode and Interval Color mode. In Individual Color mode every note has its dedicated color. C is red, C# is dark pink, D is orange, D# is bright pink; E is dark yellow, etc.

In Note mode you can set a scale, the octave range and the base note. The base note will always be on pad 1.

The following image shows the pads in Individual Color mode with a chromatic scale and base note C:



Note Mode on MASCHINE MIKRO MK2 controller

Pad Mode: Individual Colors

You can switch between the color modes by pressing the **KEY COLOR** button which is located on the Settings Page (Button 6).

The change is also displayed in Ableton Live's status bar and on MASCHINE MK2 and MASCHINE STUDIO's text display.



Ableton Live's status bar reading MASCHINE MK2 Note Mode Key Color: Individual colors

In Interval Colors mode, the keys are colored according to note interval based on the base note. The pad representing the base note always has the color red.

You have different options to modify octave, scale and base note on the controllers.



Note Mode on MASCHINE MIKRO MK2 controller with options to modify octave, scale and base note

- (1) Octave/Base note +12 semitones
- (2) Minor sixth +8 semitones
- (3) Major sixth +9 semitones

- (4) Minor seventh +10 semitones
- (5) Major seventh +11 semitones
- (6) Major third +4 semitones
- (7) Forth +5 semitones
- (8) Diminished fifth +6 semitones
- (9) Fifth +7 semitones
- (10) Base note
- (11) Minor second +1 semitone
- (12) Major second +2 semitones
- (13) Minor third +3 semitones

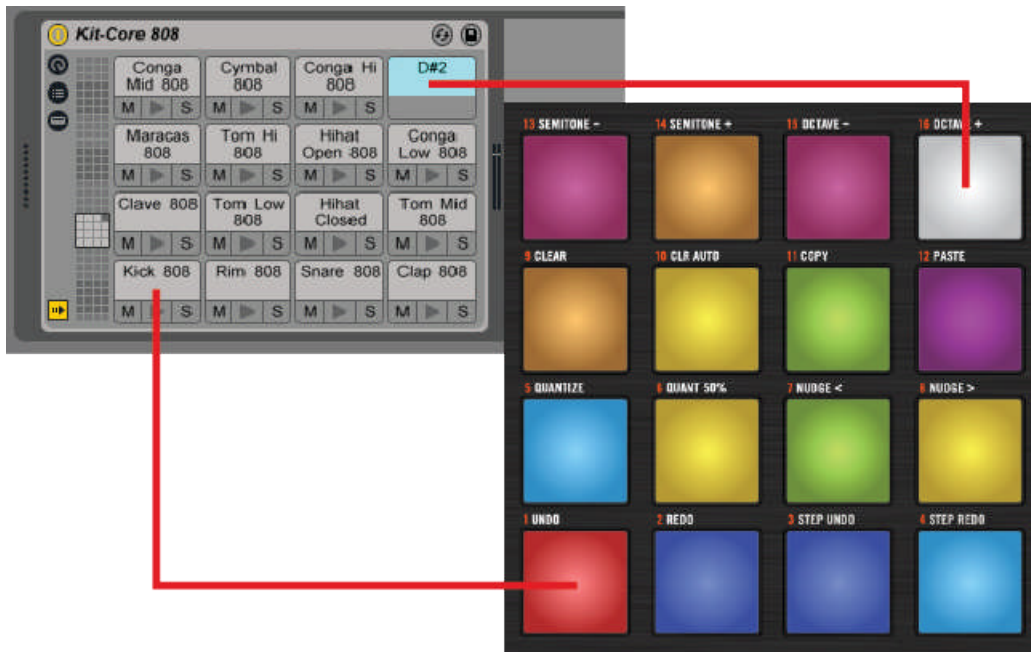
The original versions of MASCHINE do not have colored pads. As a result, visual feedback is limited. In Note Mode the monochromatic MASCHINE model have unlit pads for the black keys (C#/Db, D#/Eb, F#/Gb, G#/Ab, A#/Bb) and lit pads for the other key values. When holding down the clear button, the view will change and only the pads that have notes in the current clip will be lit.



MASCHINE MK1 Pad Mode Chromatic Scale

Drum Rack Mode

If the selected track contains an Ableton Drum Rack, the Pad Mode will automatically switch to Drum Rack Mode. In this mode the pads are colored according to the drums in the drum cells of the drum rack. The coloring is based on the name of the drum cell. For instance any cell whose name contains the character sequences 'kick', 'bd' or 'bassdrum' will be colored red. Cells whose name contains 'snare' or 'sd' will be colored dark blue, etc.



Ableton Live Drum Rack on the Pads of MASCHINE MK2 controller

The selected drum cell is lit up a little brighter than the other cells. Empty drum cells are unlit and when select light up bright white.

- Use the jog wheel/Control encoder when in Navigation Mode (MASCHINE STUDIO jog wheel Page Edit, MASCHINE MIKRO MK2 Group button is green, MASCHINE MK2 Group A button is green) to scroll through the whole range of pads.



The MASCHINE MK1 models display cells containing an instrument as lit pad and empty cells as dimmed pad. When holding down the CLEAR button, the pads that have notes in the current midi clip will light up, the others will be turned off.

For those who feel secure with editing Python Files and would like to customize the colors of the drum pads, the Python source File MIDI_Map.py is included. Add or modify rules in the AUTO_NAME list. Each list element contains a regular expression listing the word elements to

match. The second element is a pair of lists each containing 3 HSB value (0-127), the first one determining the off color value and the second one the on color value. As an example, here is the rule for kick drums:

```
(re.compile('kicklbdlbassdrum', re.IGNORECASE) , ((0, 127, 40), (0, 127, 127)))
```

The rule for kick drum is set with off value Hue = 0 Saturation = 127 (full) and brightness = 40, which is a slightly dark red. When editing, make sure you saved the original. Let's say you want also want cells with names containing 'kck' to be colored red. Simply change the rule to:

```
(re.compile('kicklbdlbassdrumlkck', re.IGNORECASE) , ((0, 127, 40), (0, 127, 127)))
```

You will have to restart Live for the change to take effect.

Edit in Pad Mode

In Pad Mode an edit action is always associated with the highlighted clip slot. Actions upon clips like quantize clip, duplicate clip etc. will have no effect if the selected clip slot is empty.

The only edit function that works together with the pads in Note/Drum mode is the **CLEAR** function.

1. Hold down **CLEAR** button while in PAD Mode. All pads, which have corresponding note events in the clip will light up.
2. Just press the pads to delete notes of the particular note value (while still holding the **CLEAR** button). All notes of the note value of the pad will be removed from the clip (within the start and end point of the clip).



Example of editing in Pad Mode on MASCHINE MK2 controller

This example shows a simple clip. The note vales in the clip are C3, F3 A#3 and B3. The picture of the MASCHINE controller shows PAD MODE with a chromatic scale and base note C3. Pressing Pad 11 (Note A#3) will delete all notes in the clip with note value A#3. At the same time the pad will be dimmed.

Pressing any Pad while also holding down the **Shift** button will remove all note events in the MIDI clip.

The other edit functions are also always related to the highlighted clip slot in Live and work as follows:

Button	Mod	Action	Destination
COPY (Duplicate)		Duplicate	Selected clip slot (if slot not empty)
	Shift	Duplicate Track	Selected track
PASTE (New)		New Clip	Selected clip slot (if slot is empty and track is MIDI track)

Button	Mod	Action	Destination
	Shift	New MIDI Track	Insert new empty MIDI Track to right of selected track
NOTE (Double)		Double Loop	Selected clip slot (only if contains MIDI clip)
	Shift	New Audio Track	Insert new empty Audio Track to right of selected track
NUDGE (Clear Env)		Clear all automation	Selected clip slot (if slot not empty)
	Shift	New Return Track	Create a new empty Return Track to
QUANTIZE		Quantize	Selected clip slot (if slot not empty)
	Shift	Quantize 50%	Selected clip slot (if slot not empty)
CLEAR	+ PAD	Delete	Delete all notes of with the note value of selected pad in selected clip (clip needs to contain a midi clip)
	Shift + Pad		Delete all Notes in Clip

3.3.4 Note Repeat

Holding down the NOTE REPEAT button and playing a pad in Pad Mode will retrigger the note in the set note repeat interval. The pads send poly aftertouch, so applying pressure to the held pad will generate notes with higher or lesser velocity volumes.



If you are already holding down a note and then press **NOTE REPEAT**, note repeat will not be activated for this particular note. It will only be triggered for note played after note repeat was activated.

For all Versions of MASCHINE note repeat is deactivated as soon as your release the **NOTE REPEAT** button again. If you hold the **Shift** button (**ENTER**-MK2, Group **A**-MK1, **MAIN**-MIKRO, **BACK** or **BROWSE** STUDIO) and **NOTE REPEAT**, note repeat will lock. Unlock note repeat by simply pressing **NOTE REPEAT** again without the **Shift** button.

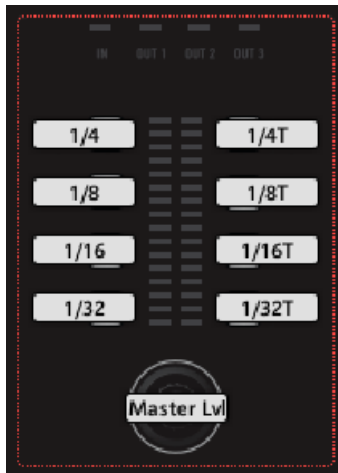
The note repeat rate is modified by buttons in the note repeat section of the controller. Where this section depends on which MASCHINE model you are using.

When Note Repeat is locked, you can deactivate note repeat by pressing the currently active note repeat rate button. It will come unlit and note repeat will stop. Press it again and note repeat will continue.

Note Repeat on MASCHINE STUDIO

MASCHINE offers two ways to change the note repeat rate.

- **I/O Volume Page** located to top right on the controller



The rates are applied as displayed.

- Knob/Button Page 6: **Note Repeat and Device**



Button (1)-(4) are configurable buttons. Their values are set by the respective encoders below. When activating one of the freely assignable note repeat buttons or changing the value with knob, the current values of all buttons will be shown in the text display.

This page additionally has encoder 5-8 assigned to the current device.

Note Repeat on MASCHINE and MASCHINE MK2

MASCHINE and MASCHINE MK2 have a dedicate Note Repeat Page. On MASCHINE this is [Page 7](#) and on MASCHINE MK2 this [Page 5](#).



Note Repeat Page on MASCHINE MK2 controller

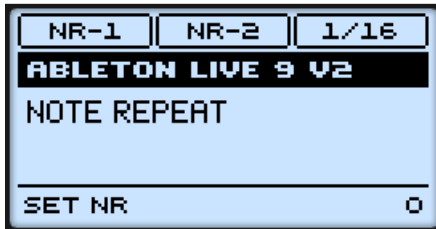


Note Repeat Page on MASCHINE MK1 controller

Like with MASCHINE STUDIO buttons (1)-(4) are freely assignable to rates from $\frac{1}{2}$ note to $\frac{1}{64}$ note including triplets. When activating one of the freely assignable note repeat buttons or changing the value, the current values of all buttons will be shown in MASCHINE MK2's text display. MASCHINE MK1 will show the value of the currently selected or change note repeat button in the status bar.

Note Repeat on MASCHINE MIKRO and MASCHINE MIKRO MK2

With MASCHINE MIKRO and MIKRO MK2 the Note Repeat Page is Page 5.



Note Repeat Page on MASCHINE MIKRO controllers

Only the **F3** button has a fixed note repeat rate of 1/16 note. Buttons **F1** and **F2** have adjustable rates. You can adjust the repeat rates behind the *NR-1* button or *NR-2* button with the control encoder.

This can be done either by

- holding down the corresponding NR button and turning the control encoder
- If the *NR-1* or *NR-2* button is currently active and **NOTE REPEAT** is also currently active, being either held down or locked. Then the control encoder on this page is assigned to changing the rate.

The new note repeat rate is displayed in Ableton Live's status bar:



Ableton Live's status bar reading MASCHINE MK2 Note Repeat Mode Button 1: 1/4 T

Otherwise the control encoder is assigned to its regular function. See [↑3.2.3, Controls and Navigation with MASCHINE MIKRO MK1 & MIKRO MK2](#).

If the control encoder is assigned to changing the note repeat rate, pressing the encoder will make live show the current rate in its status bar (without modifying it). If you turn the main encoder while holding it down, you will stay within the current type of note repeat rate, being triplets or non-triplets.

The rate is immediately applied, so this way you can use the encoder to perform note repeat changes while playing the pads.



The configured note repeat values are stored, so when you load a new song or start up Live again, the assignments will be recalled.

3.3.5 Track Controls

With the track control mode you can solo, mute, select, assign the cross-fader, arm or stop tracks using the controllers pads. On the MASCHINE MK2 models, the pads are colored according to mode and state of the track.

- To access each function, press and hold the corresponding button.



Only existing tracks are lit. By adding new tracks, more pads will light up.

With MASCHINE, MASCHINE MK2 and MACHINE STUDIO the **SELECT**, **SOLO**, **MUTE**, Group **C**, Group **D** and Group **H** buttons.

Track Modes

Button	Function	Description	
GROUP C	Crossfade Assign	Assigns the crossfader of the corresponding track to A, B or both. For MK2 dim blue indicates that the track has no assignment. Orange corresponds to an assignment to B and yellow an assignment to A. On the MASCHINE MK1 models, a blinking pad displays an assignment to B and a lit pad displays an assignment to A.	
SELECT	Select Track	Selects one of the first sixteen tracks in Live. The selected track is highlighted. The MASCHINE MK2 version uses blue as the color for selection mode. The MASCHINE MK1 models display the selected track by highlighting it.	
SOLO	Solo/Un-Solo Track	Solos or Un-Solos the corresponding tracks. The tracks that are soloed are highlighted. If the Arm/Solo Exclusive mode button (ALL) is active, soloing a track will unsolo previously soloed tracks or not.	

Button	Function	Description	
MUTE	Mute/ Unmute Track	Mute or Unmutes a track. All muted tracks are dimmed. The MK2 version use yellow as color to display muting. Since Muting is automatable you can also delete mute automation for the highlighted track.	
Group D (MASCHINE) SAMPLING (MIKRO)	Arm/Unarm Track	Arms or unarms the selected track. Depending on if Arm Exclusive mode (see ↑3.1.6, Navigation) is active. Arming a track will either automatically unarm previously armed tracks or not. Armed tracks are highlighted. The MASCHINE MK2 versions use red to symbolize arming. Audio tracks are colored pink and MIDI tracks red.	
GROUP H (MASCHINE) BROWSE (MIKRO)	Stop Track	Selecting one of the pads in this mode will stop the playing clip on the corresponding track. Tracks with active clips are colored yellow and tracks without active clips are blue. Tracks not containing any clips are unlit. On MASCHINE MK1 and MIKRO MK1, tracks with active clips blink, whereas tracks containing inactive clips are lit and all others are dimmed.	

When changing in to any track related mode, the selected mode will be shown in the status bar:



Ableton Live's status bar reading MASCHINESTUDIO Current Mode: Track Stop

If your song contains more than sixteen tracks, you access these by using the navigation methods (left/right buttons, jog wheel or control encoder) as described in [↑3.2, Global Controls and Navigation](#), [↑3.2, Global Controls and Navigation](#).

Editing while in Track Control Mode

The edit buttons also work in any of the track control modes, although it might be less likely that you would try to use the edit functions in this mode. The edit functions always work in relation to the highlighted clip in Live

Button	Mod	Action	Destination
COPY (Duplicate)		Duplicate	Selected clip slot (if slot not empty)
	Shift	Duplicate Track	Selected track
PASTE (New)		New Clip	Selected clip slot (if slot is empty and track is MIDI track)
	Shift	New MIDI Track	Insert new empty MIDI Track to right of selected track
NOTE (Double)		Double Loop	Selected clip slot (only if contains MIDI clip)
	Shift	New Audio Track	Insert new empty Audio Track to right of selected track
NUDGE (Clear Env)		Clear all automation	Selected clip slot (if slot not empty)
	Shift	New Return Track	Create a new empty Return Track to
QUANTIZE		Quantize	Selected clip slot (if slot not empty)
	Shift	Quantize 50%	Selected clip slot (if slot not empty)
CLEAR		Delete	Delete the clip in the clip slot
	Shift	Delete track	Remove the currently selected track

3.3.6 Control Mode (MIKRO MK1 and MIKRO MK2 only)

Control mode is activated by selecting the **SCENE** button while holding down the **Shift** button on MASCHINE MIKRO MK1 and MIKRO MK2. Control mode is only available for both MIKRO models, since these controllers do not have 8 individual knobs.

In Control mode, you use the pads to assign the Control encoder to the mixer's output volumes, pans, sends and device parameters.

By default the encoder modifies the parameters in larger steps for faster parameter changing. By pressing down the encoder and turning it, the assigned parameter is modified in small steps. The Ableton Live Template however detects so-called integer values, for instance, some quantization value or on/off values. In this case it makes no difference in which manner you turn the knob.

When switching to Control mode, the pads on the MASCHINE MIKRO MK2 will look like this:



Control Mode on MASCHINE MIKRO MK2 controller

The buttons in the third row from above (pads 5-8) select volume (green), pan (red), send volume (blue) or device (purple) control.

Mixer Volume Control (Green)

The eight upper pads (13-16) are used to assign the Control encoder to one of eight tracks according to the position of the focus rectangle. The first pad in the row (13) assigns the Control encoder to the volume of the first track of the current focus rectangle, the second pad (14) to the volume of the second track, etc.

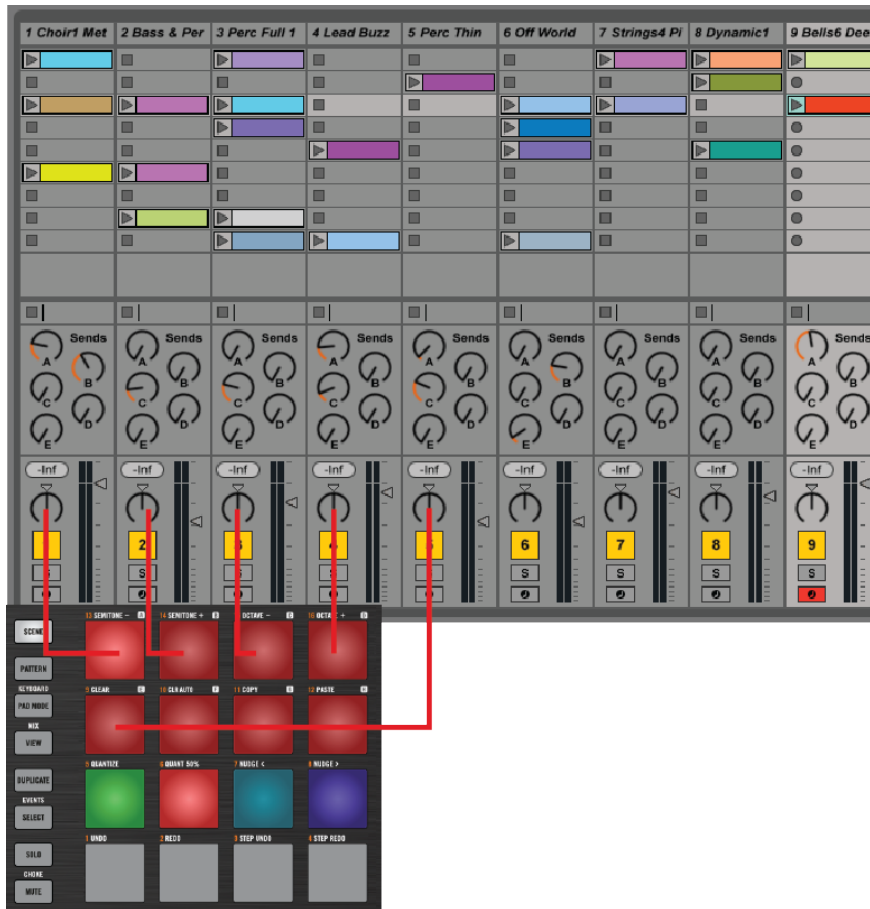


Mixer Volume control

In the image above, the focus rectangle starts at track 1. Pad 9, which is the fifth pad counting from the upper left corner of the pad matrix, is highlighted, so the Control encoder controls the output volume of track 5.

Pan Control (RED)

- ▶ Select the second pad in the third row from above (pad 6) to set the Control mode to panning.
- ▶ Press the pad corresponding to the track you want to pan and turn the Control encoder right or left in order to pan the track's output in the mix.



Pan control

Send Volume Control (Blue)

- Select the third pad in the third row from above (pad 7) to set the Control mode to adjusting send volumes of the tracks.

In this mode, the lower row of the pad matrix is lit. The number of lit pads corresponds to the number of existing effect return tracks.

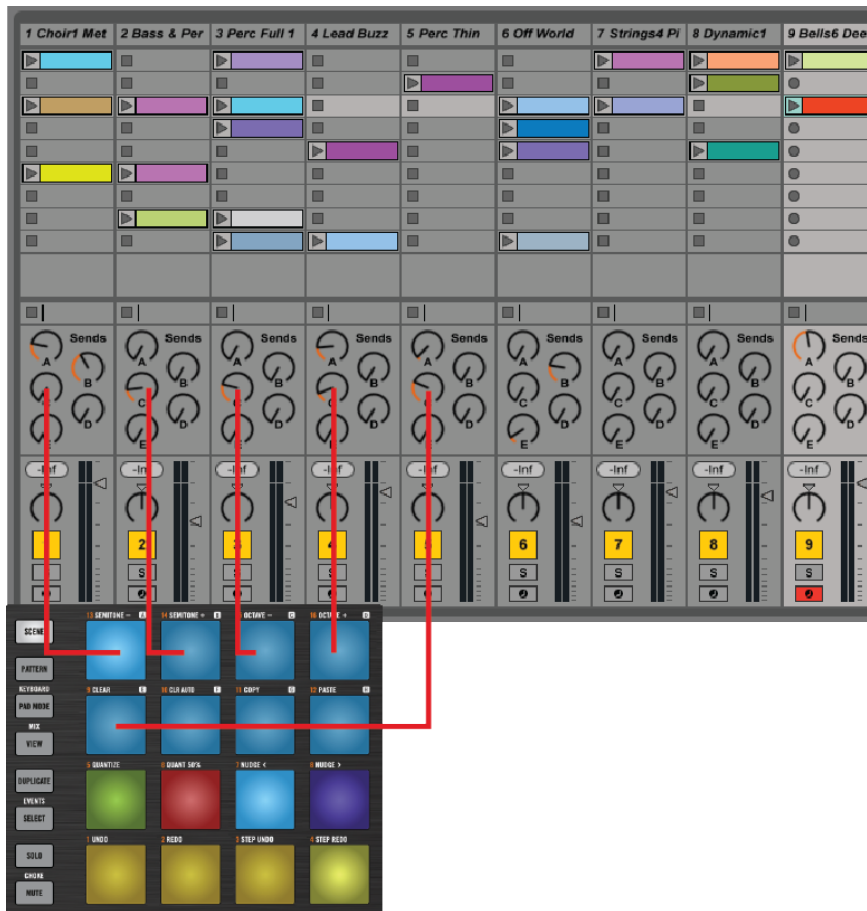
To assign a track to one of your effect return tracks:

1. Press the pad that corresponds to the track you wish to add the effect to.
2. Press the pad that corresponds to the desired return track (1 corresponds to A, 2 to B, etc.).
3. Turn the Control encoder to adjust the volume of the effect return.



If you have more than four effect return tracks, press pad 4 repeatedly in order to reach the fifth track, twice for the sixth track, etc.

The new assignment is shown in Ableton Live's status bar:



Send Volume control

The selection is shown in Ableton Live's status bar and the color of the forth pad changes as well.



Ableton Live's status bar reads MASCHINE MIKRO MK2 Control Mode Focus: Send D

Basically any new assignment will be reflected in the status.

Controlling Devices in Control Mode (Purple)

The fourth button in the third row (pad 8) assigns the Control encoder to controlling devices in Ableton Live's device chains. After selecting Device Control in Control mode, the four bottom-row pads will light up. Using the orange colored pads (pads 1 and 2); you can step through the devices in the device chain of the selected track. The two darkest-purple colored pads (pads 3 and 4) select the parameter bank. The pads will be lit if it is possible to select a next or previous set of parameters. The new selection is also shown in the status bar.



Controlling devices in Control Mode in Ableton Live

The device can be turned on or off by selecting pad 8 while holding the **Shift** button (MAIN button). If the device is turned off, the pads 9-16 will be white otherwise purple.



Controlling devices in Control Mode on MASCHINE MIKRO MK2 controller

- (1) Pad 9, 10, 11, 12, 13, 14, 15, and 16: **Parameter Controls**
- (2) Pad 1: Select Previous Device
- (3) Pad 2: Select Next Device
- (4) Pad 3: Previous Bank
- (5) Pad 4: Next Bank
- (6) Pads 9-16: Shows deactivated device



MASCHINE MIKRO MK1 works in the same way as described above, with the exception that the pads only use one color and only the currently selected element are lit up.

Editing and Clearing Parameter Automation in Control Mode

As with the other MASCHINE models you can also clear any session automation for each parameter you can control via Control Mode. Simply hold the **CLEAR** button (Page 3: Edit 1 Button F3) and press the corresponding pad that is assigned to a parameter as described before. If an envelope exists for the highlighted clip, the automation will be removed. This table provides an overview of the way the edit buttons work in control mode:

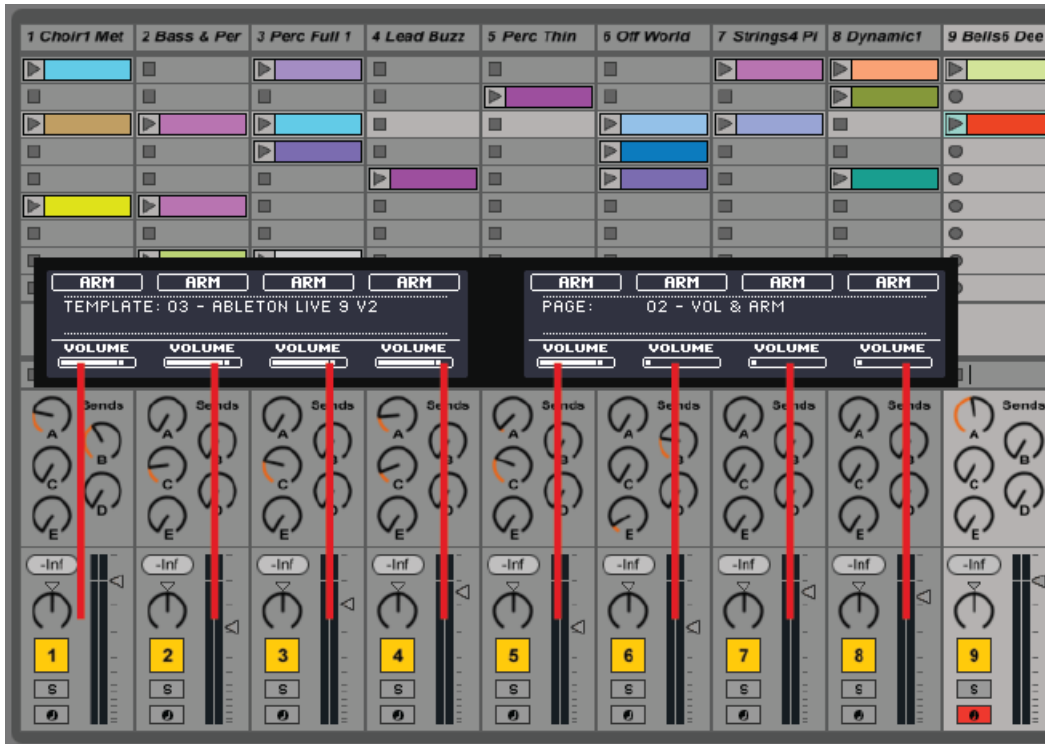
Button	Mod	Action	Destination
COPY (Duplicate)		Duplicate	Selected clip slot (if slot not empty).
	Shift	Duplicate Track	Selected track.
PASTE (New)		New Clip	Selected clip slot (if slot is empty and track is MIDI track).
	Shift	New MIDI Track	insert new empty MIDI Track to right of selected track.
NOTE (Double)		Double Loop	Selected clip slot (only if contains MIDI clip).
	Shift	New Audio Track	Insert new empty Audio Track to right of selected track.
NUDGE (Clear Env)		Clear all automation	Selected clip slot (if slot not empty).
	Shift	New Return Track	Create a new empty Return Track.
QUANTIZE		Quantize	Selected clip slot (if slot not empty).
	Shift	Quantize 50%	Selected clip slot (if slot not empty).
CLEAR	+ PAD	Delete	Delete automation for parameter assigned to the pad.
	Shift + Pad		Delete all Notes in Clip.

3.4 Controller Pages

MASCHINE, MASCHINE MK2 and MASCHINE STUDIO have eight knobs and buttons that can be used to control the mixer or any device, such as a synthesizer or effect, in Live. These controls are split between the different pages of the Ableton Live Template.

Most pages are assigned to mixer or device control. The pages assigned to mixer controls always coincide with the position of the four x four focus rectangle.

You can control up to eight strips simultaneously. If your focus rectangle is focused on tracks 1-4, then the knobs and buttons on **PAGE 02 - VOL & ARM** control the output volume and track arming of tracks 1-8.

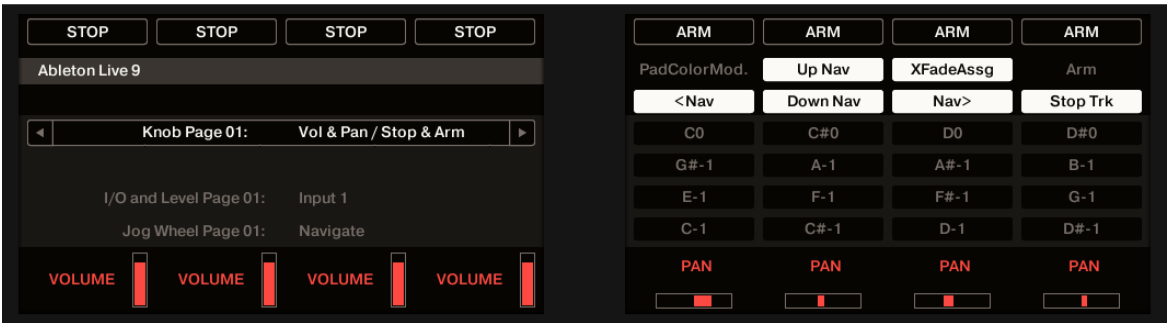


Controlling volumes on MASCHINE MK2 controller

Some pages of the templates have already been explained. This section will shortly explain the remaining pages.

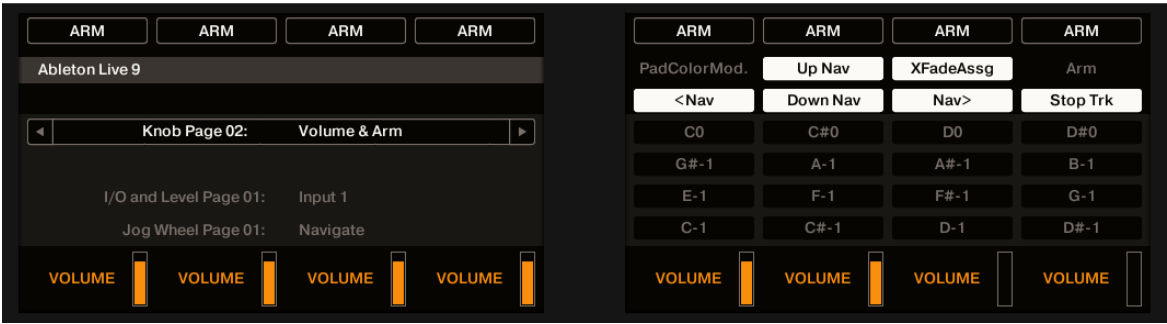
3.4.1 MASCHINE STUDIO Pages

On **PAGE: 01**, Buttons 1-4 are assigned to the stop buttons of the four tracks inside your focus rectangle. The buttons above the right display (5-8) are used for arming tracks. The knobs below the left display (1-4) let you control the output volume of each track and Knobs 5-8 are assigned to the pan pots of the four tracks inside your focus rectangle.



Page 01 on MASCHINE STUDIO controller

On **PAGE: 02** you can access controls for arming tracks (Buttons 1-8) and for track volumes (Buttons 1-8)



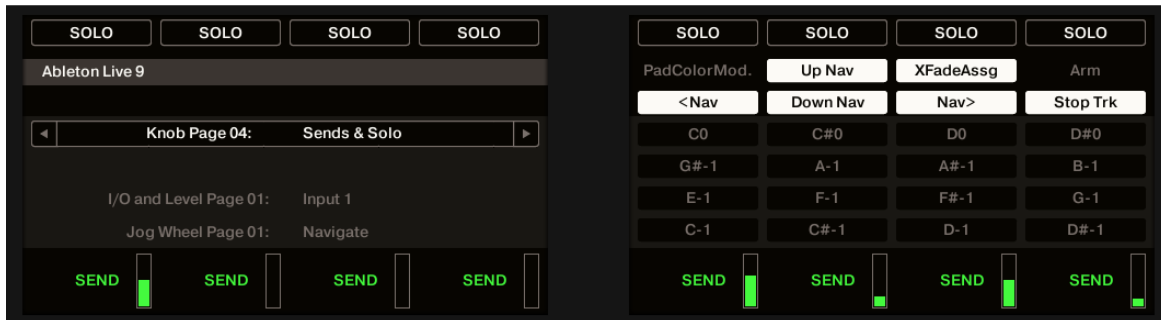
Page 02 on MASCHINE STUDIO controller

PAGE 03 is dedicated to track muting (Buttons 1-8) and panning (Knobs 1-8).



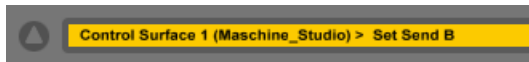
Page 03 on MASCHINE STUDIO controller

On **PAGE 04**, all Buttons (1-8) are assigned to the solo function of each track in Live. Knobs 1-8 are dedicated to the send volumes of each track. By default the send volumes of return track A are controlled.



Page 04 on MASCHINE STUDIO controller

- ▶ To access other send tracks, press the **AUTO** button repeatedly
- ▶ Ableton Live's status bar displays the selected send track.



PAGE: 05 is dedicated to controlling Ableton Live's devices.



Page 05 on MASCHINE STUDIO controller

- ▶ Use Button 3 (<<Track) and Button 4 (Track>>) to select the previous or next track.
- ▶ Use Button 5 (<<Device) and Button 6 (Device>>) to navigate between devices within the chain.

The first time you select a device, Knobs 1-8 are assigned to the first eight parameters of the device. If a device has more than eight controllable parameters, these are split into banks of eight.

- ▶ Use Button 8 (Bank>>) to move to the next bank.
- ▶ In order to return to the previous bank, press Button 7 (<<Bank).

→ Ableton Live's status bar displays the change:



Additionally, the name of the selected bank is displayed in the lower left text display segment of MASCHINE STUDIO.

PAGE 06 is the NOTE Repeat Page and has been described in 5.3.5, Note Repeat .

PAGE: 07 is assigned to editing the selected clip in Live.



Page 07 on MASCHINE STUDIO controller

The Clip/Loop Page is always associated with the highlighted clip slot. If the slot contains a clip you can use the knobs *Loop Start*, *Loop End*, *Clip Start*, *Clip End* to adjust the Loop and Start/End markers of the clip. The new position of the loop or start/end points are displayed in the lower left segment of the controller text display.

If the clip is an audio clip, you can use the *Transpose*, *Detune* and *Gain* encoders to adjust the corresponding values of the audio clip.

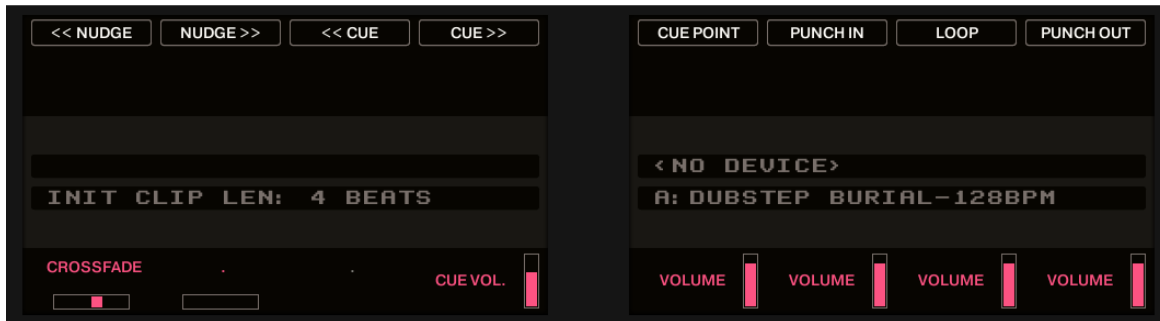
The *Loop* button activates/deactivates looping. The *Warp* button activates/deactivates warping. This only works for audio clips.

With the *Loop Inc.* button you can set the division by which the Loop/Markers are modified by the corresponding knobs. The new value is shown in the controller's display.

If the *Fixate Loop* button is active, adjusting the start point of the loop will automatically move the loop endpoint thus preserving the current loop length. It will also keep the start and end markers set to the same position as the corresponding loop points.

PAGE 8 contains the Settings Page which has been discussed at length in 3.6.2, Settings Page

PAGE 9 controls the crossfader and some general transport controls in Live. Additionally, Knobs 5-8 are assigned to the volumes of the tracks the current focus rectangle.



Page 9 on MASCHINE STUDIO controller

PAGE 10 contains knobs and buttons with unassigned CCs.



Page 10 on MASCHINE STUDIO controller

- Use these together with Ableton Live's MIDI learn function to freely assign the controls to any parameter in Live.

3.4.2 MASCHINE MK2 Pages

On **PAGE 01**, Buttons 1-4 are assigned to the stop buttons of the four tracks currently inside your focus rectangle. The buttons above the right display (5-8) are used for arming tracks. The knobs below the left display (1-4) let you control each track's output volume and Knobs 5-8 are assigned to the pan pots of the four tracks inside your focus rectangle.



Page 01 on MASCHINE MK2 controller

On **PAGE 02** all buttons are dedicated to arming tracks and all knobs to the tracks' output volumes.



Page 02 on MASCHINE MK2 controller

PAGE 03 is dedicated to track muting (Buttons 1-8) and panning (Knobs 1-8).



Page 03 on MASCHINE MK2 controller

On **PAGE: 04**, all Buttons (1-8) are assigned to the solo function of each track in Live. Knobs 1-8 are dedicated to the send volumes of each track. By default the send volumes of return track A are controlled.



Page 04 on MASCHINE MK2 controller

► To access other send tracks, press the **AUTO WR.** button repeatedly.

Page 05 gives you control over different and four configurable note repeat values.



Page 05 on MASCHINE MK2 controller

For more details on note repeat, see [↑3.3.4, Note Repeat](#).

For convenience the four encoders are assigned to the current Live device.

PAGE 06 is dedicated to controlling Ableton Live's devices:



Page 06 on MASCHINE MK2 controller

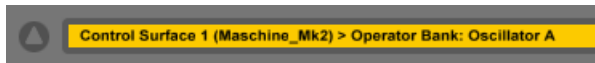
Button 1 (*ON-OFF*) activates or deactivates the currently selected device in the device chain.

- Use Button 3 (*<<TRCK*) and Button 4 (*TRCK>>*) to select the previous or next track.

The first time you select a device, Knobs 1-8 are assigned to the first eight parameters of the device. If a device has more than eight controllable parameters, these are split into banks of eight.

- Use Button 7 (*BNK>>*) to move to the next bank.
- In order to return to the previous bank, press Button 8 (*<<BNK*).

→ Ableton Live's status bar displays the change:



Additionally the name of the selected bank is displayed in the lower left text display segment of MASCHINE MK2.

Page 07 contains basic editing function already discussed in [↑3.2.4, Controls and Navigation with MASCHINE](#) , [↑3.2.4, Controls and Navigation with MASCHINE](#) .



Page 07 on MASCHINE MK2 controller

This Page has no Clear Button since the Clear function is assigned to the **SAMPLING** button.

Additionally this page contains eight encoders and two buttons dedicated to editing the selected clip in Live.

The Clip/Loop Page is always associated with the highlighted clip slot. If the slot contains a clip you can use the knobs *LP START*, *LP END*, *CLP STAR.*, *CLP END* to adjust the Loop and Start/End markers of the clip. The new position of the loop or start/end points are displayed in the lower left segment of the controller text display.

If the clip is an audio clip, you can use the *TRANPO.*, *DETUNE* and *GAIN* knob to adjust the corresponding values of the audio clip. The *LOOP* button activates/deactivates looping. The *WARP* button activates/deactivates warping, which only works for audio clips.

With the *LOOPING* button you can set the division by which the Loop/Markers are modified by the corresponding knobs. The new value is shown in Ableton Live's status bar and in the left lower section of MASCHINE MK2's text display area.

If the *FIXLOOP* button is active, adjusting the start point of the loop will automatically move the loop endpoint thus preserving the current loop length. It will also keep the start and end markers set to the same position as the corresponding loop points.

Page 08 :This page contains the Settings buttons which have been discussed at length in 3.6.2, Settings Page.



Page 08 on MASCHINE MK2 controller

PAGE 09 controls the crossfader and some general transport controls in Live. Additionally, Knobs 5-8 are assigned to the volumes of the tracks the current focus rectangle.



Page 09 on MASCHINE MK2 controller

PAGE 10 contains a set of freely assignable MIDI CCs. Assign them as you like to any parameter in Live. Knob 1 is however assigned to Program Change.



Page 10 on MASCHINE MK2 controller

Buttons (1) and (2) have been assigned to work as a sustain pedals. Otherwise feel free to customize this page, but make sure you don't use MIDI channels below channel 5.

3.4.3 MASCHINE MK1 Pages

On **PAGE 01**, Buttons 1-4 are assigned to the stop buttons of the four tracks currently inside your focus rectangle. The buttons above the right display (5-8) are used for arming tracks. The knobs below the left display (1-4) let you control each track's output volume and Knobs 5-8 are assigned to the pan pots of the four tracks inside your focus rectangle.



Page 01 on MASCHINE controller

On **PAGE 02**, all buttons are assigned to selecting tracks. Knobs 1-4 are used to control the output volume of each track currently inside the focus rectangle. Knobs 5-8 control the tracks send volumes.



Page 02 on MASCHINE controller

On **PAGE 03**, all buttons are assigned to arming tracks. Knobs 1-8 are used to control the output volume of each track currently inside the focus rectangle.



Page 03 on MASCHINE controller

PAGE 04 is dedicated to track muting (Buttons 1-8) and panning (Knobs 1-8).



Page 04 on MASCHINE controller

On **PAGE 05**, all Buttons (1-8) are assigned to the solo function of each track in Live. Knobs 1-8 are dedicated to the send volumes of each track. By default the send volumes of return track A are controlled.



Page 05 on MASCHINE controller

- To access other send tracks, press the **AUTO WRITE** button repeatedly.

→ Ableton Live's status bar displays the currently selected send track:



PAGE 06 is dedicated to controlling Ableton Live's devices:



Page 06 on MASCHINE controller

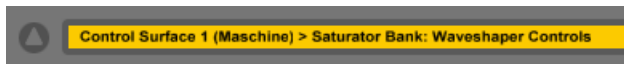
Button 1 (*ON-OFF*) activates or deactivates the currently selected device in the device chain.

- Use Button 3 (*<<TRCK*) and Button 4 (*TRCK>>*) to select the previous or next track.

The first time you select a device, Knobs 1-8 are assigned to the first eight parameters of the device. If a device has more than eight controllable parameters, these are split into banks of eight.

- Use Button 6 (*BNK>>*) to move to the next bank.
- In order to return to the previous bank, press Button 5 (*<<BNK*).

→ Ableton Live's status bar displays the change:



PAGE 07 is MASCHINE MK1's Note Repeat page. This page contains 8 buttons to jump between different note repeat rates.



Page 07 on MASCHINE controller

For more details on note repeat, see [↑3.3.4, Note Repeat](#).

For convenience the 4 encoders are assigned to the current Live device.

PAGE 08 is dedicated to performance in Pad mode. The left display shows volumes for mod wheel (*MOD WH*, Knob 1), pitch bend (PB, Knob 2) and Program Change (*PR CHG*, Knob 4). Buttons 1 and 2 are assigned to *SUSTAIN* and *SUSTAIN T* respectively. *SUSTAIN T* keeps sustain held after you release the button.

► To turn sustain off, press SUSTAIN T again.

On the right display, the knobs are assigned to the first four parameters of the selected device in a device chain (e.g. an effect or synthesizer).



Page 08 on MASCHINE controller

Use the *-OCT* and *+OCT* buttons to change the octave for Pad Mode

Use the *-SCALE* and *+SCALE* buttons to select a scale for Pad Mode

Use the *-BASE* and *+BASE* buttons to select a base note for Pad Mode

In each case the new scale settings are shown in Ableton Live's status bar.

PAGE 09 represents MASCHINE MK1's edit page.



Page 09 on MASCHINE controller

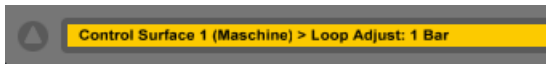
The function of the edit button DUPLIC, NEW, DOUBLE, CLR.AUTO, QUANT is discussed in [↑3.2.4, Controls and Navigation with MASCHINE](#), [↑3.2.4, Controls and Navigation with MASCHINE](#) and the subsequent section in the controller mode section.

Additionally this page contains 8 encoders and 3 buttons dedicated to editing the selected clip in Live.

The Clip/Loop Page is always associated with the highlighted clip slot. If the slot contains a clip you can use the knobs *LP START*, *LP END*, *CLP START*, *CLP END* to adjust the Loop and Start/End markers of the clip.

If the clip is an audio clip, you can use the *P. COARSE*, *P. FINE* and *GAIN* knob to adjust the corresponding values of the audio clip.

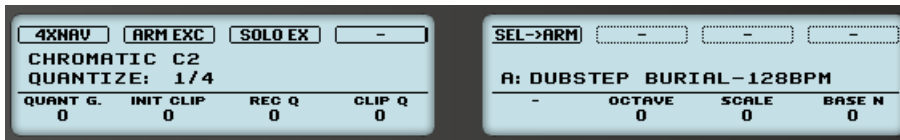
The *LOOP* button activates/deactivates looping. The *WARP* button activates/deactivates warping, which only works for audio clips. With the *LOOPINC* button you can set the divisions by which the Loop/Markers are modified by the corresponding knobs. The new value is shown in Ableton Live's status bar.



Ableton Live's status bar reads Loop Adjust Bar 1

If the *FIXLOOP* button is active, adjusting the start point of the loop will automatically move the loop endpoint thus preserving the current loop length. It will also keep the start and end markers set to the same position as the corresponding loop points.

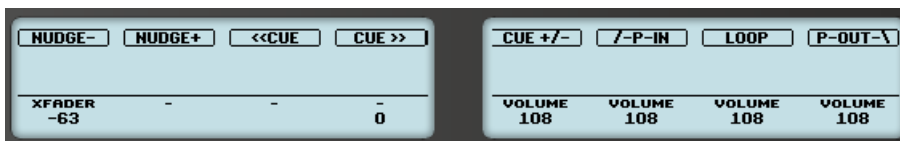
PAGE 10: This page contains the Settings buttons which have been discussed at length in 3.6.2, Settings Page



Page 10 on MASCHINE controller

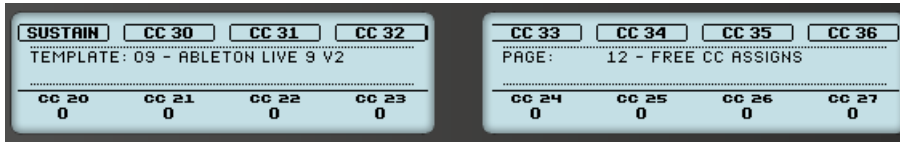
Besides, this page provides another access point to change the current scale settings for Note Mode.

PAGE 11 controls the crossfader and some general transport controls in Live. Additionally, Knobs 5-8 are assigned to the volumes of the tracks the current focus rectangle.



Page 11 on MASCHINE controller

PAGE 12 contains a set of freely assignable MIDI CCs. Assign them as you like to any parameter in Live.



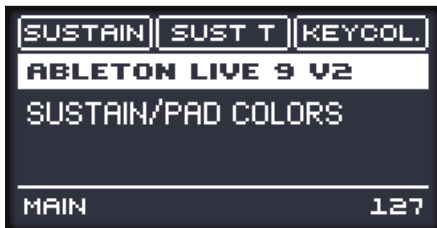
Page 12 on MASCHINE controller

3.4.4 MASCHINE MIKRO and MIKRO MK2 Pages

Some of the pages in the template for MIKRO and MIKRO MK2 have already been discussed. This section will shortly explain the remaining pages.

Sustain/Pad Color Page

This page contains buttons for Pad Mode. Buttons **F1** and **F2** are assigned to a regular MIDI sustain message. **SUSTAIN T** keeps the sustain held after you release the button.



Sustain/Pad Page on MASCHINE MIKRO MK2 controller

Use **F3** button **KEY COL** to switch between Individual Colors and Interval Color in Pad Note Mode. For details see [↑3.3.3, Pad Mode](#).

Color Assign Page

If Button **F1** **COL.MOD** is lit up, Clip Color Mode is active otherwise Standard Clip Color Mode is active. Button **F3** **COL.SEL** activates Clip Color editing. This can also be achieved by holding the **Shift** (**MAIN**) button and the **PATTERN** button. For details see [↑3.3.1, Clip Mode](#).



Color Assign Page on MASCHINE MIKRO MK2 controller


The **F2** button is not assigned.


Arrange Page

This page contains functions concerning the arrangement view.



Arrange Page on MASCHINE MIKRO MK2 controller

Button **F1** (*B-ARR*) corresponds to the  back to arrangement button.

Button **F2** (*ARR OVR*) activates/deactivates arrangement overdubbing and corresponds to the  button in Live.

Button **F3** (*SNG FLW*) activates Song Follow in Live .

Tempo Tap Page

The **TEMPO TAP** page contains a tap tempo button (**F1**) and two buttons for Ableton Live's Nudge function (**F2** and **F3**).



Tempo/Tap Page on MASCHINE MIKRO MK2 controller

Loop Control Page

Activates/Deactivates Punch-In (*P-IN*, **F1**), Punch-Out (*P-OUT*, **F2**) and the *LOOP* (**F3**).



Loop Control Page on MASCHINE MIKRO MK2 controller

Cue Control Page

Use the buttons on this page to add cue points to the arranger and navigate between them.



Cue Control Page on MASCHINE MIKRO MK2 controller

4 MASCHINE JAM

If you are familiar with the MASCHINE JAM workflow, you can start using the controller with Ableton Live right away. Many of JAM's basic functions have been adapted to Ableton Live and work in the same way, including clip control, **STEP** and **PIANO ROLL** mode, as well as **PAD** and **KEYBOARD** mode. You can also use the Touch Strips to control your levels, sends, and device parameters.

In the following sections, you will find reference information for all of the functions mapped to the JAM controller when using the MASCHINE JAM Ableton Live Template.



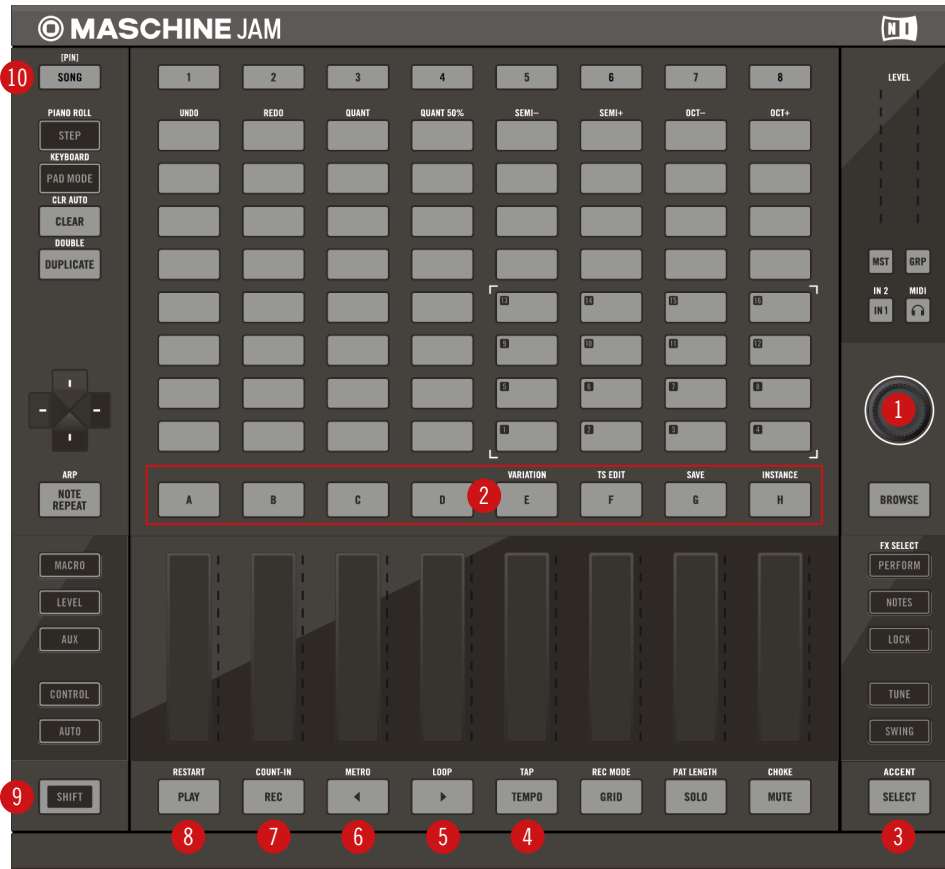
Also check out the following video by Producertech about using the Ableton Live Template: <https://www.youtube.com/watch?v=sJEJRy71J8>

See also

- 📖 Transport and Global Functions [→ 107]
- 📖 Matrix and Note Input [→ 109]
- 📖 Smart Strip and Mixing [→ 112]

4.1 Transport and Global Functions

The MASCHINE JAM Ableton Live Template offers full control over Ableton Live's transport as well as many other global functions.



Global and transport controls on MASCHINE JAM

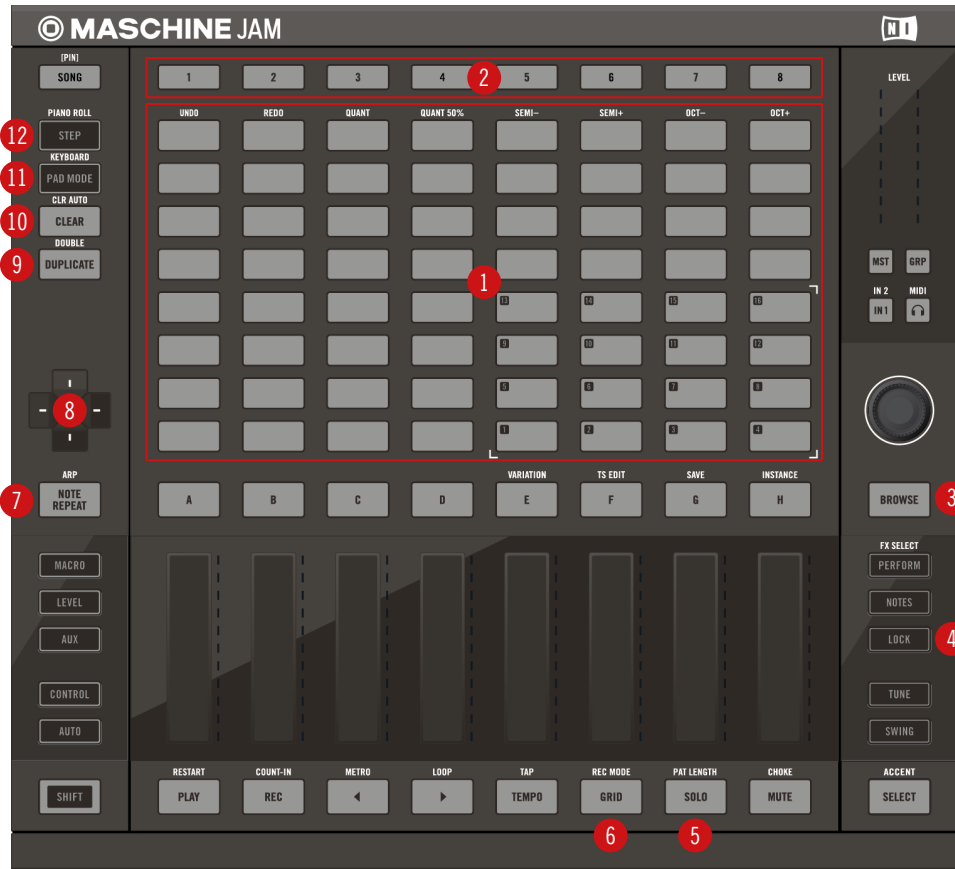
(1) **Encoder:** The encoder is used to control a number parameters, depending on the selected mode. Pressing and turning the encoder allows for fine adjustments.

- **MST:** The encoder controls the Master level.
- **GRP:** The encoder controls the level of selected track.
- **Headphone:** The encoder controls the preview / cue level.
- **TEMPO:** The encoder controls the tempo of the Live Set.

- **PAT LENGTH** (**SHIFT** + **SOLO**): The encoder controls the length of the selected clip.
 - **GRID**: The encoder controls the Clip Quantize value.
 - **NOTE REPEAT**: The encoder controls the note division for the repeats.
- (2) **Group buttons**: These buttons select tracks, or a number of different functions depending on the selected mode.
- **MUTE**: The Group buttons mute tracks.
 - **SOLO**: The Group buttons solo tracks (press **SHIFT** to solo multiple tracks).
 - **REC MODE** (**SHIFT** + **GRID**): The Group buttons arm tracks for recording (press **SHIFT** to arm multiple tracks).
- (3) **SELECT**: Pressing **SELECT** and the Group button of an empty track creates a new Audio Track. Pressing **SELECT** + **BROWSE** and the Group button of an empty track creates a new Return Track.
- (4) **TEMPO / TAP**: When **TEMPO** is selected, the encoder controls the tempo of the Live Set. **TAP** (**SHIFT** + **TEMPO**) lets you tap in a tempo with your finger.
- (5) **LOOP**: **LOOP** (**SHIFT** + Page Right button) toggles the loop switch on or off.
- (6) **METRO** (**SHIFT** + Page Left button): Toggles the metronome on or off.
- (7) **REC**: Starts the recording for the selected clip. **SHIFT** + **REC** toggles the Session Record mode on or off (overdub recording for all clips playing on armed tracks).
- (8) **PLAY**: Starts or stops the playback of the Live Set.
- (9) **SHIFT**: Allows you to access the shift functions as indicated by the labels above buttons. Pressing **SHIFT** and the Group button of an empty track creates a new MIDI Track.
- (10) **SONG**: Toggles between Session View and Arrangement View.

4.2 Matrix and Note Input

The 8x8 click-pad matrix is where you play Ableton Live's Session view as well as the instruments in your Live Set by using various modes for entering notes into clips.



Matrix and note input controls on MASCHINE JAM

(1) **8x8 click-pad matrix:** Controls Session View and lets you enter notes into clips when the **STEP** / **PIANO ROLL** or **PAD MODE** / **KEYBOARD** modes are selected. Additional functions are available in the top row of the grid when pressing the **SHIFT** button.

- **UNDO:** Lets you undo the last edit in the Live Set.
- **REDO:** Lets you redo the last edit in the Live Set.
- **QUANT:** Quantizes the selected clip by 100%.

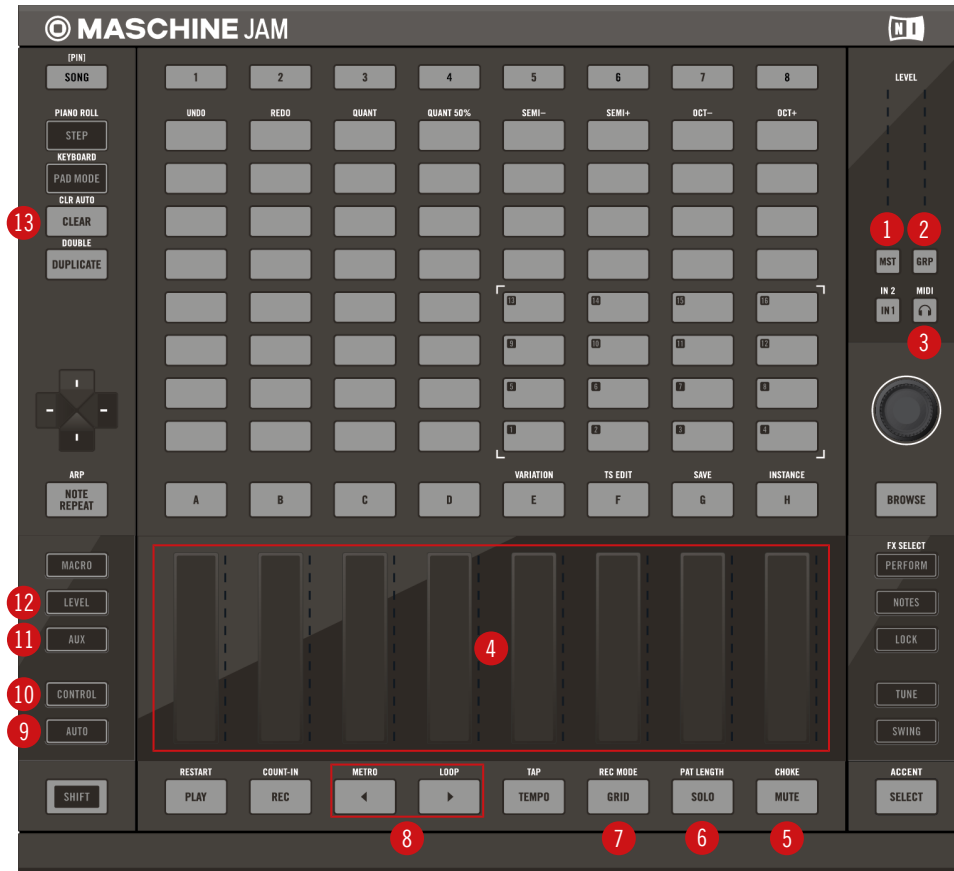
- **QUANT 50%:** Quantizes the selected clip by 50%.
 - **SEMI- / SEMI+:** If no note is selected in the current MIDI clip, these buttons shift all notes up or down by one semitone. Otherwise, only selected notes are shifted.
 - **OCT- / OCT+:** If no note is selected in the current MIDI clip, these buttons shift all notes up or down by one octave. Otherwise, only selected notes are shifted.
- (2) **Scene Buttons:** These buttons launch all clips in the corresponding scene.
- (3) **BROWSE:** Pressing **BROWSE** and a Group button stops the corresponding track.
- (4) **LOCK:** Restricts **PIANO ROLL** mode to monophonic input.
- (5) **PAT LENGTH (SHIFT + SOLO):** When enabled, the encoder controls the length of the selected clip.
- (6) **GRID:** When enabled, the encoder controls the Clip Quantize value.
- (7) **NOTE REPEAT:** Enables note repeat for **PAD MODE / KEYBOARD** mode. The encoder controls the note division for the repeats.
- (8) **D-Pad:** Steps through Session View in groups of eight clips in all directions. Press **SHIFT** to step through one clip at a time.
- (9) **DUPLICATE / DOUBLE:** Duplicates a track (**DUPLICATE** + Group button), a scene (**DUPLICATE** + Scene button) or a clip (**DUPLICATE** + Clip button). **DOUBLE (SHIFT + DUPLICATE)** doubles the length of the selected clip including its content.
- (10) **CLEAR / CLR AUTO:** Deletes a track (**CLEAR** + Group button), a scene (**CLEAR** + Scene button) or a clip (**CLEAR** + Clip button). **CLR AUTO (SHIFT + CLEAR)** clears the envelopes in the selected clip.
- (11) **PAD MODE / KEYBOARD:** Enables **PAD MODE** if the selected track is hosting a Drum Rack. Enables **KEYBOARD** mode if the selected track is hosting an Instrument.
- In **KEYBOARD** mode, the scale can be set with the D-Pad. Press left and right for setting the scale type. Press up and down for setting the root key. Pressing **SHIFT** + up / down shifts the root key by one octave.
- (12) **STEP / PIANO ROLL:** Enables **STEP** mode if the selected track is hosting a Drum Rack. Enables **PIANO ROLL** mode if the selected track is hosting an Instrument. In both modes, the clips are organized in pages that can be accessed by pressing the Scene buttons.

In **PIANO ROLL** mode, the root note is highlighted. The scale can be set with the D-Pad. Press left and right for setting the scale type. Press up and down for setting the root key. Pressing **SHIFT** + up / down shifts the root key by one octave.

In **STEP** mode, pressing **SHIFT** + D-Pad left / right sets the grid value. The lower left quadrant of the 8x8 click-pad matrix controls velocity for entered notes (lowest value in the lower left corner, highest value in the upper right corner).

4.3 Smart Strip and Mixing

The Smart Strips give you full control over the Live mixer as well as your instruments and effects.



Smart Strip and mixing controls on MASCHINE JAM

- (1) **MST**: When enabled, the encoder controls the Master level.
- (2) **GRP**: When enabled, the encoder controls the level of selected track.
- (3) **Headphone**: When enabled, the encoder controls the preview / cue level.
- (4) **Touch Strips**: The Touch Strips are used to control the Live mixer as well as device parameters, depending on the selected mode. Pressing **SHIFT** and using the Touch Strips allows for fine adjustments.

- **LEVEL**: The Touch Strips control the levels for each track.
 - **AUX**: The Touch Strips control the sends for each track.
 - **CONTROL**: The Touch Strips control device parameters for the selected track.
- (5) **MUTE**: When enabled, the Group buttons mute tracks.
- (6) **SOLO**: When enabled, the Group buttons solo tracks (press **SHIFT** to solo multiple tracks).
- (7) **REC MODE (SHIFT + GRID)**: When enabled, the Group buttons arm tracks for recording (press **SHIFT** to arm multiple tracks).
- (8) **Page buttons**: Used for parameter bank navigation in **CONTROL** mode by switching between banks of parameters of the selected device. By pressing **SELECT** + Page button, you can navigate between devices in the same device chain. By pressing **CONTROL** + Page button, you can switch to another device chain in a Rack.
- (10) **AUTO**: Writes modulation to the clip envelopes of the selected clip.
- (11) **CONTROL**: When enabled, the Touch Strips control device parameters for the selected track. Pressing **CONTROL** + D-Pad left / right navigates between devices. Pressing **CONTROL** + D-Pad up / down switches between banks of parameters of the selected device. Pressing **CONTROL** in **CONTROL** mode selects the first device chain in a Rack. Pressing **SHIFT** + **CONTROL** in **CONTROL** mode selects the parent Rack of the current device chain.
- (12) **AUX**: When enabled, the Touch Strips control the sends for each track. Pressing **AUX** again toggles between all available sends.
- (13) **LEVEL**: When enabled, the Touch Strips control the levels for each track. To control the panorama for each track, press **SHIFT** + **LEVEL**.
- (14) **CLR AUTO**: Clears the envelopes in the selected clip.