Learning DigiShow

4

Common Operations

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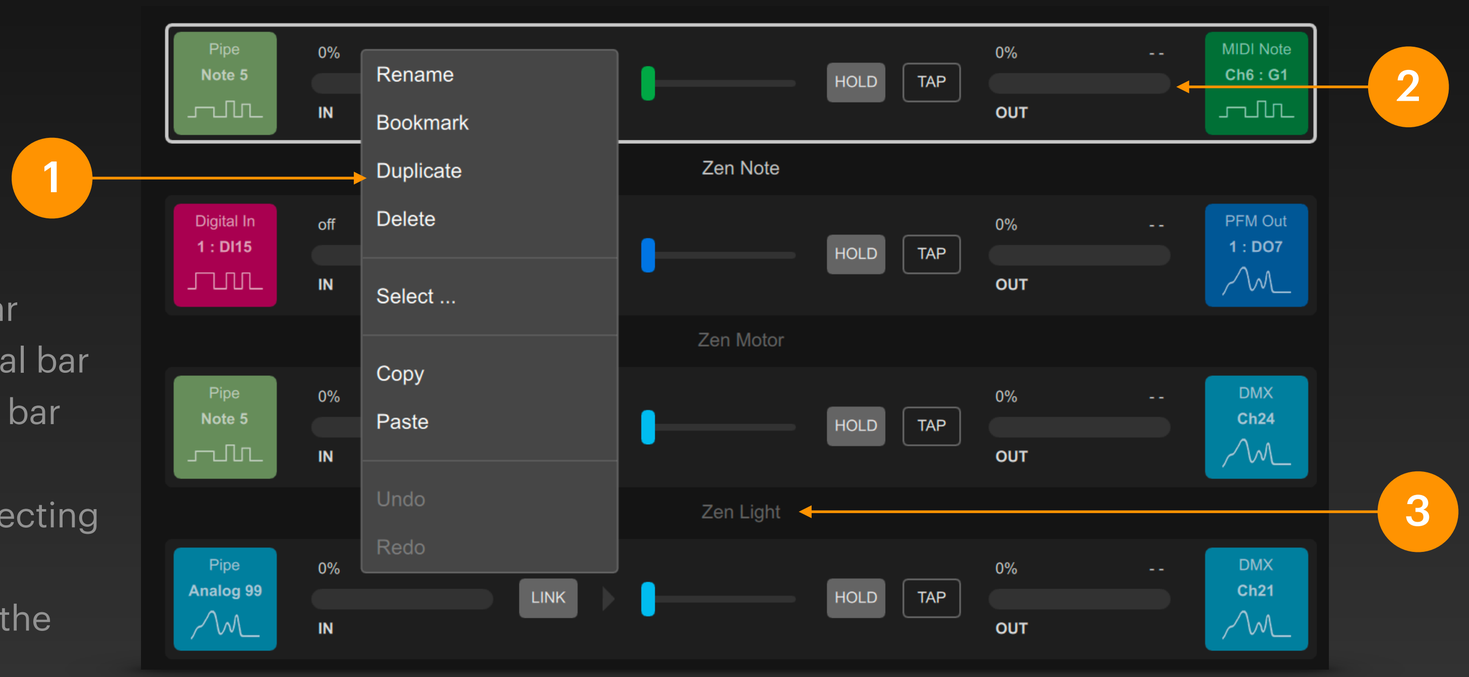
Management of Signal Link Table

Management of Signal Link Table

When the signal link table contains many signal bars, it is necessary to frequently organize the signal bars in the table, such as: moving, copying, renaming, classifying, etc.

Right-click on the signal bar (or long-press the left mouse button) to pop up a menu, select a menu item:

Rename to rename the signal bar
Bookmark to bookmark the signal bar
Duplicate to make a copy of the bar
Delete to delete the signal bar
Select to enter the mode for selecting multiple signal bars
Copy / Paste to copy and paste the signal bar



Use the mouse to drag any signal bar to move its position in the table

Double-click the name label below the signal bar to modify it directly

Multiple Signal Bar Selection

After entering the multi-select mode, you can copy, move, and delete signal bars in batches.

Enter Multi-Select mode:
Right-click a signal bar and choose "Select..." from the context menu. Checkboxes will appear beside each signal bar for selection.

Function buttons (appear at the bottom of the table):
Select All – Checks all signal bars
Select None – Unchecks all signal bars
Copy – Copies the checked bars for pasting elsewhere in the table or another project
Duplicate – Creates copies of the checked bars
Delete – Removes the checked bars
Move – Moves the checked bars below the currently selected signal bar

Click ⊗ button to exit the multi-select mode

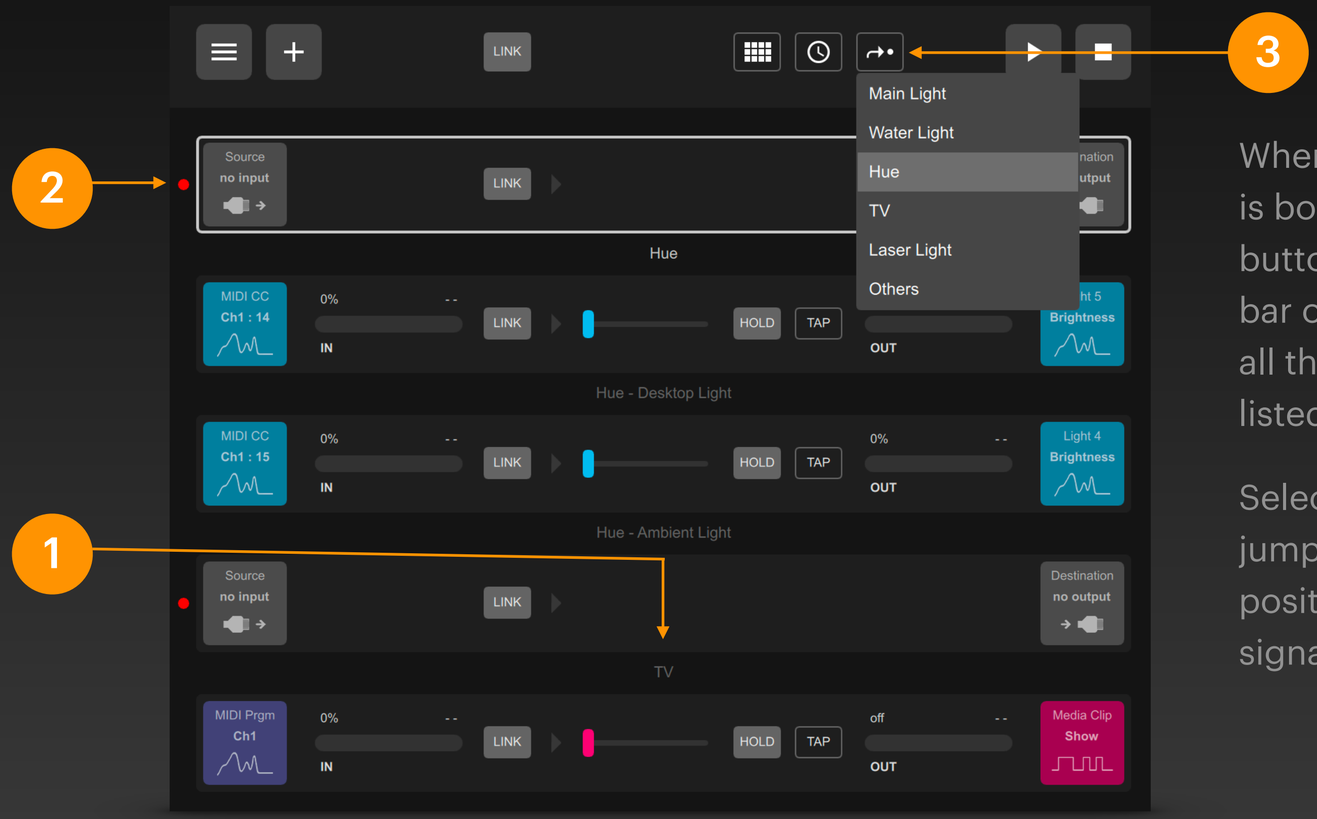
Shortcuts: press Ctrl-A to select all; hold Ctrl while clicking to select multiple bars; hold Shift while clicking to select a contiguous range. (Use Cmd ⌘ instead of Ctrl on Mac)

Signal Bar Bookmark

When a large number of signal bars need to be grouped and classified, we can use the bookmark function to achieve it flexibly.

Right-click the signal bar and select Bookmark in the pop-up menu. A small red dot will appear on the left end of the signal bar, indicating that the signal bar has been bookmarked.

Usually you can create some blank signal bars in the table to separate signal bars of different categories in the table, and add text labels by naming the signal bars.



When a signal bar in the table is bookmarked, this bookmark button will appear in the top bar of the window. Click it and all the bookmark items will be listed in the pop-up menu.

Select one of them to quickly jump to the corresponding position of the bookmark in the signal link table.

Keyboard,
Sound Card and Screen

Computer Built-in Interface

While the DigiShow software has the ability to communicate with external hardware devices for input and output, it also has built-in interfaces to support the computer's own keyboard, sound card and screen. Although these interfaces are not the key features of DigiShow, they are often used for testing and experiments.

Hot Key
Interface

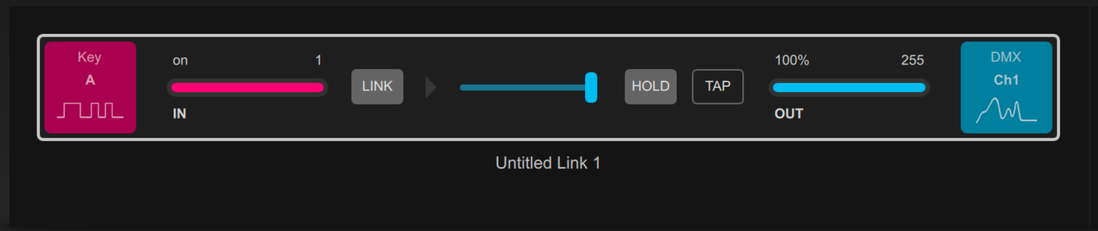
Audio Input
Interface

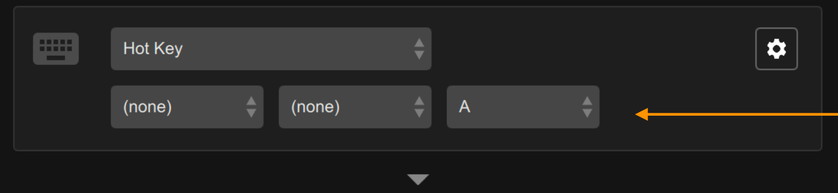
Audio Player
Interface

Screen Presentation
Interface

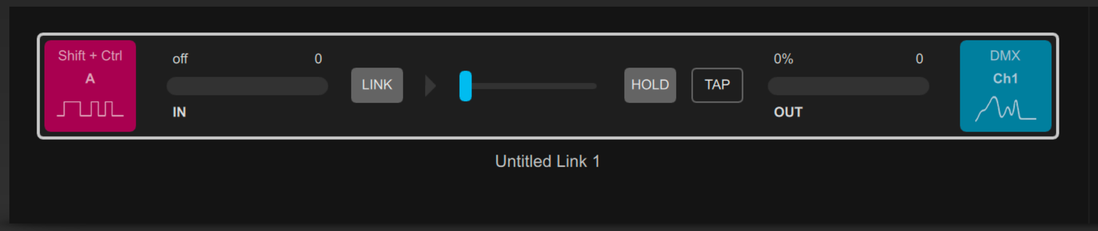
Hot Key - Signal Input

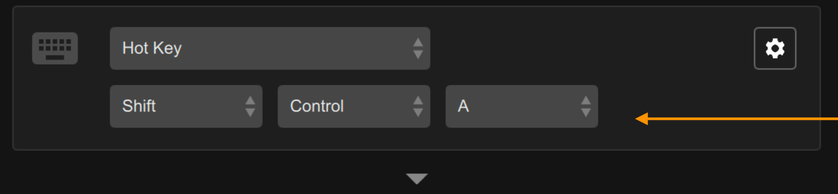
In any DigiShow project, the Hot Key interface can be used to receive the binary signal corresponding to the keyboard input. Set the input end of the signal bar to Hot Key. When the user presses the specified single key or shortcut keys on the keyboard, the state of the input signal end will turn ON, and the state will return to OFF after releasing the key.





Set the hotkey to single key A



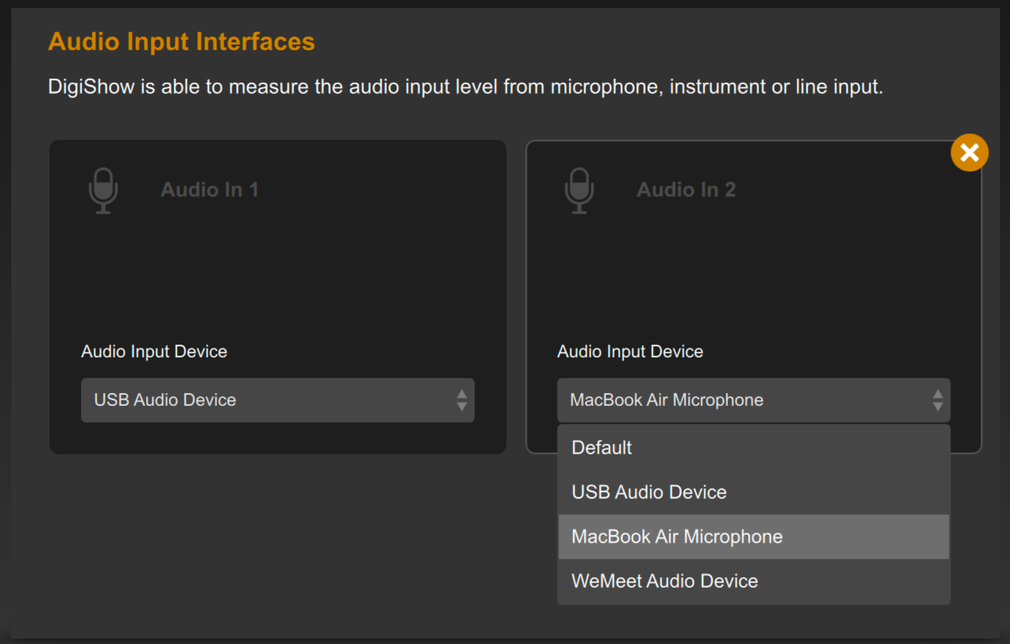


Set the hotkey to the key combination Shift-Ctrl-A

Once DigiShow is started, hotkey response has the highest priority of the operating system. No matter which foreground application you are using on your computer, DigiShow will preempt the keystrokes received.

Audio Input - Interface Configuration

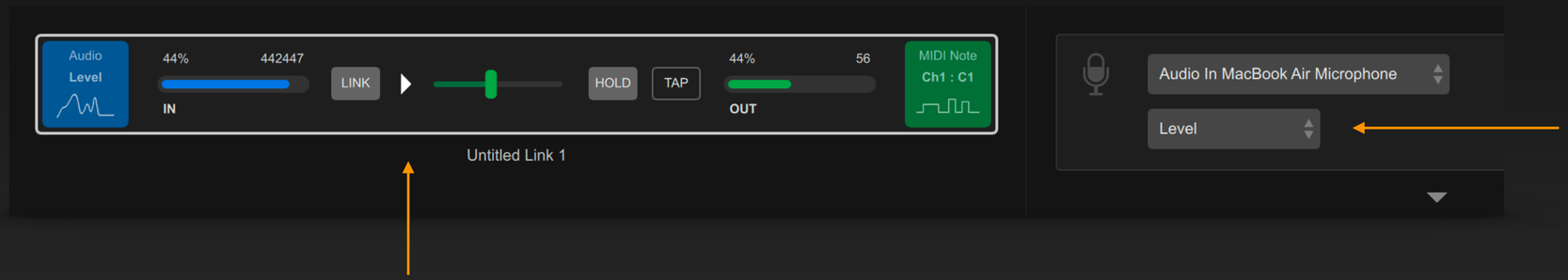
Audio input can come from the computer's built-in microphone or a microphone (or pickup, line input, etc.) connected via an external USB sound card. Users can add audio input interfaces to the current project in the Audio section of the Interface Manager.



DigiShow can support multiple audio inputs at the same time, such as connecting multiple patch microphones through multiple USB sound cards to simultaneously receive vibration trigger signals from different sources.

Audio Input - Signal Input

In the signal link table, set the input end of the signal bar to Audio Input. When the computer recognizes the level change of the audio input, the analog value of the input signal end will change.



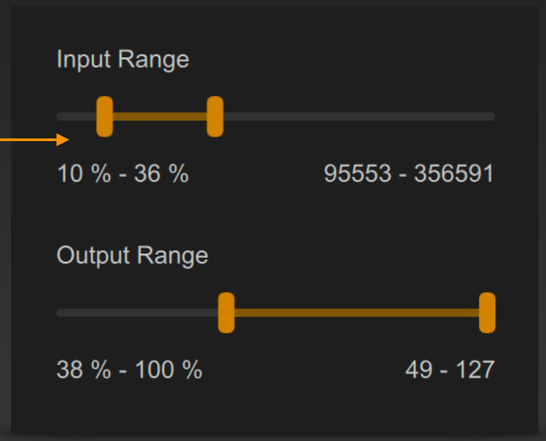
In this example, we map the level changes of the audio input into MIDI Note signals.

More Audio Input Type Options:

Level (dB): Values follow a logarithmic scale, providing higher sensitivity to subtle signals.

Peak Level: More responsive to transient signals, such as drum hits.

Spectrum: Monitors signal variations within specific frequency bands (e.g., different instrumental sections).

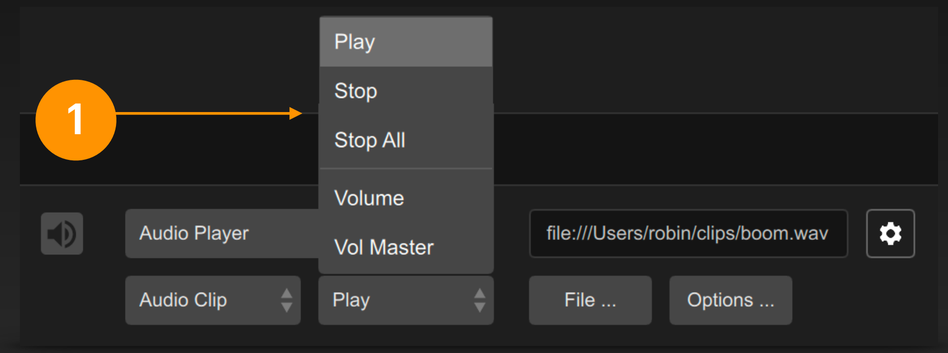


Audio input signals usually have some background noise. By setting the input lower limit, the noise can be filtered out. That is, only signal fluctuations that exceed the input lower limit will trigger the conversion into Note.

When the value of the audio input analog signal is between the input lower and upper limits, the output Note velocity will correspond to the value range defined in the output lower and upper limits.

Audio Player - Signal Output

In any DigiShow project, you can control audio output through the audio player interface. In the signal link table, set the output end of the signal bar to Audio Player, and we can achieve flexible playback and volume control.



The signal bar output is set to Audio Clip mode, and click the File... button to specify the audio file to be played. Now, you can select a control channel such as Play or Stop to connect to a binary signal output; you can also select the Volume control channel to connect to an analog signal output.

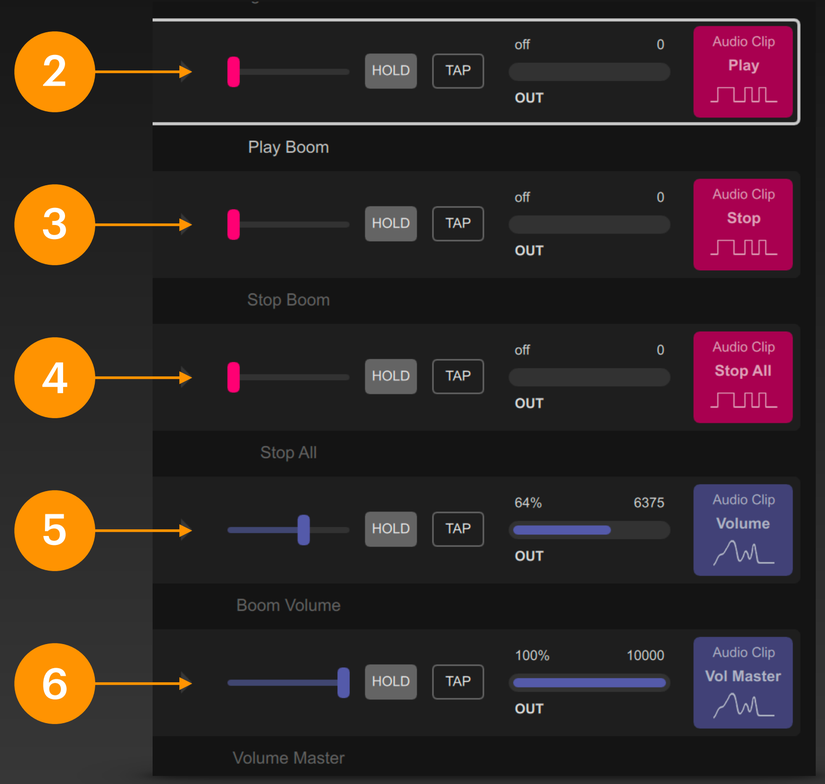
Play: clicking TAP to play the specified audio clip

Stop: clicking TAP to stop the specified audio clip

Stop All: clicking TAP to stop all audio playback

Volume: moving the fader to adjust the specified volume

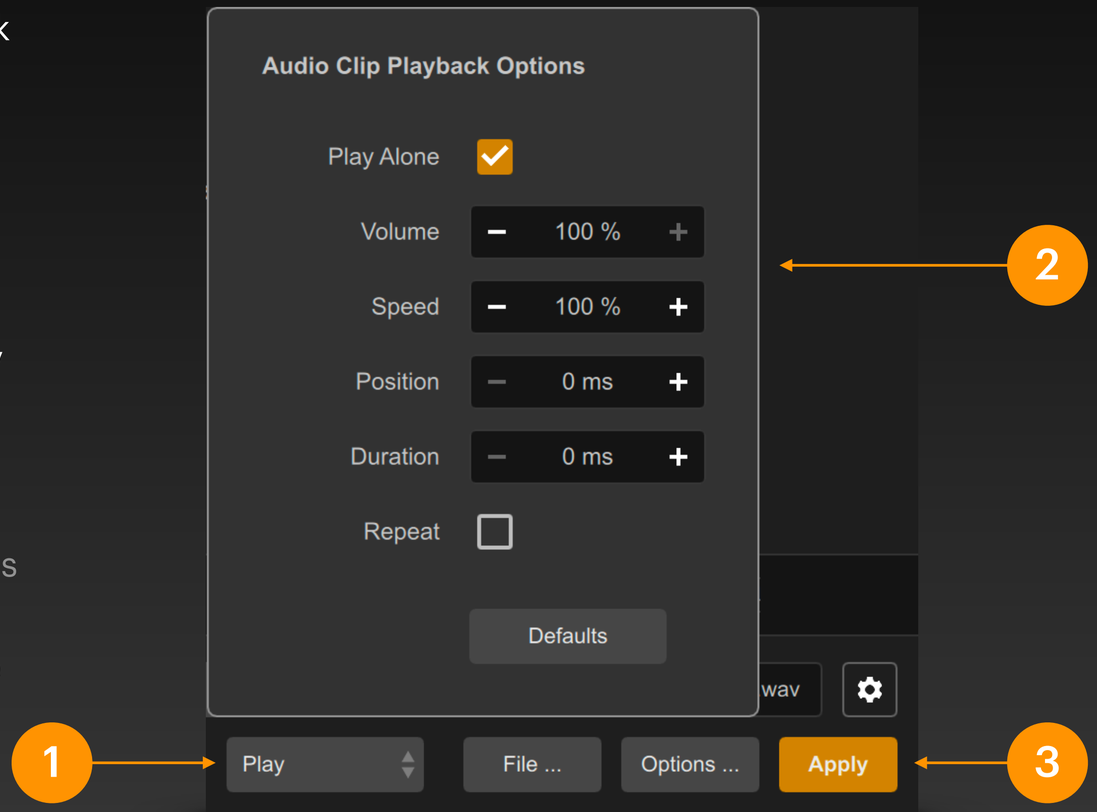
Vol Master: moving the fader to adjust the volume master



Audio Player - Signal Output

Audio clip playback options

After selecting Play control, you can click the Options... button to set optional parameters for the audio clip being played in the pop-up panel.



Play Alone
The audio output device plays only the specified audio clip. That is, once this clip is played, any other audio clips currently playing will stop immediately.

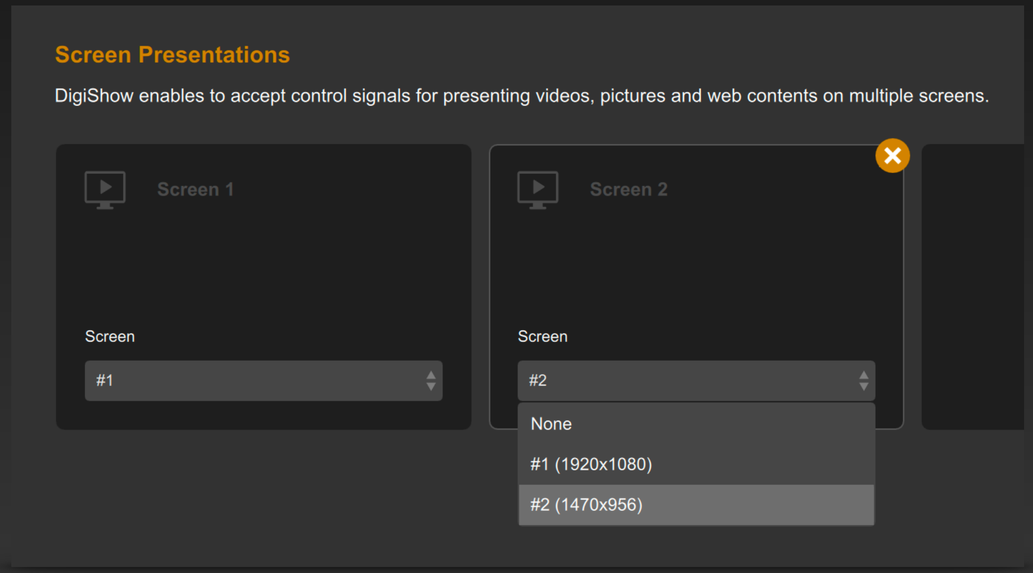
Volume (audio playback volume)
Speed (audio playback rate)
Position (initial playback position in milliseconds)
Duration (playback duration in milliseconds)

Repeat (specify to play in a loop)
If you specify loop playback, you need to specify the playback duration parameter

After finishing modifying the options, click anywhere outside the options panel to close the panel. Also click the Apply button at this time.

Screen Presentation - Interface Configuration

The screen presentation interface provided by DigiShow allows you to dynamically display media content such as pictures, videos, and web pages on the computer screen through control commands. Users can add a screen presentation interface to the current project in the Screen section of the Interface Manager.

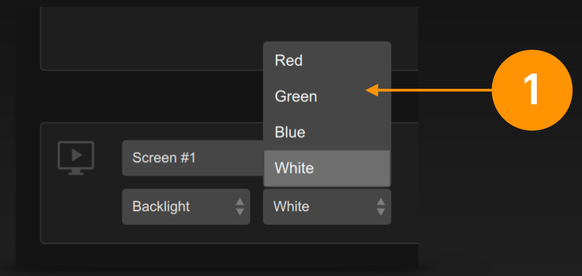


Each screen presentation interface can be assigned to a different screen

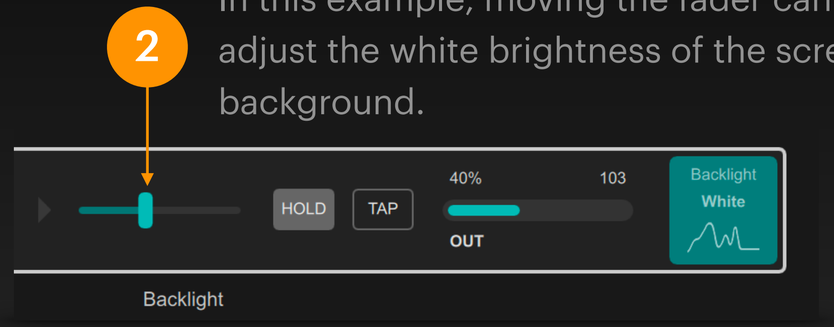
DigiShow can support multiple screens at the same time, such as playing synchronized video images or dynamic web content through multiple projectors at the same time.

Screen Presentation Signal Output

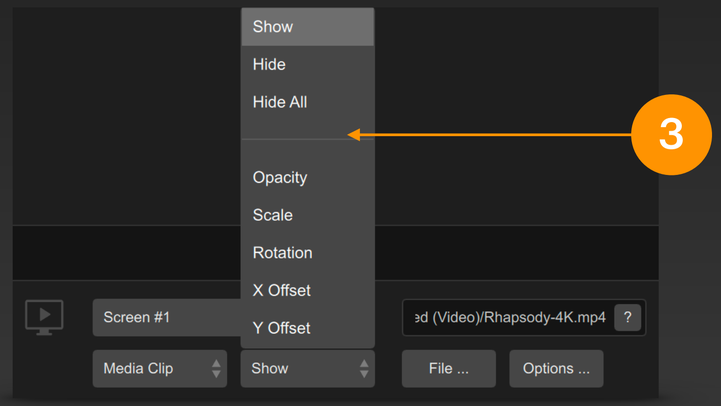
In the signal link table, set the output end of the signal bar to Screen. We can achieve dynamic adjustment of screen parameters and flexible display of media content by connecting a series of control channels.



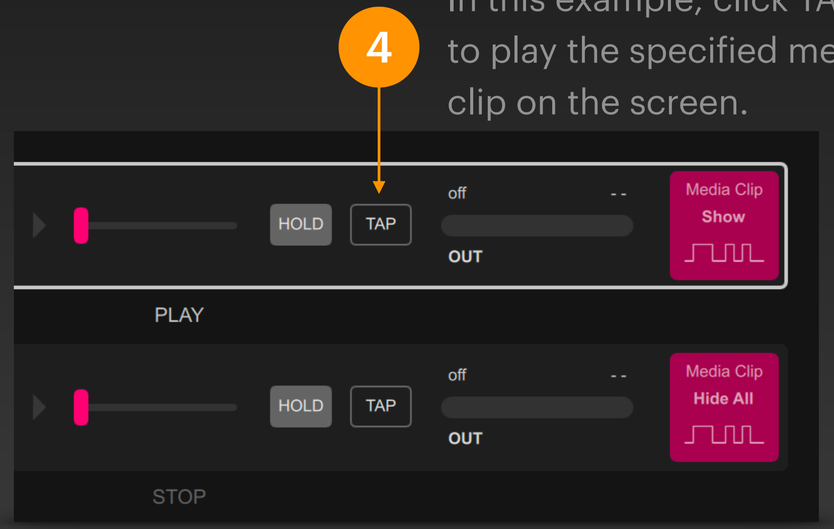
When the signal bar output is set to Screen interface and Backlight mode, you can select four analog channels of red, green, blue and white to adjust the background color of the screen.



In this example, moving the fader can adjust the white brightness of the screen background.



After the signal bar output is set to Media Clip mode, you can click the File... button to select a media file for screen display, or directly enter the address of a dynamic web page for screen display in the text box. Then you can select control channels such as Show or Hide to connect to binary type signal output; you can also select control channels such as Opacity, Scale, etc. to connect to analog type signal output.



In this example, click TAP to play the specified media clip on the screen.

Screen Presentation Signal Output

Media clip display options

Opacity
Scale
Rotation
X Offset
Y Offset

Fade In
Set the number of milliseconds it takes for a media clip to appear on the screen and fade in until it is fully displayed.

These parameters are used to set various display properties of media clips when they appear on the screen.

Show Alone
Only the specified media clip is displayed on the screen, that is, once the clip is displayed, any other media clips that have appeared on the screen before will be hidden.

Repeat
For video media, you can specify whether to play in a loop.

Volume (video playback volume)
Speed (video playback speed)
Position (video playback position)
These parameters are used to set various playback properties of video-type media clips when they appear on the screen.

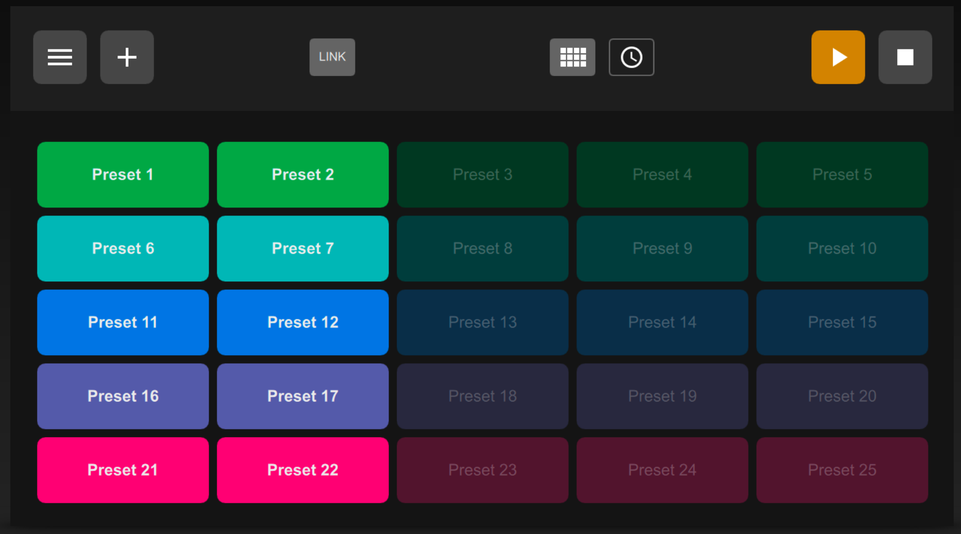
Run Java Script
For web page type media materials, you can enter a line of JS script program in this text box, and the script program will be automatically executed after the page is loaded and displayed on the screen.

After selecting Media Clip mode and Show control, you can click the Options... button to set optional parameters for the media clip to be displayed in the pop-up panel.

After finishing modifying the options, click anywhere outside the options panel to close the panel. Also click the Apply button at this time.

Preset Launcher

Preset Launcher

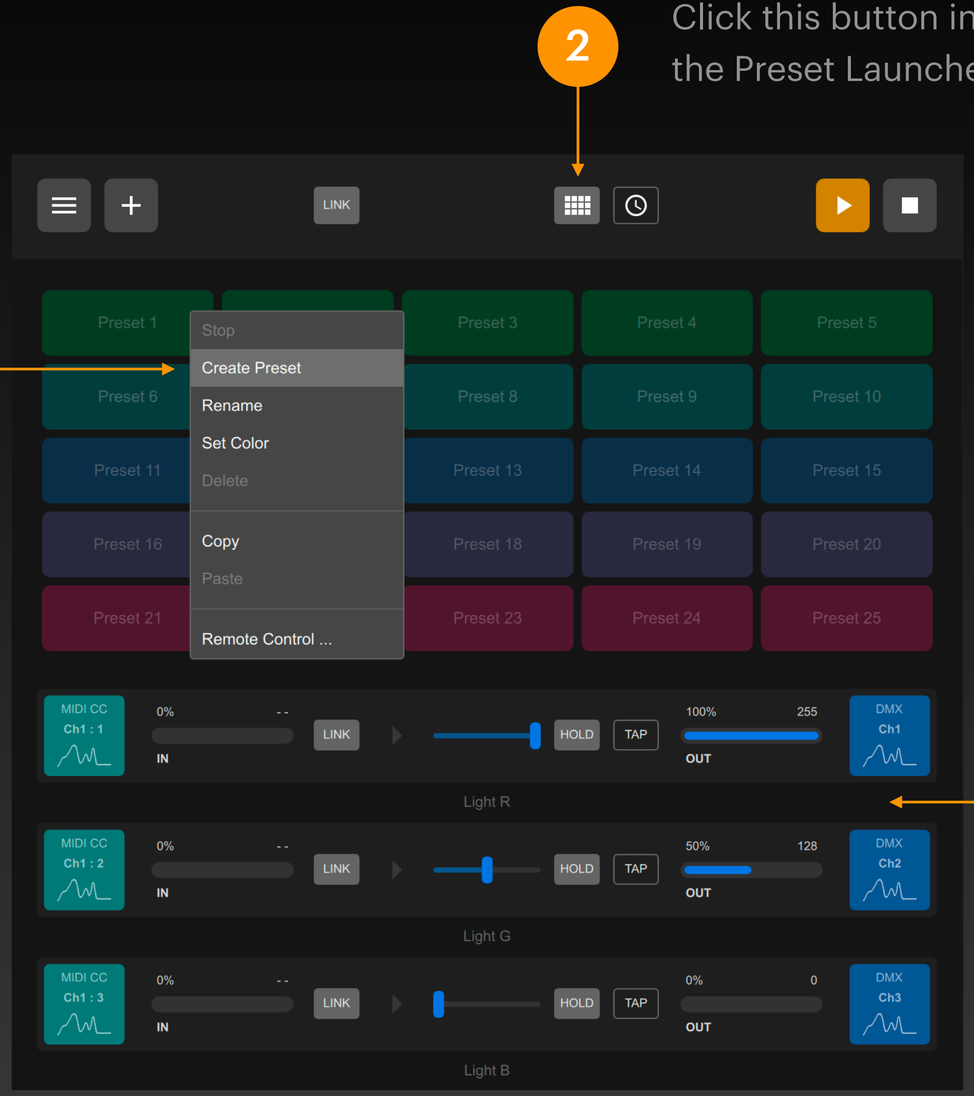


The user can memorize the signal output values and LINK status of each signal bar into the selected Preset. Each Preset corresponds to a button in the Preset Launcher. When the button is clicked, the signal output values and LINK status memorized in the Preset will be restored immediately.

The preset launcher also provides a signal interface that can be connected to the output of the signal bar and use other linked signals to trigger the launch of a specific preset.

Create Preset

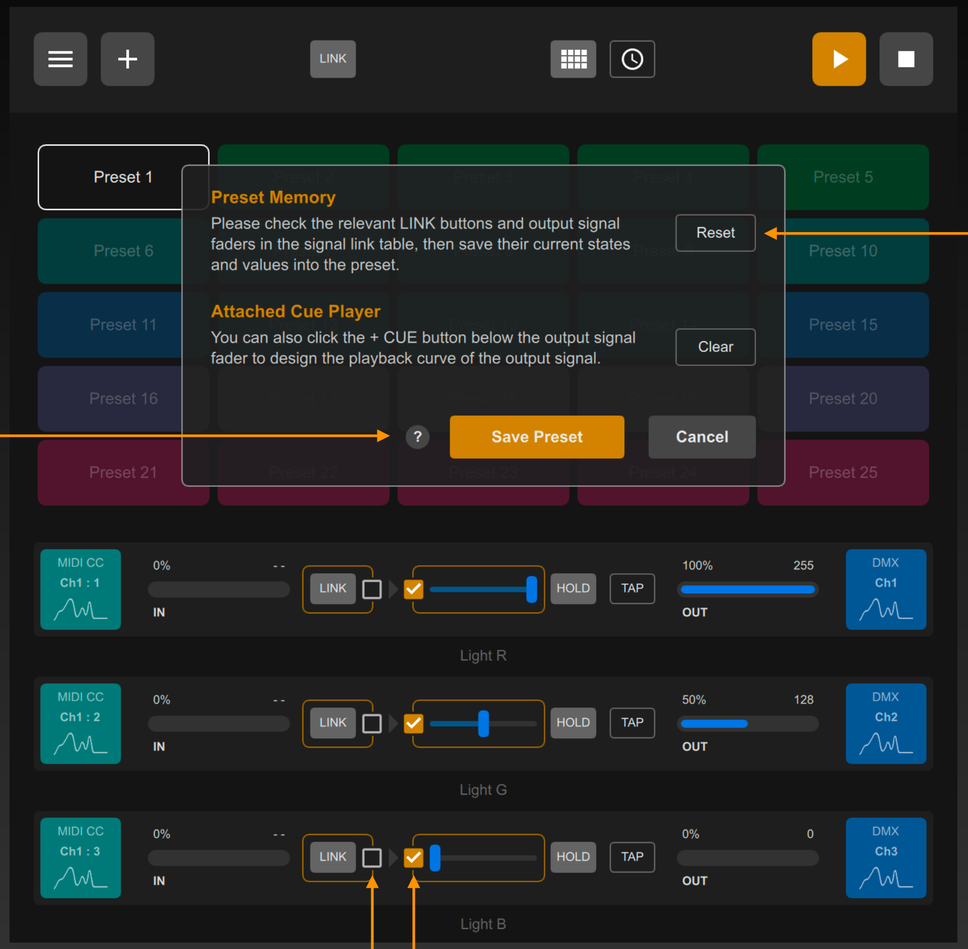
Click this button in the top bar to display the Preset Launcher panel



In the Preset Launcher panel, select a Preset button, right-click (or long-press the left mouse button), and select Create Preset from the pop-up menu.

Create several signal bars in the signal link table. In this example, there are three signal bars Light R, Light G, and Light B, which are used to control the red, green, and blue dimming channels of the full-color light.

Create Preset



Click the Save Preset button to save the selected items in Preset 1.

6

In this example, the output values of the three dimming channels of the three signal bars Light R, Light G, and Light B are memorized in the preset.

5

Click the Reset button in the pop-up box to quickly uncheck all items in the signal table

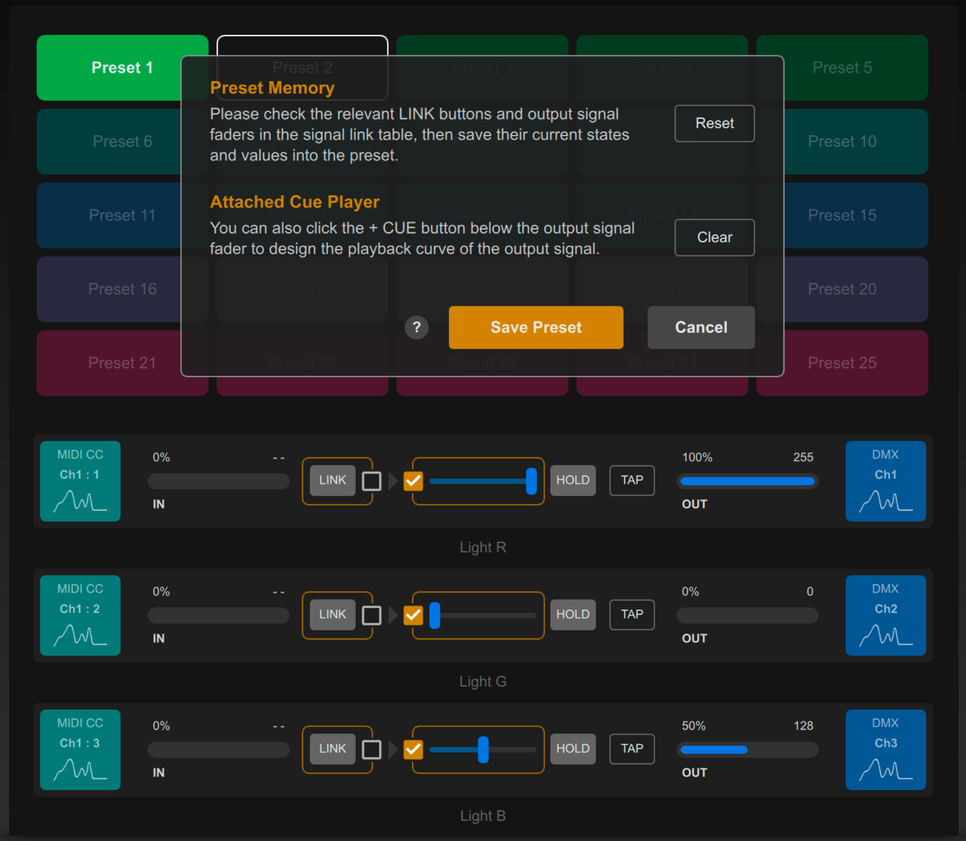
4

Please check the items in the signal bars that you want to memorize into the Preset

These checkboxes are used to mark the LINK states that need to be memorized.

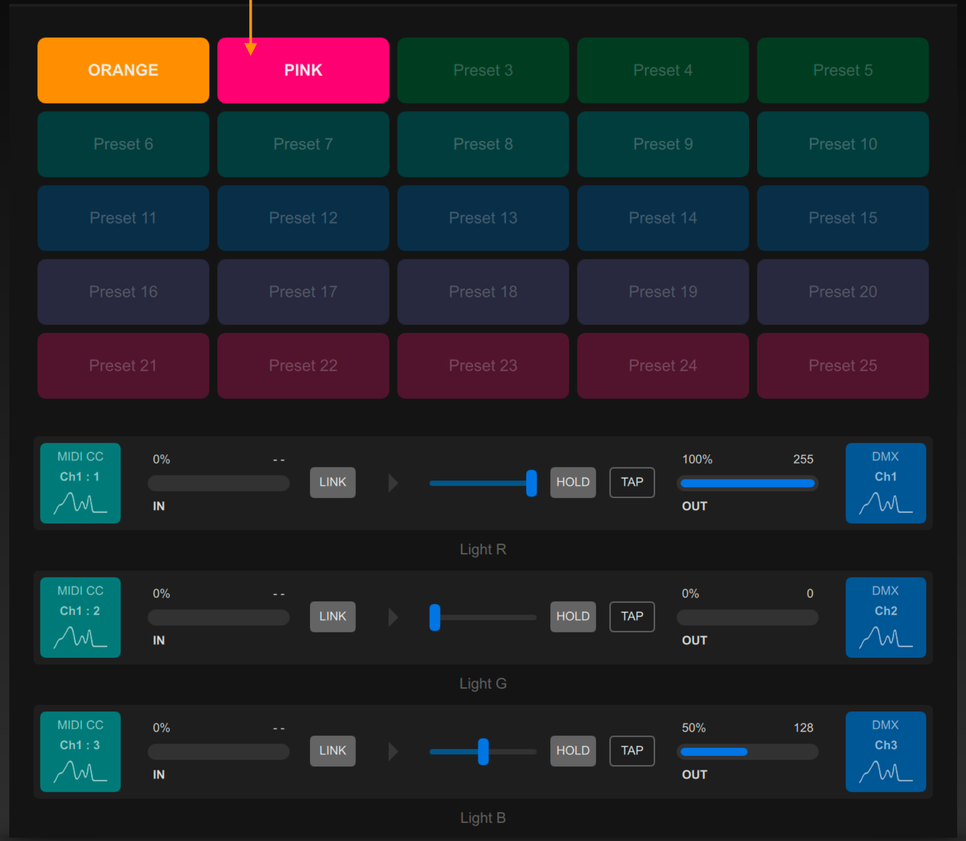
These checkboxes are used to mark output signal values that need to be memorized.

Create Preset



7 After modifying the output signal values in each signal bar, use the same method to memorize these output signal values to another preset named Preset 2.

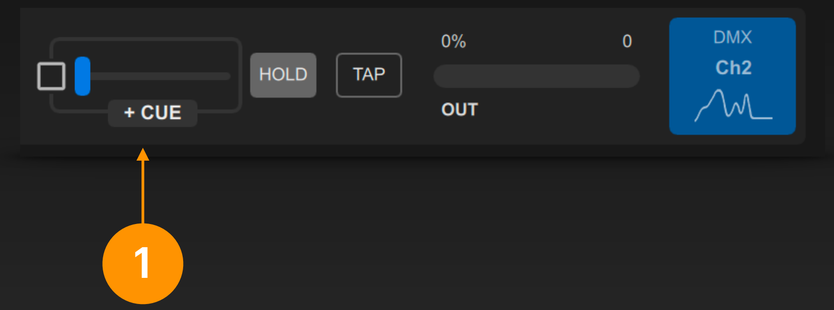
Right-click (or long press the left mouse button) and select Rename or Set Color in the pop-up context menu to rename or change the color of the Preset button.



8 For easier identification, you can change the name and button color for Preset 1 and Preset 2.
Click the button to restore the memorized signal output.

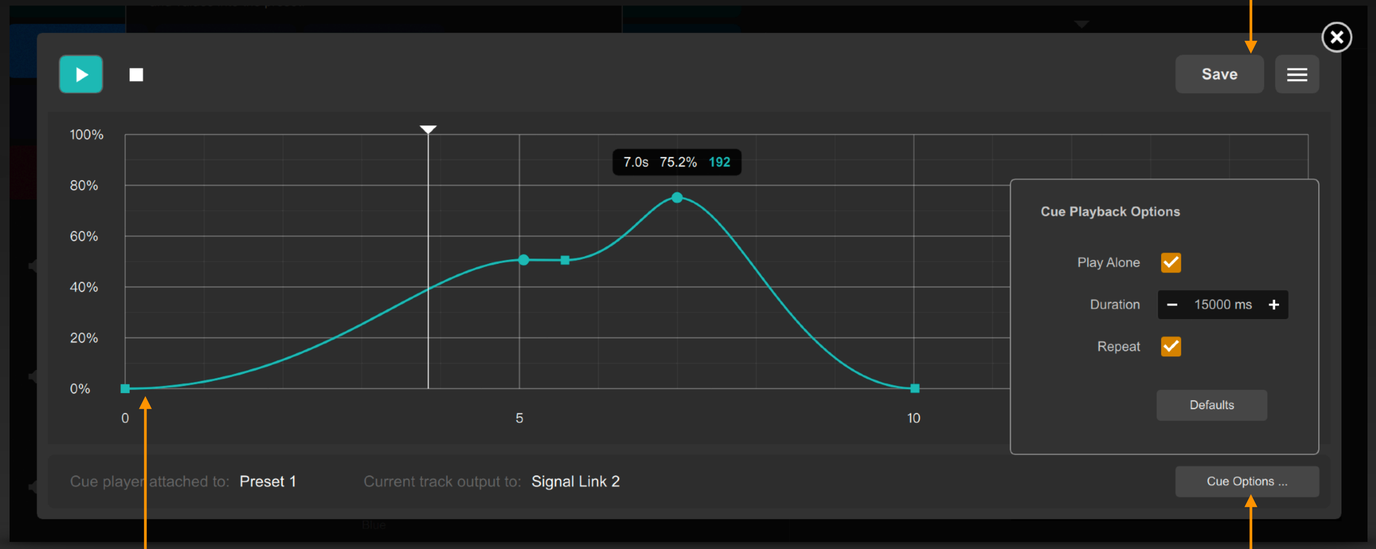
Cue Player

For specific scenes, save output values in the grouped signal bars as Presets. Also, store timeline-based signal output curves in the Cue Player.



1

When editing the preset, you'll notice a +CUE button appears below the fader in each signal bar. Click this button to display the timeline editing window of the Cue Player.



2

Click on the lines in the chart to add polyline control points (right-click for Bezier curves), and drag the control points to design an output variation curve for the current signal bar.

3

When finished, click the Save button and close the timeline editing window.

4

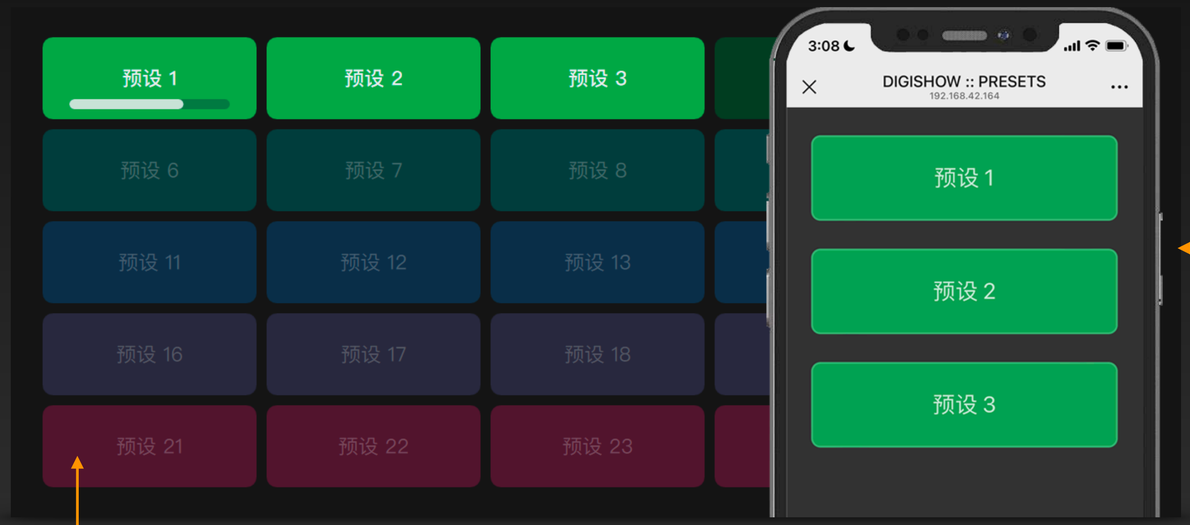
Follow this method to complete the output curve design on multiple signal bars (such as red, green, and blue lights), and then click "Save Preset". After that, clicking this preset button will start the Cue player to implement the multi-track dynamic dimming program we just designed.

5

If you want the launched program content to play in a loop, click Cue Options in the bottom-right corner of the timeline editing window and check Repeat.

Preset Launcher - Remote Control

You can click buttons in the Preset Launcher at any time to start various pre-designed scenes. During performance, you might want to launch presets through your phone or tablet .....



1

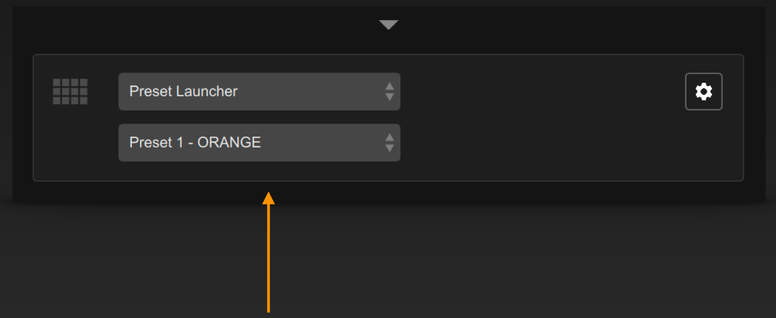
In the Preset Launcher, right-click any preset button, select Remote Control from the popup context menu, and click the Start button.

2

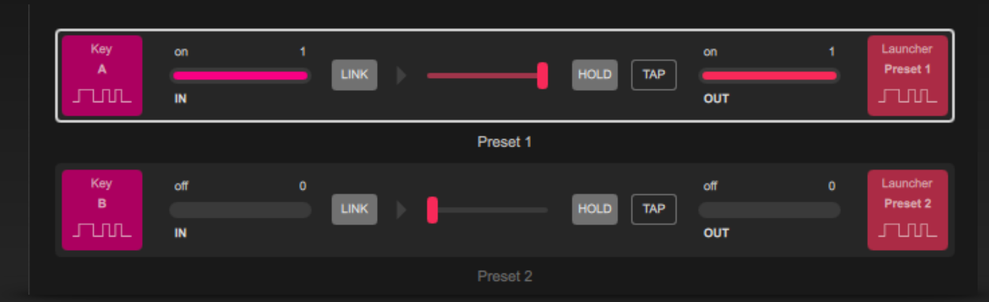
Take out your phone and scan the QR code on the screen. Make sure your phone is using the same local network WiFi as your computer, and a page showing the same preset buttons will appear on your phone. Pressing buttons on your phone will have the same effect as on your computer.

Preset Launcher Interface

The Preset you created not only appears on the button in the Preset Launcher panel, but also appears in the signal channel of the Preset Launcher interface.



Select the Preset Launcher interface at the output end of the signal bar, and the presets you created before will be listed as a group of control channels. Select one of them, and it will be mapped to a binary output signal to trigger the start of this preset.



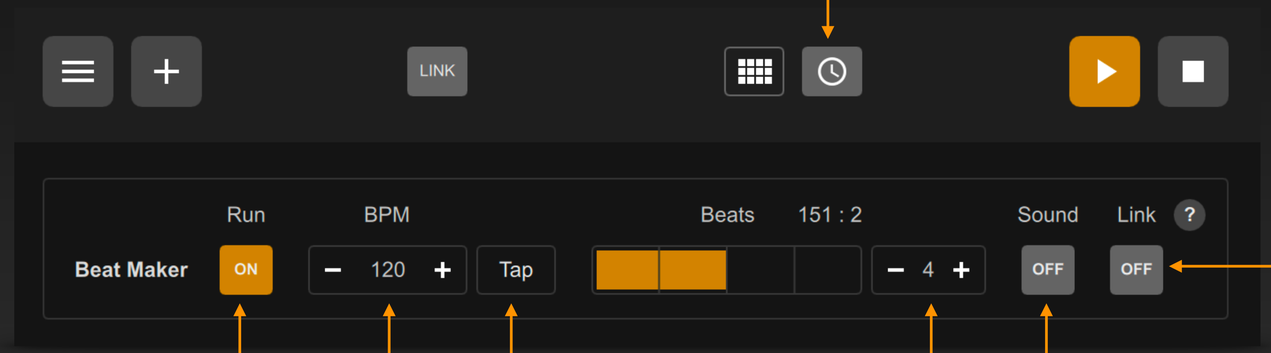
In this example, press key A on the keyboard to activate Preset 1, and press key B on the keyboard to activate Preset 2.

In this way, the signal bar with Preset Launcher output can also be referenced by other Presets to achieve more complex multi-level triggering.

Beat Maker

Beat Maker

Beat Maker can be used to generate time-based beat signals in DigiShow software. Beats can be used as signal input to trigger various dynamic signal outputs.



1 Click this button in the top bar to display the Beat Maker panel

2 Click this button to ON, enable the Beat Maker

3 Display and adjust the BPM (beats per minute) speed of the generated beats

4 You can follow the beat of the music and click the Tap button several times to automatically calculate the BPM.

5 Display and adjust the number of beats per loop

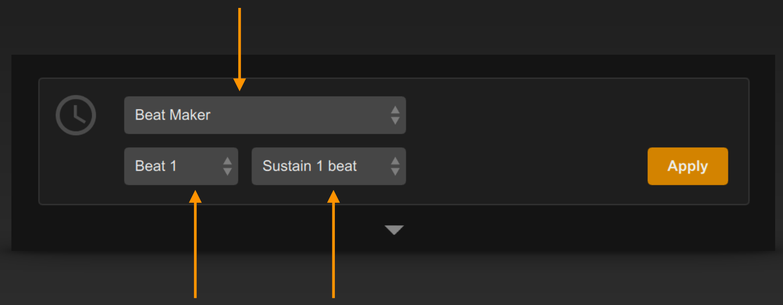
6 Click this button to ON, it will beep when beating.

7 When this button is turned ON, the Beat Maker will keep the beat in sync with Ableton Live and any external software or hardware that supports Ableton Link.

Beat Maker Interface

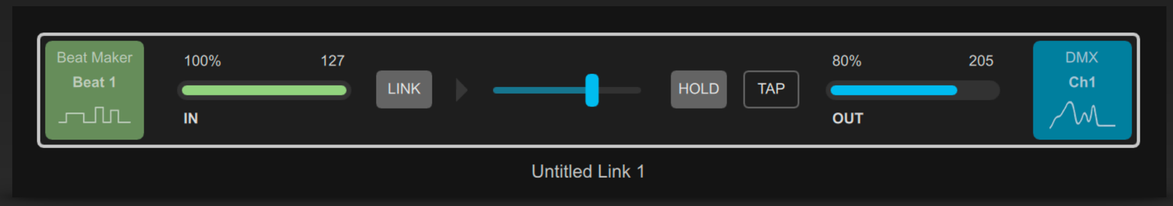
In the signal link table, the interface provided by the beat maker can be set as the input end of the signal link. When the beat maker is enabled, the generated beat will be continuously and periodically sent out from the signal bar input end in the form of a Note signal, thereby driving the signal change of the linked output end.

Select the Beat Maker interface at the input end of the signal bar



Set the beat number for which the beat maker emits a beat note signal in each loop

Set how long the note signal should last (in beats)

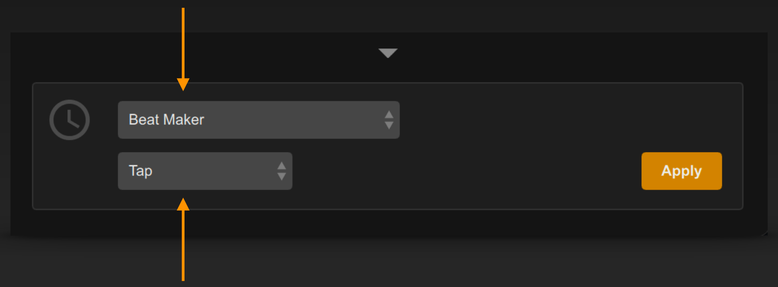


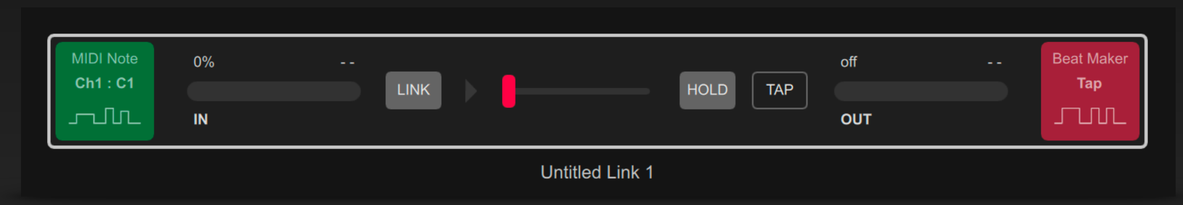
As in this example, the note generated by the beat maker drives the light to continuously alternate between light and dark (breathing light).

Beat Maker Interface

The interface provided by the beat maker can also be set as the output end of the signal link, which is used to dynamically change the setting parameters of the beat maker according to the changes of the linked input signal.

Select the Beat Maker interface at the output end of the signal bar





Select the control channel:

BPM Change Dynamically change the BPM number by an analog signal

Quantum Change Dynamically change the number of beats per measure by an analog signal

Run ON Start/stop the beat maker by a binary signal

Link ON Start/stop Ableton Link sync by a binary signal

Tap Trigger the tap action by a binary signal for dynamic BPM calculation

In this example, the input MIDI Kick drum note dynamically triggers the beat maker's TAP action, thereby dynamically updating the BPM speed.

Summary

- Learn to manage signal bars in the signal link table
- Learn to use the interfaces of keyboard, sound card, and screen
- Learn to use Preset Launcher
- Learn to use Beat Maker