



**SOUND
PARTICLES**

AUDIOMATRIX

AudioMatrix

Reference Manual

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Welcome Note



Audio tools come in multiple sizes and shapes. Sometimes, it's a tool that changes audio in a beautiful way. Others can bring a lot of value in many other ways, e.g., allow us to be more productive, to save time, or simply by opening the door to a new world of possibilities. AudioMatrix is one of those tools. Its core goal is quite simple: giving you a lot of flexibility in terms of audio routing. But that opens many possibilities: a quick Mid-Side conversion tool, a quick upmixing/downmixing tool, a temporary way to bring sound to the center channel for quick fixes, etc. Since I've started to test AudioMatrix, every day I find a new use case for this plugin. It may not be "fancy" but will definitely be useful!

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Introduction

We are thrilled to present you AudioMatrix - a channel routing utility plugin. Say goodbye to complexity and experience a smoother, more efficient audio production process with AudioMatrix by your side. Your audio engineering tasks are now simplified, allowing you to focus on unleashing your creative potential with ease.

Audio routing plugin is designed to empower all sound professionals.

The possibility of creating fully customizable channel routings is our goal. Designed to meet the needs of the future, AudioMatrix opens up a new world of possibilities to design the perfect sound, through a matrix that can be fully customizable by the user, making it the perfect tool for everyone working in professional audio.

We encourage you to dive into the manual and explore all that AudioMatrix has to offer.

Overview

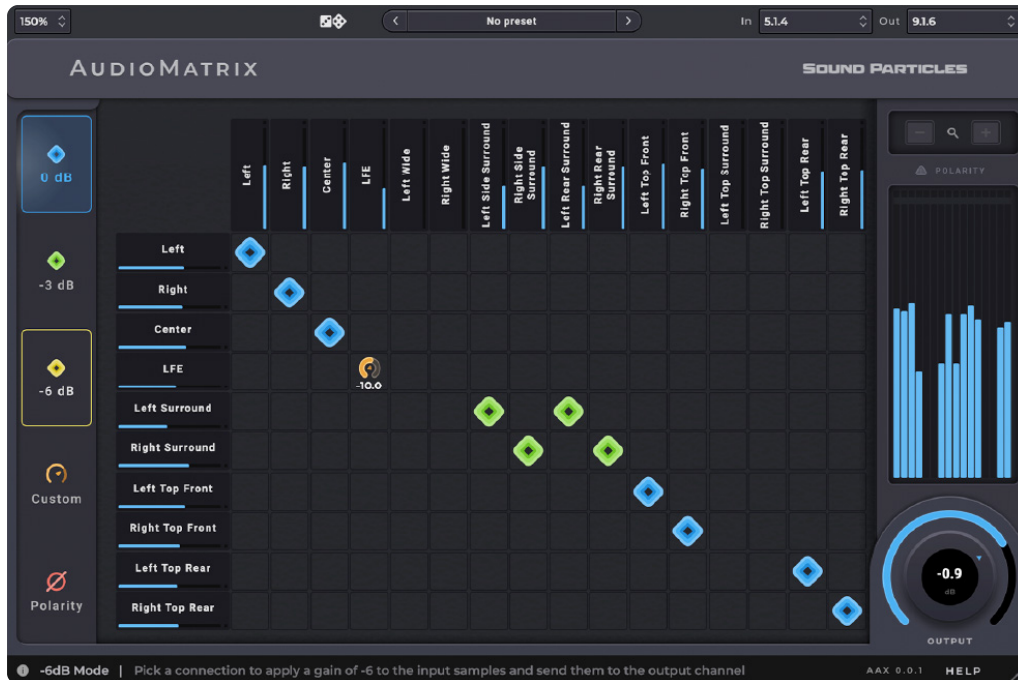


Figure 1. AudioMatrix Overview

AudioMatrix is a simple and powerful matrix designed to be easy-to-use and practical while providing all the channel routings you need to get your own custom sound. When you open the plugin, you will see that it is divided into three panels: a Left Panel, a Matrix Panel and a Right Panel.

The Left Panel has the possibility to choose different Audio Gains and polarity option:

1. 0 dBs
2. -3 dBs
3. -6 dBs
4. Custom gain
5. Polarity

The Center Panel has the information about your Inputs and Outputs on matrix, left column represents the inputs and upper row the outputs.

On the Right Panel you can choose between the following options:

1. Zoom window
2. Polarity indicator

3. VU Meter**4. Output Volume Control**

In the next section of this document, you'll find a detailed description of each page and its specific features.

Top Bar

The AudioMatrix's top bar incorporates a set of features that can assist you while using the plugin, such as scaling the window, randomizing parameters, managing presets and control the settings of the inputs and outputs to help you improve the overall plugin experience.

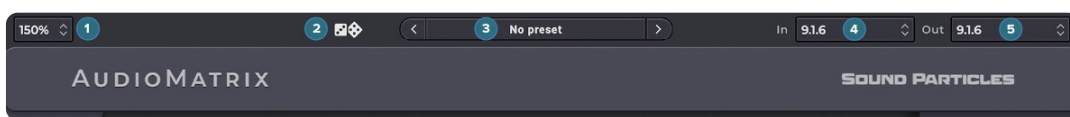


Figure 2. Top Bar

In the top bar you will find the following options:

GUI Zoom - The AudioMatrix's GUI can be resized. The pop-up available in the upper-left part of the interface lets users choose a scaling value from 25% to 400%. This action affects only the currently selected AudioMatrix's instance. New instances of the plugin will open with the default size factor (100%).

Randomize - This button will generate random presets, allowing you to have endless presets. If you are looking for happy accidents, this feature is for you. Sometimes you may have bad presets, other times you may have a diamond in the rough. On the right side, there is a pop-up menu that allows you to lock some of the modules.

Preset Navigator - Allows users to navigate through the previous and next preset using the arrows placed on the left and right of the Preset pop-up menu. Clicking on it will open the presets list.

Input Format - Choose the right input format for your track, between the following options:

- Mono
- Stereo
- Custom
- LCR
- LCRS

- Quad
- 4.0
- 5.0
- 5.1
- 6.1
- 7.0
- 7.1
- 9.0
- 9.1
- 5.0.2
- 5.1.2
- 5.0.4
- 5.1.4
- 7.0.2
- 7.1.2
- 7.0.4
- 7.1.4
- 9.1
- 7.0.6
- 7.1.6
- 9.1.2
- 9.1.4
- 9.1.6
- 9.0.8
- 9.1.8
- 11.1.8

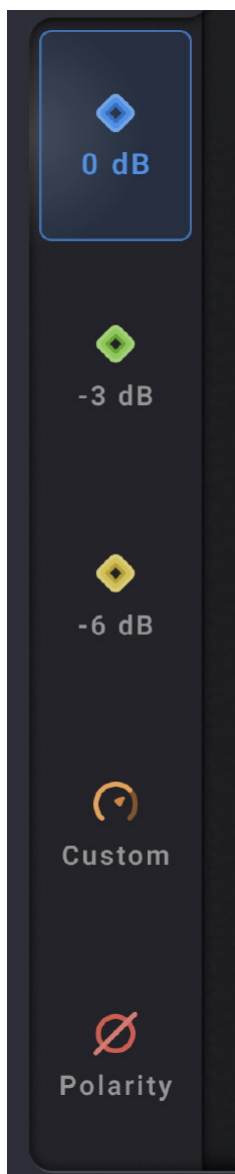
- Auro 11.1
- Auro 13.1
- Imax 12.0
- NHK 22.2
- 1st order Ambisonics
- 2nd order Ambisonics
- 3rd order Ambisonics
- 4th order Ambisonics
- 5th order Ambisonics
- 6th order Ambisonics
- 7th order Ambisonics

Output Format - Choose the right output format for your track between the following options:

- Stereo
- Binaural
- LCR
- LCRS
- 4.0
- Quad
- 5.0
- 5.1
- 7.1
- 9.0
- 5.0.2
- 5.1.2
- 5.0.4
- 5.1.4
- 7.0.2
- 7.1.2
- 7.0.4
- 7.1.4
- 9.1
- 7.0.6
- 7.1.6
- 9.1.4

- 9.1.6
- 9.0.8
- 9.1.8
- 11.1.8
- 11.1
- 12.0
- 13.1
- 1st order Ambisonics
- 2nd order Ambisonics
- 3rd order Ambisonics
- 4th order Ambisonics
- 5th order Ambisonics
- 6th order Ambisonics
- 7th order Ambisonics

Left Panel



In this section, you can choose between 4 gains modes: 0dB, -3dB, -6dB and Custom, in which you can set the gain value between $-\infty$ to 0 dB.

Below, you have the Polarity button, that can use on the matrix after routing a channel.

Center Panel



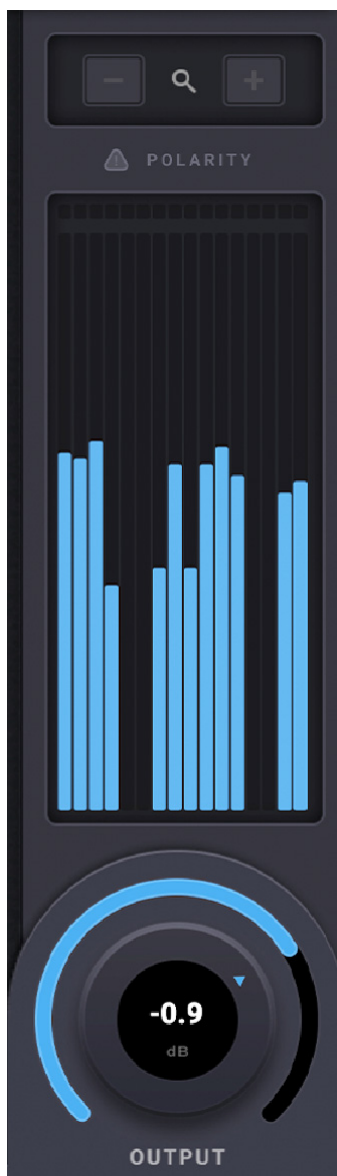
Figure 3. Center Panel

In this section, you will find the matrix.

In the upper left corner, you have a navigator which allows you to go to any part of the matrix in an easier and faster way.

In the left column, you have the inputs and in the top row the outputs. To connect them, you just need to select a gain mode and click on the cells you want to connect.

Right Panel



In the right section, you have the output knob, VU meter, polarity indicator and zoom controls.

In the zoom controls, you can zoom in/out the AudioMatrix grid.

Below zoom controls, you have the polarity indicator, that indicates if any connection is using the polarity inversion. After that, you have the VU meter, where you can check how your work levels are.

At the end, you will find the master volume knob, which controls the overall volume of the AudioMatrix, regardless of the gains assigned to each channel.

Bottom bar

On the bottom of the window you also have access to a bottom bar with useful features:

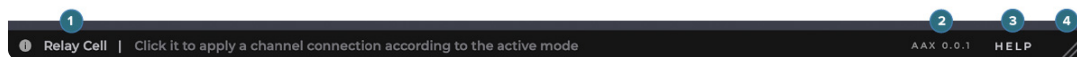


Figure 4. Bottom Bar

- 1. Tooltips' section** - Every time you move the mouse cursor over any control, you will see a short description of that parameter.
- 2. Update** - If the plugin is running on a computer with Internet access, it can detect if a newer update is available, informing the user of the existence of a new update, by showing a blinking phrase on the top of the display.
- 3. Help button** - Opens the Help Panel, which shows additional information and useful links.
 - a) Visit our Website** – Link to soundparticles.com
 - b) Watch our Tutorials** – Link to AudioMatrix [tutorials](#)
 - c) Read Manual** – Web version of this Manual.
 - d) Request Support** – This button will redirect users to the requested support page. This will automatically retrieve some data about your setup (OS, CPU, RAM, plugin version and host).
 - e) Forum** – Link to our user Facebook group, [Sound Particles Forum](#).
 - f) Check for Updates** - Pressing this button you will access soundparticles.com to check if there are any available updates. Normally when a new update comes out the plugin automatically shows it but you can use this to be sure your version is up to date.
 - g) Resize button** - Users are allowed to use a custom scaling factor by dragging the cursor in the bottom-right of the plugin's interface. Performing this makes the zoom pop-up display the custom value of the scaling. **Bare in mind that hosts may deal differently with plugin resizes.*

Presets Location

Installing AudioMatrix copies the plugin into appropriate plugin folders, and the hosts will automatically recognize them. It also allows AudioMatrix users to choose a custom folder for the installation, in both operating systems — MacOS and Windows.

Presets Locations

User presets will be stored in a .spp file in the following locations:

On MacOS, the path for AudioMatrix user presets is the following:

- /Users/USERNAME*/Library/Application Support/Sound Particles/AudioMatrix/Presets

On Windows, the path for AudioMatrix user presets is the following:

- C:\Users\USERNAME**\AppData\Roaming\Sound Particles\AudioMatrix\Presets

*USERNAME is your login name. Your user Library folder may be hidden, in which case you can select the “Go To Folder” option in the Go menu of the Finder, enter “~/Library”, and click OK.

**USERNAME is your login name. AppData may be hidden; use the explorer view options to show system files.

Tips

Knobs:

- Double click or Option/Alt-click resets to the default value;

VU Meter:

- Click on any channel clears all clipping LEDs;
- Left click on any channel and select “reset” clears all clipping LEDs;

Randomize:

- This button will set new random values to the parameters and the plugin effect mode buttons/pop-ups.

Tooltips' bar:

- This version of AudioMatrix has a bar at the bottom of the interface that shows short definitions for each element of the plugin.

Additional Notes

CHECK FOR UPDATES

If the plugin is running on a computer with internet access, it is able to detect if a newer update is available, informing the user of the existence of a new update, by showing a blinking phrase on the bottom bar of the plugin.

To achieve that, Sound Particles AudioMatrix plugin tries to access a simple XML file located at <https://www.soundparticles.com>.

SOUND PARTICLES AUDIOMATRIX DOES NOT SEND ANY INFORMATION FROM THE USER OVER THE INTERNET.

SUPPORT

If you detect a bug, if you got a crash, if you believe something is not perfect, or even if you have ideas for future versions, don't hesitate, and email us at support@soundparticles.com. We REALLY want to hear from you. Sometimes a bug lives on for too much time, simply because we haven't detected ourselves and we didn't receive any feedback from the affected users. Besides that, your feedback is very important for us.

“Help us help you”

Credits

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100% ⊞ ⏪ No preset ⏩ In 5.1.4 ⊞ Out 9.1.6 ⊞

AUDIOMATRIX **SOUND PARTICLES**

0 dB

-3 dB

-6 dB

Custom

Polarity

	Left	Right	Center	LFE	Left Wide	Right Wide	Left Side Surround	Right Side Surround	Left Rear Surround	Right Rear Surround	Left Top Front	Right Top Front	Left Top Surround	Right Top Surround	Left Top Rear	Right Top Rear
Left	◆															
Right		◆														
Center			◆													
LFE				◆												
Left Surround							◆									
Right Surround								◆								
Left Top Front												◆				
Right Top Front													◆			
Left Top Rear																◆
Right Top Rear																◆

SEARCH

POLARITY

OUTPUT

-0.9

◆ -6dB Mode | Pick a connection to apply a gain of -6 to the input samples and send them to the output channel

AAX 5.0.1 [HELP](#)

