TOONTRACK

EZDRUMMER 3
THIS MANUAL APPLIES TO VERSION 3.0.3 OF EZDRUMMER 3.

0. INTRODUCTION

Thank you for purchasing EZdrummer 3. After years of work, we are proud to give you our best and most intuitive songwriting tool so far!

Creativity is the hallmark at the front and center of the EZ Line design. The concept is clear: to give you, the songwriter, not only products that make your music sound great, but also the tools you need to create it. For EZdrummer 3, our favorite band member has been improved in both features and appearance to fulfill your songwriting.

In addition to a wealth of new songwriting features and a new and improved graphical interface, EZdrummer 3 also includes a huge sound library recorded at Hansa Studios, a comprehensive MIDI library, meticulously engineered presets, advanced groove generating features, and much, much more.

Happy songwriting!

0.1 WHAT'S INCLUDED WITH THE PURCHASE OF EZDRUMMER 3

The purchase of EZdrummer 3 includes the download of the following:

- **The EZdrummer 3 software** (i.e., the standalone version of the software and all of its various plug-in formats for use in your DAW). This is the tool that makes it possible to playback and manipulate the sound libraries, as well as mix and process the recorded audio in those libraries.
- **The EZdrummer 3 core sound library**. This includes a total of seven (7) recorded kits spread out in three different rooms at the Hansa Tonstudio in Berlin, Germany.
- **The EZdrummer 3 core MIDI Library**. This is an extensive collection of MIDI files that show up in the Grooves tab of EZdrummer 3.
- **EZdrummer 3 factory presets**. A vast selection of presets made by renowned producers and engineers.

Mac, macOS and Audio Units are trademarks of Apple Inc., registered in the U.S. and other countries. Windows is a trademark of Microsoft Corporation. VST is a trademark of Steinberg Media Technology AG. AAX is a trademark of Avid Corp. Overloud is a trademark of Almateq srl. All other trademarks held by their respective owners.

Effects powered by Overloud

1. INSTALLATION

EZdrummer 3 is a download-only product and is available for download via the Toontrack Product Manager.

1.1 INSTALLING WITH THE TOONTRACK PRODUCT MANAGER

The following is a step-by-step guide for using the Toontrack Product Manager to download, install, authorize, and update EZdrummer 3 and its sound and MIDI libraries.

DOWNLOADING THE PRODUCT MANAGER

Notice

If you are already a Toontrack user and you have previously installed the Toontrack Product Manager you can skip this step.

The Toontrack Product Manager is a standalone application that acts as a portal and download manager for your toontrack.com account. It allows you to access, download, install, authorize, and update all in one convenient location.

1. Open this link in a web browser and click the Mac / PC button to download the Toontrack Product Manager: https://www.toontrack.com/product-manager/
2. Once the Toontrack Product Manager has been downloaded, run the installer for the Product Manager on your Mac or PC.

3. Launch the Toontrack Product Manager application on your computer. Upon the first launch you will be prompted to login to your toontrack.com account, or create an account if you do not already have one.

4. Once you have logged into your toontrack.com account via the Toontrack Product Manager, all of your registered products will appear.

   If EZdrummer 3 does not appear in your product list, it simply means that you need to register your purchased serial number (aka license) to your Toontrack account via the Product Manager. This is done by clicking the blue Register New Product button and then entering the serial number.

DOWNLOADING AND INSTALLING THE EZDRUMMER 3 SOFTWARE AND CORE LIBRARY

1. Locate EZdrummer 3 and EZdrummer 3 Core Library in the Product Manager, and click the red Download Product button for each of those listed items.
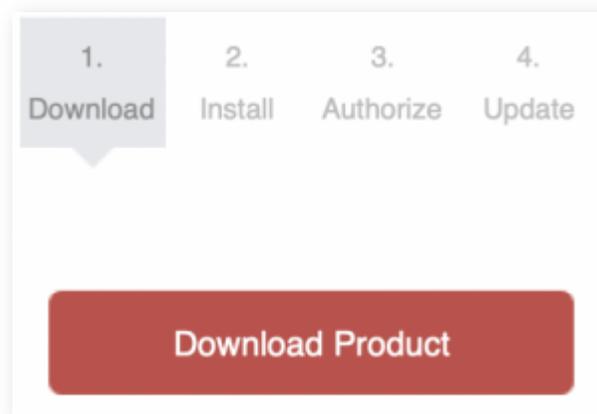
2. Once the download of the files is complete, click the Install Product button of EZdrummer 3 and the Product Manager will launch the installer. Please step through all pages of the installer until completed.* Then complete the process for the Core Library as well.
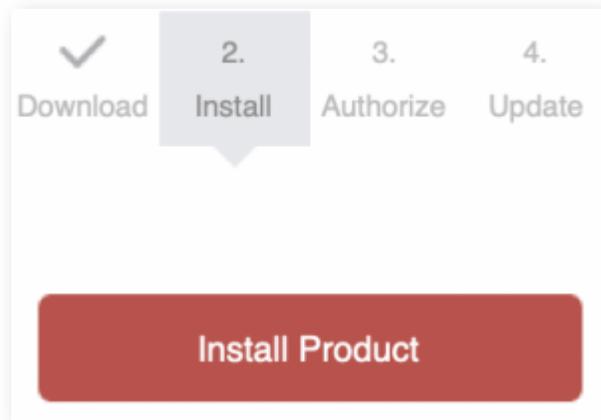
3. Once the EZdrummer 3 software is installed, the Product Manager will prompt you to authorize it for use on your computer.

4. Finally, if there are updates available, the Product Manager will prompt you to download and install the available updates. *In the **Installation Type** part of the Mac EZdrummer 3 Software installer, you get the option to customize the install, this is useful if you want to only install specific plug-in types.*

EZDRUMMER 3

- Introduction
- Read Me
- Licence
- Destination Select
- **Installation Type**
- Installation
- Summary

TOONTRACK

Standard Install on "Macintosh HD"

This will take 1,09 GB of space on your computer.

Click Install to perform a standard installation of this software on the disk "Macintosh HD".

Customise   Go Back   Install

Installation Type. Click the Customise button to get to the Custom Install window.

EZDRUMMER 3

- Introduction
- Read Me
- Licence
- Destination Select
- **Installation Type**
- Installation
- Summary

TOONTRACK

Custom Install on "Macintosh HD"

Package Name	Action	Size
☑ EZdrummer 3 standalone application	Install	54,1 MB
☑ EZdrummer 3 VST 3 plug-in	Install	52,8 MB
☑ EZdrummer 3 Audio Units plug-in	Install	52,9 MB
☑ EZdrummer 3 AAX plug-in	Install	33,4 MB

Space Required: 1,09 GB   Remaining: 255,3 GB

Standard Install   Go Back   Install

Uncheck the checkboxes that you do not wish to install, then press Install.

1.2 LAUNCHING THE EZDRUMMER 3 STANDALONE APPLICATION

When EZdrummer 3 is completely installed you will find the EZdrummer 3 application in your list of applications or programs:

- On a Mac, the application will be found in a Toontrack folder within your Applications folder.

- On a PC, the application is located in the Toontrack folder in the start menu. It is also found as a shortcut on your desktop.

The standalone version of EZdrummer 3 is used for live performance, MIDI programming, or editing. If you intend to use EZdrummer 3 in a recorded song with other instruments, we recommend using EZdrummer 3 in a host/DAW (Digital Audio Workstation) that supports VST 3, Audio Units, or AAX plug-ins.

2. GETTING STARTED

When you open up EZdrummer 3 for the first time, the Drum view is shown. Buttons and knobs are inviting you to tinker and just get started with your songwriting. But before we go deeper into all of the features in EZdrummer 3, we would like to encourage you to step back and take in how the EZdrummer 3 interface is arranged.

2.1 NAVIGATION

At the very top center of the EZdrummer 3 window, there are five tabs. The area below the tabs changes its content depending on the tab that is in focus. Left-clicking a tab allows

you to navigate to that tab in EZdrummer 3.
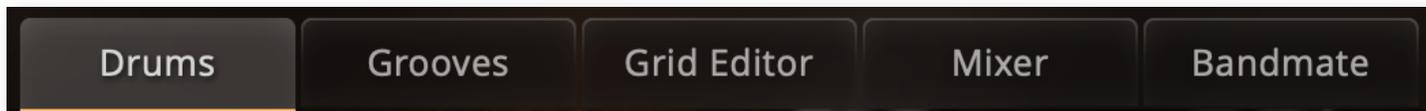
If you look more closely at the tabs in EZdrummer3 while moving the mouse over them, you will notice a small graphic with 2 overlapped rectangles. This is the icon for detaching a window. It can be found on the Grooves, Grid Editor, Mixer, and Bandmate tabs. Clicking this breaks the window off from the main interface and allows you to position it (and in the case of the tabs) change its proportions however you desire.
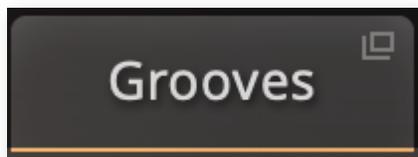
The Drums tab is in some ways your home tab in EZdrummer 3. It will always be there, and cannot be detached.

This manual describes all of the tabs and their components and concludes by describing the global menus in the top left. In the upcoming chapter, we start by describing the Drums tab.

3. THE DRUMS TAB

The Drums tab is the starting point of your project. It´s where you preview your sound libraries, replace instruments and adjust tuning and level of individual drums.

LIBRARY AND PRESET MENUS
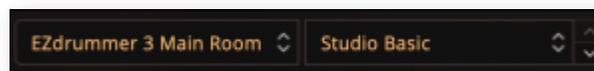
Library Selection Menu   /   Preset Selection Menu

Choose a sound library by clicking the library selection menu in the main navigation bar.

Once you have selected the sound library that you want to use, the preset menu is populated with different presets made specifically for that sound library.

USER PRESETS

The Library Preset menu also provides the option to save a user preset, load a user preset, and manage your user presets in the Finder (MAC) or Explorer (PC). These Presets are the same as the Drums and Mixer Presets above, they have simply been customized and saved by the user. The
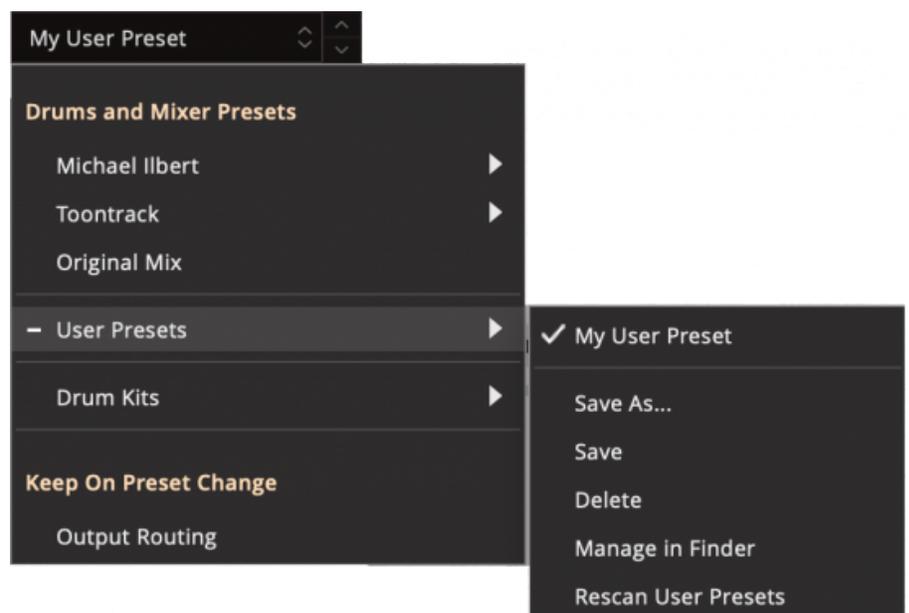
reason for this is to allow the user to load any desired sound preset without losing any work that has been completed on the Song Track or in the Bandmate tab.

Saved User Presets contain all chosen instruments and Mixer channel settings/effect alterations. Once saved all user presets will be found in the User Presets sub-menu.

All user presets can be managed in Finder (MAC) or Explorer (PC). This makes it possible to go directly to the location where these files are stored on your computer.

3.1 THE DRUMS VIEW

The Drums view consists of three elements.

- **Interactive drums:** The graphic instruments can be interacted with using your mouse cursor. Use left-click to trigger a preview of a loaded instrument. Use right-click to open a menu to load a different
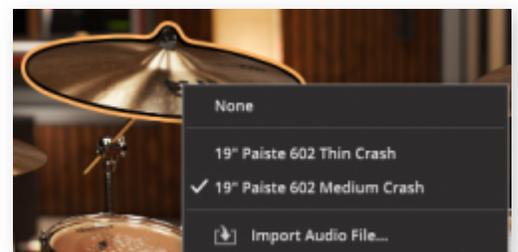
instrument or replace it with your own audio file. These options are also available in the Instrument Menu.

- **Percussion pads:** The EZdrummer 3 percussion library can be previewed with the pads in the upper right corner of the Drums tab. Similarly, use right-click to change the instrument from preset default.

- **Instrument properties:** The interactive knobs in the top-left panel lets you change the volume and tuning of the selected instrument. Use the arrow buttons to stepwise load a different instrument. You can also open the Instrument Menu for an overview of available choices and additional features.

3.2 THE INSTRUMENT MENU

Snare: 6.x14" Yamaha Absolute Hybrid Maple

Volume 0.0 Tuning 0.0 EZD3 Main Room

⊘ None

Snare

🔊 **6.x14" Yamaha Absolute Hybrid Maple**

6.5x14" Yamaha Anton Fig Signature

6.5x14" C&C Player Date

5x14" C&C Player Date

7x13" Brady Jarrah Block

6.5x14" AK Black Beauty

6.5x14" DW Jazz Series

Preview Articulation   Center

🔊 Center

Rimshot

Edge

Sidestick

Rim Only

Click its button with the currently selected instrument to open the menu. Here you can preview and load different instruments as well as edit the Volume and Tuning for the selected instrument position.
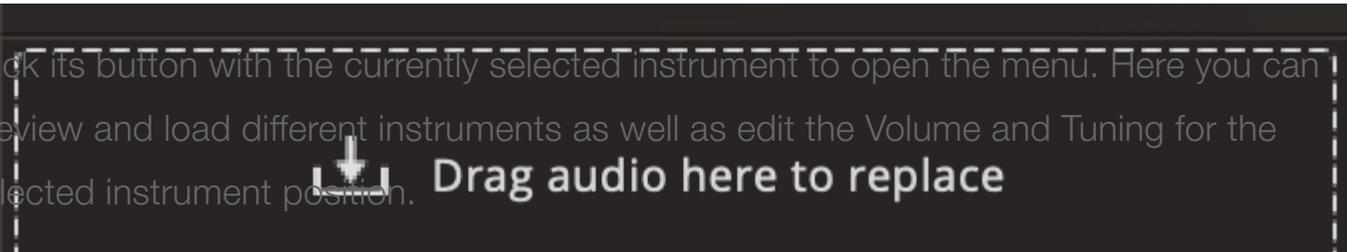
Keep in mind...

Almost everything you can click on has an associated tooltip. In this area, the tooltips of the interactive knobs display information about what it controls.

To show a tooltip, place and briefly hold your mouse cursor on an interactive element. A text field will appear with additional information.

INSTRUMENT KNOBS

The Tuning knob increases or decreases the original pitch of the selected instrument. For fine adjustment hold down the Shift key while turning the knob. The knobs need to be in Linear mode (see 9.4.1 about the General Settings Tab) for fine adjustments to be made.

The Volume knob changes the volume of the selected instrument before it is sent to the mixer.

Tip:

Changing the instrument volume in the Drums tab can have different results than changing the corresponding volume fader in the Mixer tab. This is due to how multi-mic drum recordings work. By increasing the Instrument volume in Drums tab, you can offset instrument relations that otherwise are controlled together in a Mixer tab bus channel. For example: increase the volume of a Ride cymbal in Drums tab if you want it to become louder without necessarily affecting the volume of the Hi-hat that is routed to the same Mixer bus.

THE INSTRUMENT LIST

You are able to swap the currently selected instrument for one in the list. By default, the instruments that are included

in the currently loaded sound library are displayed. That

can be changed by selecting another library in the sound

library selection menu to the right of the Volume and Tuning knobs.

The Instrument Menu
sound library list.

Each instrument allows you to preview different velocities by clicking the vertical bars to the right. Shorter bars to the left equals lower velocity, and the highest velocity is previewed furthest to the right.
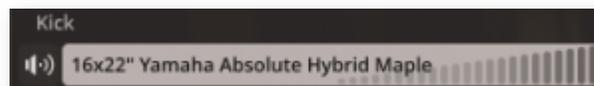
Velocity preview. Click the speaker or the
bars with increasing size to the right.

PREVIEW ARTICULATION
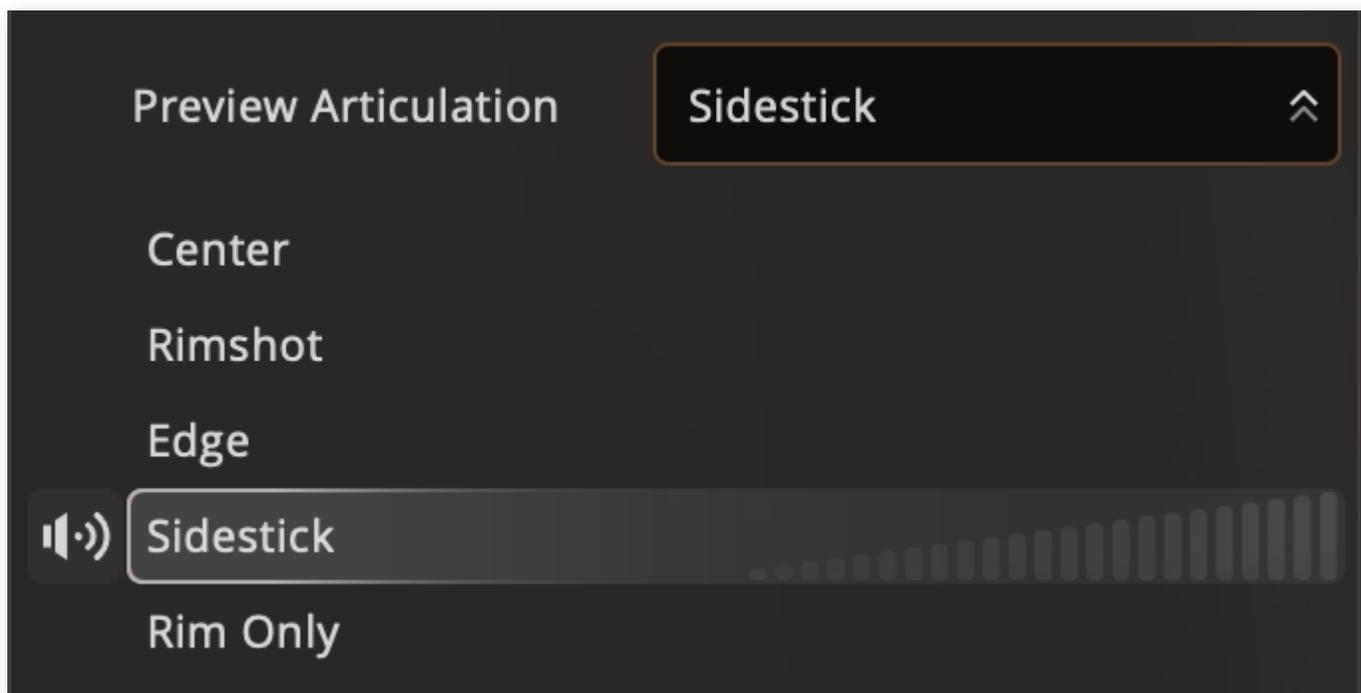
The Preview Articulation area allows you to select the articulation that you want to preview. In the example, we chose to preview the "Sidestick" snare articulation. Left-click to select,

and the preview bars to the right of the articulation name can be used in the same way as the velocity preview bars.

ADDING YOUR OWN SAMPLE

At the bottom of the Instrument Properties, there is an area where you can drop your own sample audio. You can also drag-and-drop your audio file straight onto the instrument graphic. That will load the sample so that it will sound when the selected instrument in EZdrummer 3 is triggered. The playback volume of the User Audio file will respond to velocity level: higher equals louder.

PRESET STACKS
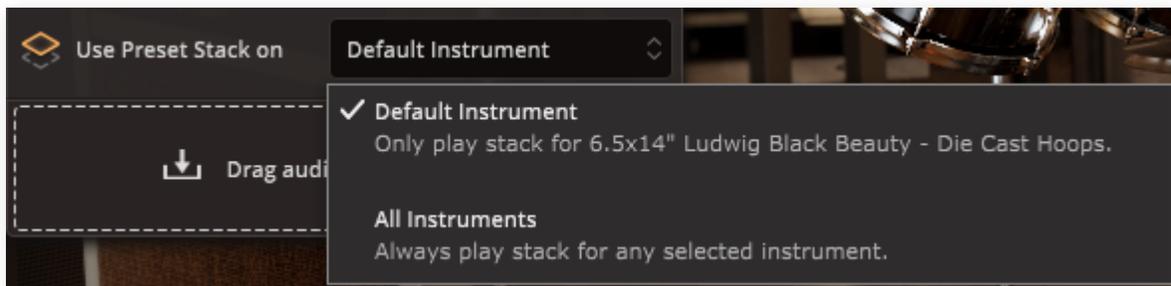
The instrument menu with a Preset Stack instrument selected.

A "stack" refers to the practice of layering multiple sounds when triggering an instrument. Certain presets in EZdrummer 3 take advantage of this to add extra flair or punch, whereby a new section of the Instrument menu will become visible. Choose to only use stack sounds as the preset maker intended or experiment and add stack sounds to all instruments. You can use the stack icon to the left to preview the result. As an example, the Bright Room > Millenium Metal preset make use of drum stacks (additional layering) on the Kick and Snare instruments.

4. THE GROOVES TAB
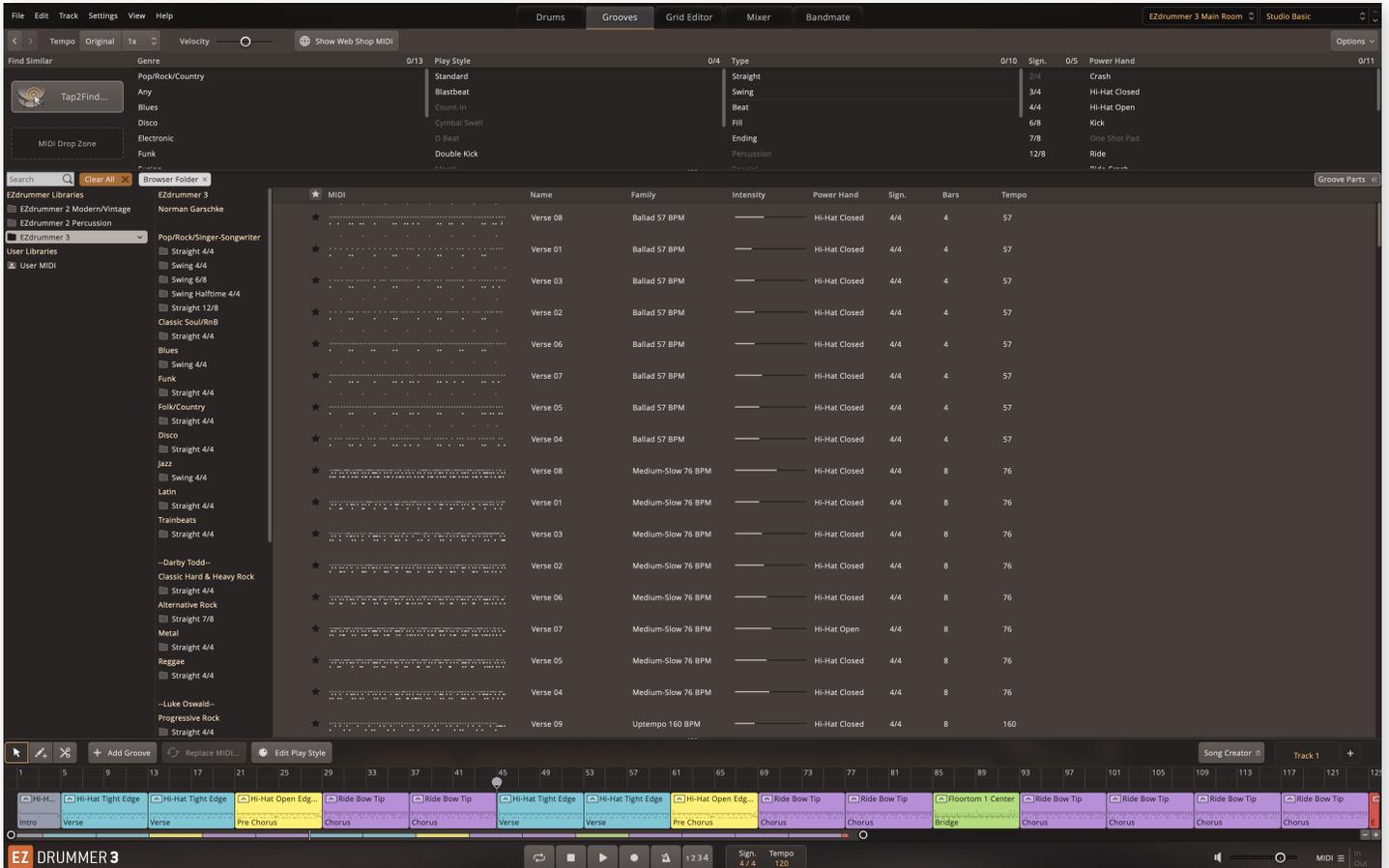
The Grooves tab in EZdrummer 3 is where you browse and preview your installed MIDI files. If EZdrummer 3 is your first Toontrack product for drum grooves, this entails MIDI folders listed as EZdrummer 3 and EZdrummer 3 Percussion.

EZdrummer 3 changes the Grooves tab from the previous version by combining both the traditional file browser and a selection of search filters into one location where they can work together to better filter your desired result.

VIDEO INTRODUCTION

EZdrummer 3: Grooves

4.1 THE GROOVES TAB HEADER BAR
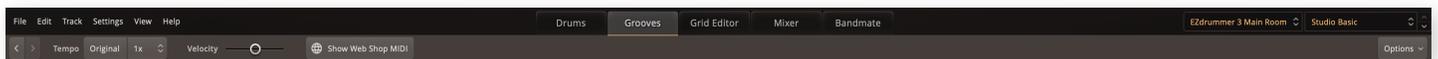
The Grooves Tab header bar.

NAVIGATION BUTTONS

These maneuver through the folder browser below, retracing your steps just as the back and forward buttons do in a web browser.

ORIGINAL TEMPO
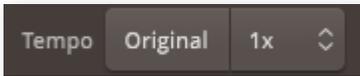
The Original Tempo button will playback grooves in the browser at the tempo they were recorded. By default, this button is not toggled and MIDI in Grooves playback at the tempo set by the DAW or the Song Track in the Standalone version.

TEMPO MODIFIERS

The Tempo Modifier dropdown menu lets you preview and alter grooves with different tempo alterations; it is placed next to the Original Tempo button. You can select between 1/2 tempo, normal 1x tempo, and 2x (double) tempo. An active tempo modifier will keep tempo changes when a Groove is dragged to the Song Track. These alterations only apply to this copy of the Groove and do not overwrite the original MIDI file.

It is also possible to select 2/3 and 3/2x tempo. 2/3x slows the tempo of a groove by 1/3 so that a 4/4 groove could be used in a 6/8 time signature song. 3/2 speeds up the tempo by a factor of 1.5.

It's important to mention that the 2/3x and 3/2x options simply slow down or speed up the chosen MIDI (i.e. they do not change the performance).
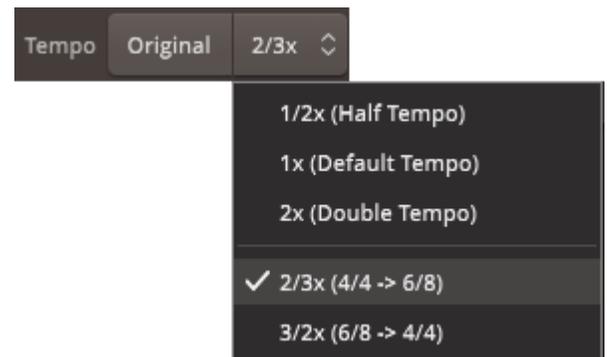
A practical way to demonstrate how these alterations work is to slow down a 4/4 Groove using the 2/3 option, then drag this groove to the song track, and engage the metronome.

With the metronome on, you will hear how 6/8 can be counted over a 4/4 groove that has been slowed down appropriately.

An active tempo modifier will keep tempo changes when a Groove is dragged to the Song Track. These alterations only apply to this copy of the groove and do not overwrite the original MIDI file in the library.

VELOCITY MODIFIER

The Velocity Modifier will raise or lower the overall velocity for all grooves in the browser. Notes are shifted in velocity by the same amount so drum performance proportions are kept. Drag the slider left or right to either soften or increase the perceived intensity of a groove.

Similar to the Tempo Modifier, any velocity changes will be kept when dragging the Groove to the Song Track and changes will not overwrite the original MIDI file.

SHOW WEB SHOP MIDI

Show Web Shop MIDI connects to toontrack.com and allows you to preview MIDI that you do not currently own from Toontrack's varied selection of for-purchase MIDI packs. An internet connection is required to use this feature. Clicking this button will add a header in the file browser section of the Grooves page titled "Online Libraries." Search filters that correspond to the online libraries will also be added to the filters section and will display a blue dot to the left of their name.
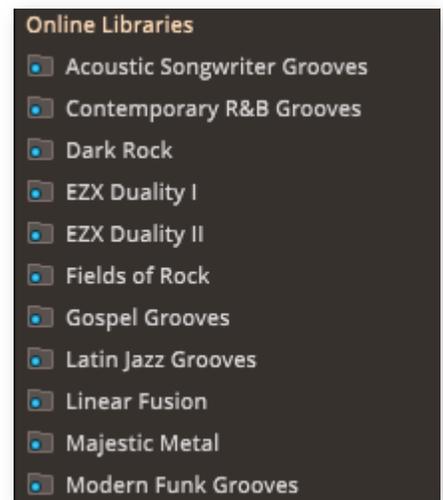
All webshop grooves will have a web icon to the left of their name in the results section.

It is important to mention that webshop MIDI files can not be dragged to the Song Track or out of EZdrummer 3. They are strictly for preview so that the user can make more informed purchasing decisions.

OPTIONS
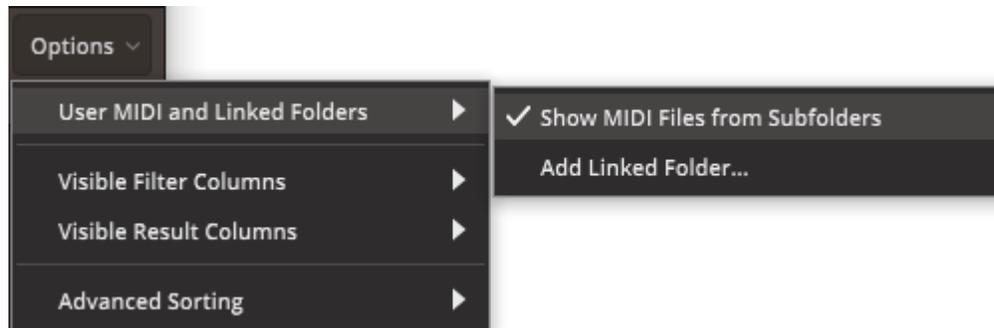
- **Show MIDI from Subfolders:** Show MIDI files from Subfolders **only applies** to user-added linked folders, and sub-folders containing 3rd party MIDI files.
    - When you select show MIDI Files from Subfolders and then click on a user-linked MIDI folder in the browser section, you will see all MIDI files in this folder, and all MIDI files in all subfolders in the results area. If this is unchecked, you will only see the MIDI files that are in the root folder. You would then need to click on the subfolder in column 2 in order to see these MIDI files.
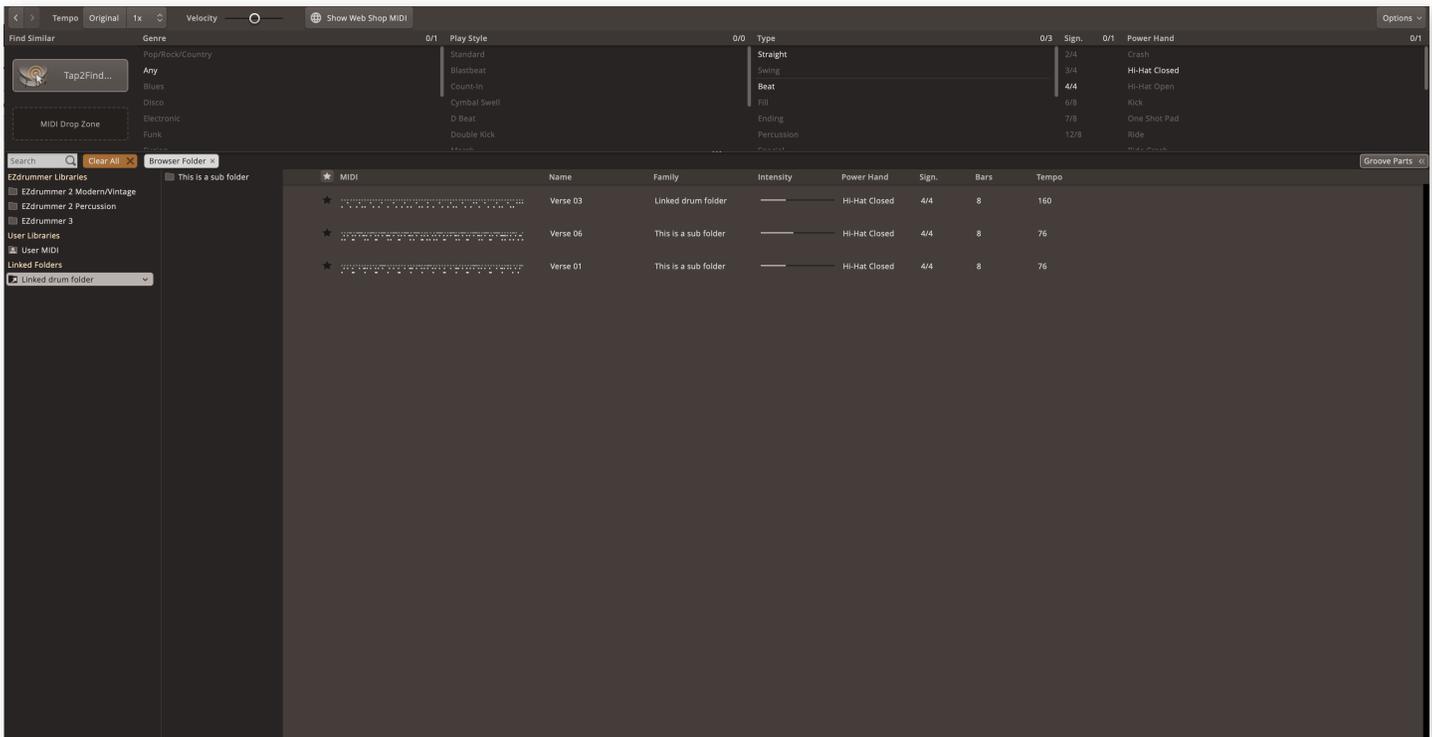
- **Add Linked Folder:** Here you can add a user-created folder of drum MIDI to the EZdrummer 3 browser. Clicking this option will open an operating system window that will allow you to browse for the folder. Again, the above option of show MIDI Files from subfolders only applies to user-linked folders.
- **Visible Columns:** Here you can show or hide the columns in the filter section and the results section.
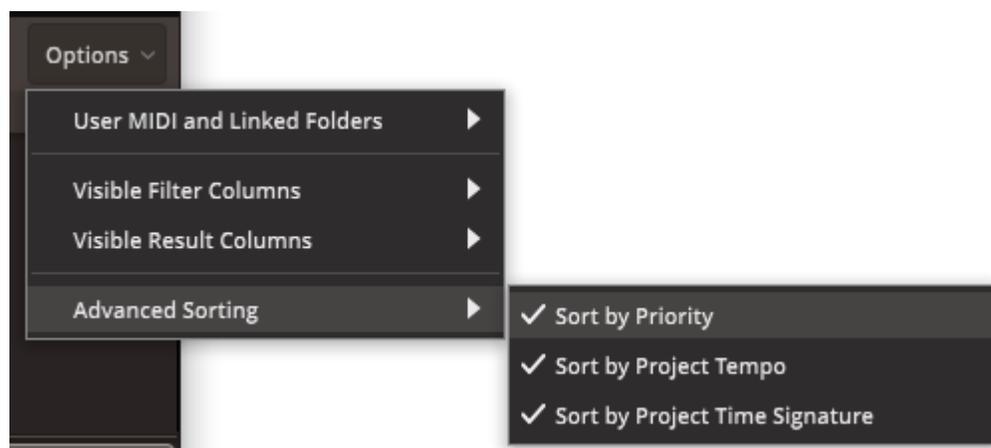
- **Advanced Sorting:** Grooves in the results area will be sorted according to the selected options instead of numerical order.

- Priority: Grooves are sorted in a way that Toontrack believes will be useful, with simpler grooves at the start of the list and more unusual grooves near the end.
- Project Tempo: Displays grooves in the results area starting with the ones that match the tempo of your EZD3 project.
- Project Time Signature: Displays grooves in the results area starting with the ones that match your EZD3 project's time signature.

4.2 SEARCH FILTERS

Below the header bar are the Grooves tab search filters.

The search filters display a default set of useful filters, however right-clicking near a search filter's title will display a menu that allows you to add or remove search filters in the interface.
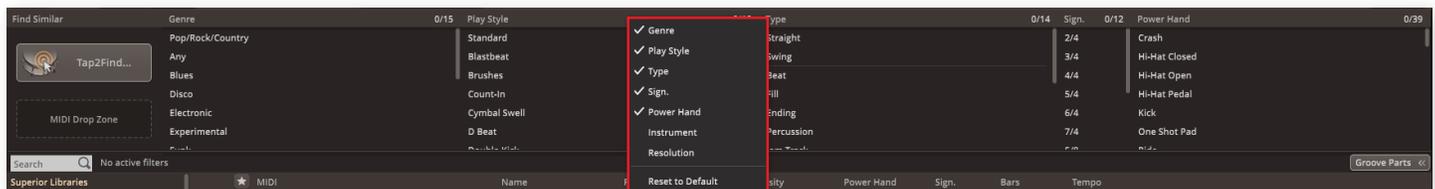
TAP2FIND
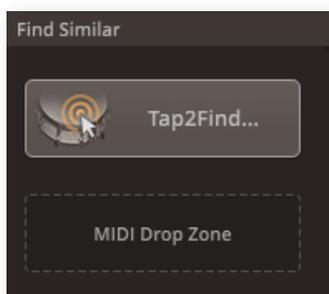
Tap2Find allows you to find grooves based on a drum pattern or rhythm of your own. This search mode is entered via the Tap2Find button at the top-left filter section in Grooves tab. Tap2Find makes it possible to use a loose idea for a drum performance to find professionally played and detailed grooves in a matter of seconds.

Clicking Tap2Find launches you into a sequencer mode where a tapped rhythm or drum pattern will be recorded and quantized to a visual grid. You can program this rhythm by

hand in the grid, via interaction with the drum graphics, or perform it using a connected MIDI controller. Pressing Search will exit Tap2Find and display matching grooves in your MIDI library.

EZdrummer 3: Tap2Find

USING TAP2FIND

- If necessary, set a tempo and time signature in the transport controls. (Bottom of the EZdrummer 3 interface)

- Click the Tap2Find button to open its window. Here the selected drum kit is shown together with a step sequencer and its dedicated controls: Tempo, Resolution, Bar Length, and Clear All. The sequencer and its metronome is active upon entering Tap2Find. By default, Resolution is set to 8th notes and the sequencer loop is set to 1 bar. This can be changed by making a different selection in the Resolution menu or changing the Bars option.

- Create your desired rhythm, either by programming it in the step sequencer or by playing it via clicking the instrument graphics or using a MIDI controller. Everything you play will be added to the loop so you can record one drum at a time for each pass of the loop.If you make a mistake, you can either erase the whole recording by clicking the Clear All button to restart, erase any individual drum by clicking the X buttons to the right of each drum row, or remove individual notes in the sequencer by clicking on them.
- By default, step sequencer rows for Kick and Snare will be visible. Other instrument rows will be added when you play/click them during an active loop.

THE TAP2FIND GRID

You can use the Tap2Find Grid at the bottom as a type of sequencer, and draw or delete notes by clicking your mouse. To include more instruments in the grid, click on the graphical representation of the instrument.

- When you are done, click "Search". The Tap2Find window will close and display the search results. The rhythm you just recorded is now shown in the MIDI drop zone. The results are sorted according to the closeness of the match. Clicking a result allows you to preview the groove.
- If you have filters already added to the Grooves browser, you can click "Search with Current Filters" to perform the search with the active filters.
- "Search Fills" will add the "Fill" filter to the search
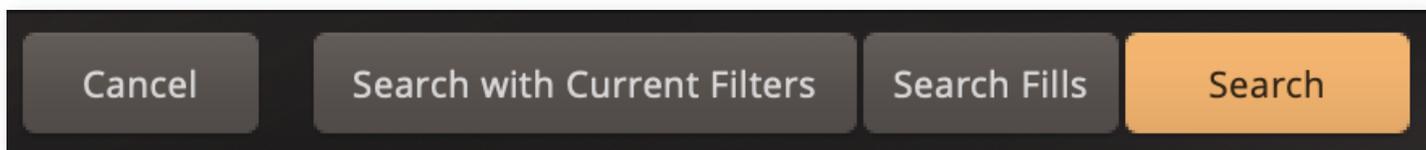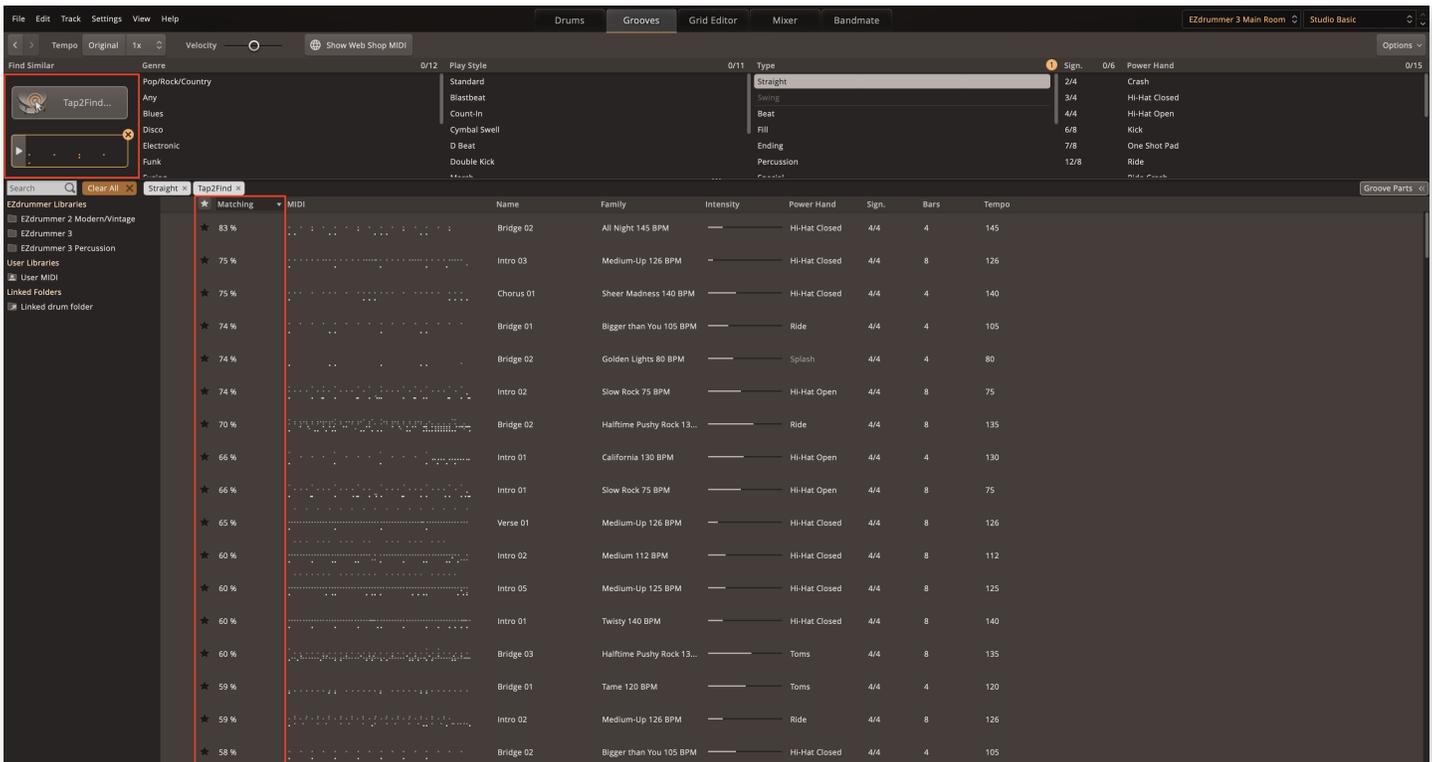
REFINING FILTERS

The remaining filters to the right of Tap2Find allow you to specify a number of search criteria to quickly find a suitable groove. Activating one or more filters will affect the search result in the lower half of the window (Results Area). Any number of filters can be selected in the various filter columns to refine your results. It is also possible to right-click a filter and select exclude, which will ensure that no grooves related to this filter appear in the results below. Excluded filters appear in RED as seen in the picture below.

CURRENT FILTERS AND MODIFIERS

Below the filter columns, all of the currently active filters are displayed. Clicking on an active filter will remove it from use.

The velocity and tempo modifiers that we described earlier in the manual also appear in bright orange.

TEXT SEARCH FILTER

The search field allows you to type in a search by keyword (text search) or by a matching filter. If there are any matching file names or filters they will be displayed below the search field. Typed-in filters are activated by either hitting enter on the physical computer keyboard, or by clicking on one of the suggested filters in the list below. Search field filters will also appear in the all active filters section once they have been entered (as pictured above).
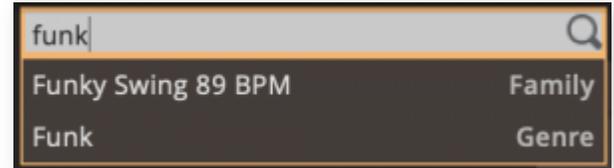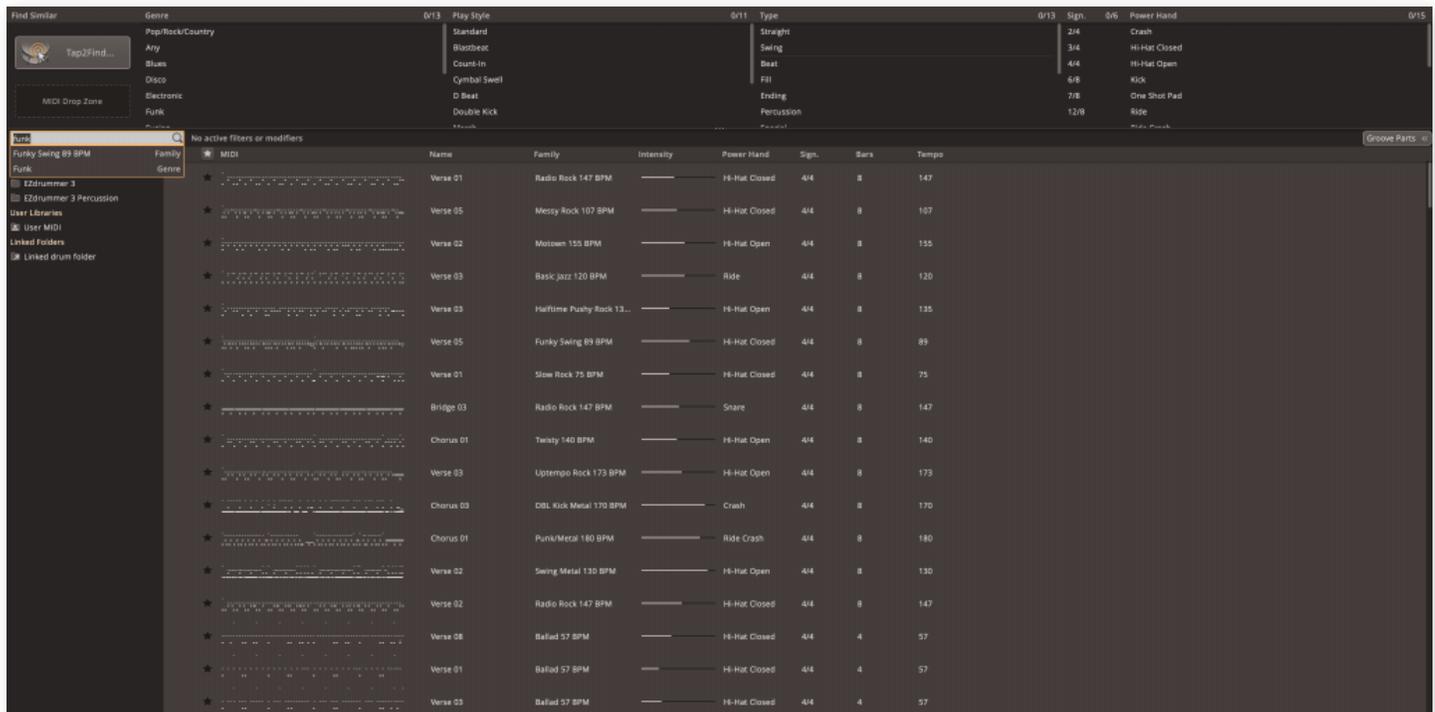
4.3 THE FOLDER BROWSER

To the left of the Grooves tab is the folder browser. The folder browser is divided into columns where you can browse (from left to right) a MIDI Pack (Groove Library), a style/time Signature category, a Groove folder (for the selected category), and lastly a play variation groove.

The folder browser section in the Grooves page makes each folder in the browser also behave as a filter, just like the search filters above. For example, clicking on a groove library folder will display all of the grooves that are included in that MIDI pack to the right in the results area. This is useful because it can be used with Tap2Find and the other search filters to better filter your results.

This means that you could tap a groove into Tap2Find, and then filter all of your results by a single or series of browser folders!
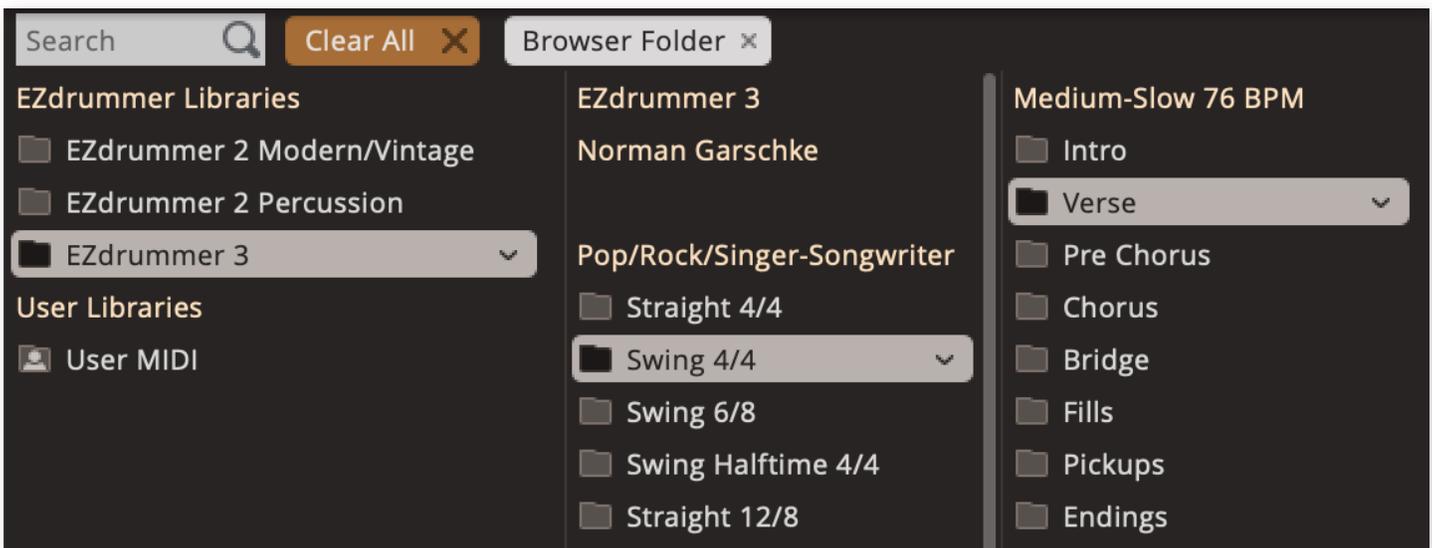
ADDING MIDI CONTENT AND THE USER MIDI FOLDER

MIDI can be added to EZdrummer 3's Grooves tab in a few ways:

- Purchase/install additional Toontrack MIDI packs.
  - MIDI packs in all genres are available at Toontrack.com, or from the many Toontrack dealers worldwide.
- Add a Linked folder of 3rd party MIDI files to the folder browser section of the Grooves tab.
  - Adding linked folders to the folder browser is done by clicking the Options Menu > User MIDI and Linked Folders > Add Linked Folder. You will then navigate to the folder on your computer.
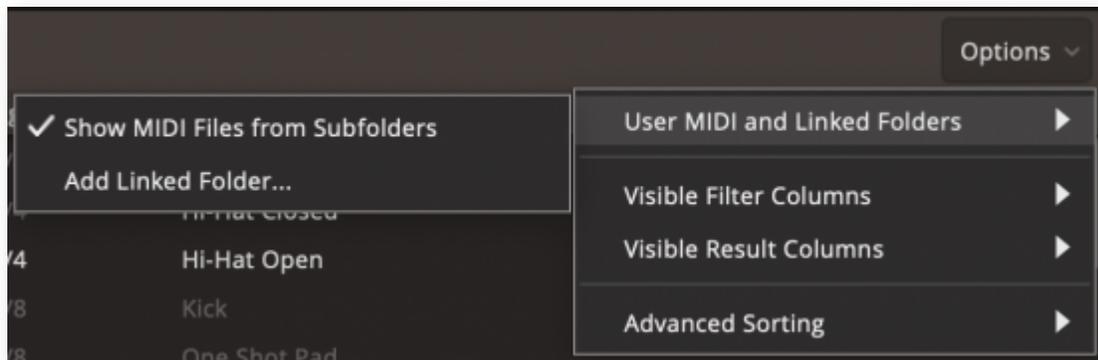
- Add MIDI files to the User MIDI Folder in the Folder Browser.
  - User MIDI files can be dragged onto the root or subfolders in the folder browser section to be added to the Grooves page. Alternatively, you could click the arrow on the User MIDI folder and select Open in Finder (or Explorer, PC) and then add MIDI to this operating system window.

- It is also possible to add subfolders to the User MIDI folder for better organization via the right-click menu.

- MIDI In/E-Drum Preset: E-drum presets can be applied to MIDI files that exist in your user MIDI folder. Using these presets will conform the MIDI in the user MIDI Folder from the chosen mapping format to EZdrummer 3's mapping format. This is useful if you have MIDI that is mapped in another format (BFD or Slate for instance) and would like to use that MIDI inside of EZD3. To do this simply select the MIDI or MIDI folder and then choose its original mapping format (e.g. Roland, Yamaha, Slate....). This MIDI will then be transformed from the original mapping format to the EZD3 mapping format for proper playback in EZD3.
    - *Note: This feature is NOT used for exporting EZD3 Mapped grooves to a different mapping format for use with a different Drum Virtual Instrument.*
- Exclude: This option will remove the User MIDI Folder from being used with any search filters such as Tap2Find.
- Open in Finder (Explorer): This will open an operating system window and automatically navigate to the folder containing the MIDI files. This is useful if

you would like to manage the MIDI files in your user MIDI folder with the operating system.

- Sync File Changes: This option will be available if you have added the user MIDI folder to the MIDI database. If selected it will update the database when new MIDI is added.
    - User MIDI libraries/folders are now scanned in the background to check if the folders are in sync. If a folder is not in sync, an orange dot will appear next to the menu button for that library, and in the menu, the same orange dot is shown next to the "Sync File Changes" entry.

4.4 THE RESULTS SECTION

Once you have filtered down the type of groove that you are looking for you will see a selection of matching results in the results section.

Clicking the play button on any hovered groove will engage loop playback of the groove. Double-clicking the groove variation will trigger a one-shot playback.

These are the individual grooves (MIDI files) that can be used as the building blocks of your drum sequence. These grooves can be dragged to the Song Track in EZD3 for sequencing, they can be dragged out of the EZdrummer 3 interface to a location on your computer, or they can be dragged and dropped on a MIDI track in your DAW.
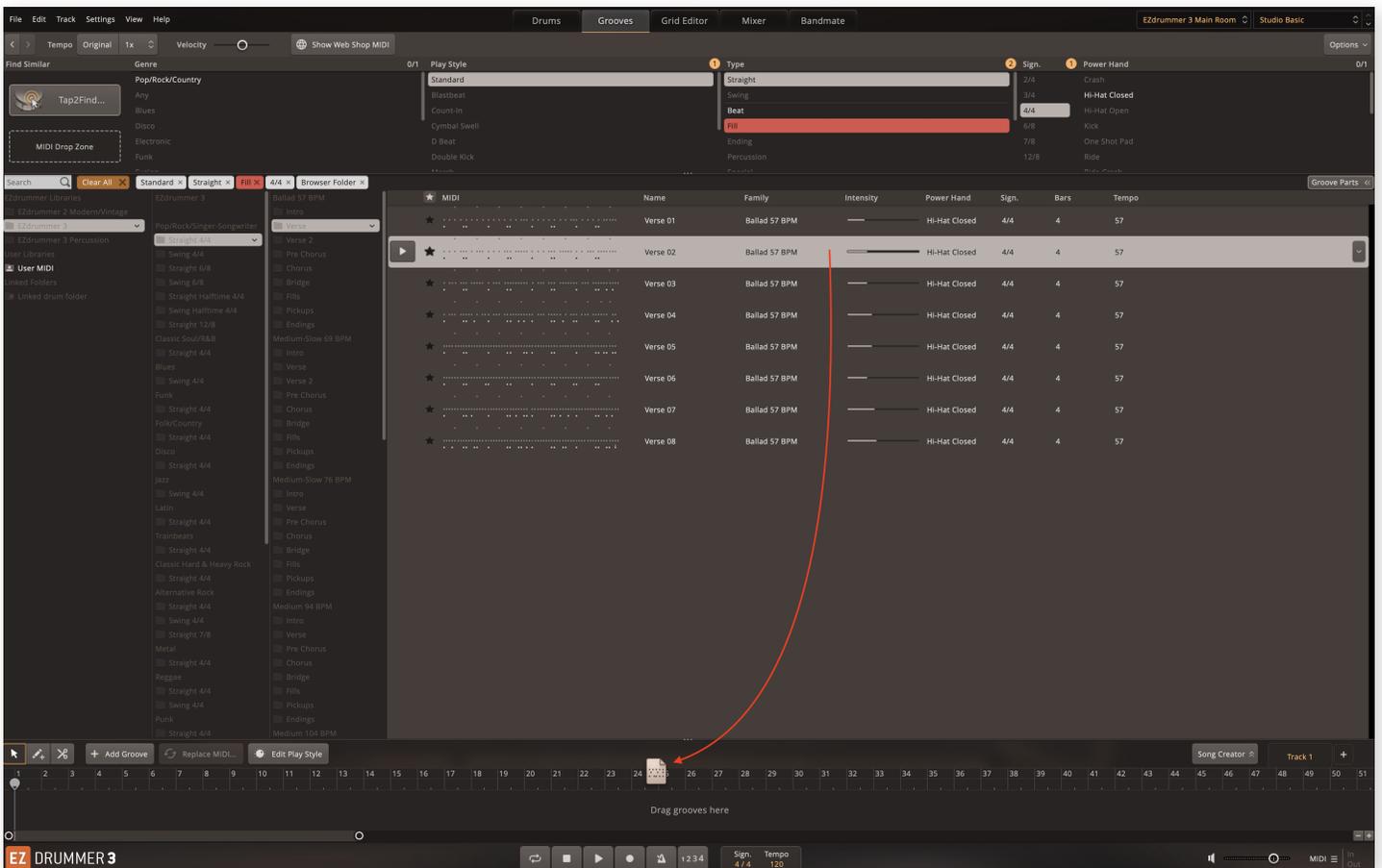
Right-clicking on a Groove in the results section provides a few additional options.
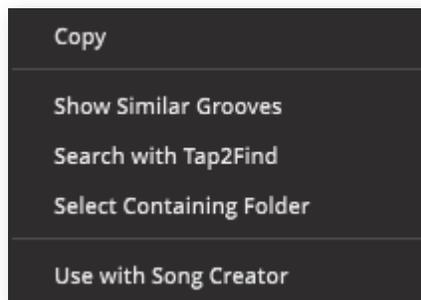
- **Copy:** You can copy the groove to paste at a later time.
- **Show Similar Grooves:** This option makes it possible to use individual grooves Tags as a group of search filters.

  Every single Toontrack groove is given a set of Tags that is stored in the Toontrack MIDI database. If you find a groove you like and would like to find more similar grooves, Show Similar Grooves is one good option.
- **Search with Tap2Find:** This selection is similar to Show Similar Grooves, but this feature instead uses Tap2Find for the search criteria instead of the grooves associated tags.
- **Select Containing Folder:** This option will display the Browser folder path all the way to the final groove variation.

  This is very useful if you would like to accompany grooves from the same MIDI pack as the chosen Groove.
- **Use with Song Creator:** loads the groove into the song creator and automatically expands the song creator window. The song creator will be explained in detail in 7. The Song Track.

GROOVE PARTS

EZdrummer 3: Groove Parts

The Groove Parts Button located to the right of the results area allows the user to access MIDI for the individual drums used in the selected groove. Groove Parts can be dragged over existing grooves on the timeline to add this "Groove Part MIDI" to the existing Groove. This would allow you to for example use the Hi-Hat pattern from one Groove with a kick pattern from another. The possibilities are endless. To be able to audition your Groove with the Groove Part of a different Groove, you can use Replace MIDI. More about Replace MIDI in 7. The Song Track.

5. THE GRID EDITOR TAB

The Grid Editor offers note-level MIDI editing for altering existing grooves on the Song Track or creating new grooves from scratch.
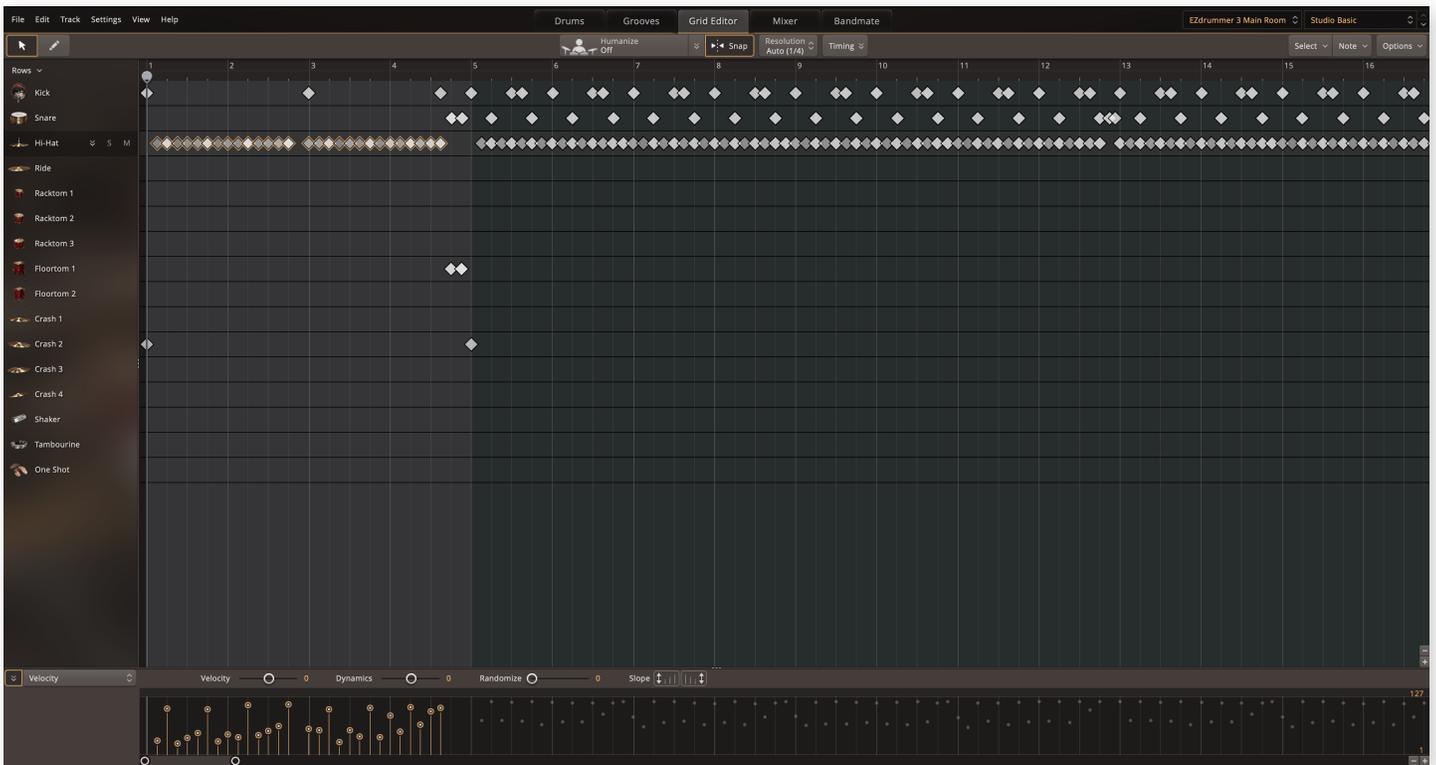
OPENING

The Grid Editor can be accessed in the following ways:

- Clicking the Grid Editor tab
- Double-clicking on a groove in the Song Track
- Selecting a groove and pressing "CTRL+3".

VIDEO INTRODUCTION

EZdrummer 3: Grid Editor

5.1 THE GRID EDITOR HEADER

Useful tools for adding/altering MIDI notes in the Grid Editor. These tools are explained from left to right.

CURSOR TOOLS

- The pointer tool allows you to select a note or group of notes by lassoing them.

- The pencil tool allows you to add notes to the groove. Clicking and dragging the pencil tool will allow you to draw in multiple notes at intervals according to the set Snap Value.
  - To avoid the need to constantly switch between tools The arrow tool can be instantly changed to the pencil tool by pressing Command + Option (Mac) on your keyboard (Alt+Control PC).

5.1.1 HUMANIZE
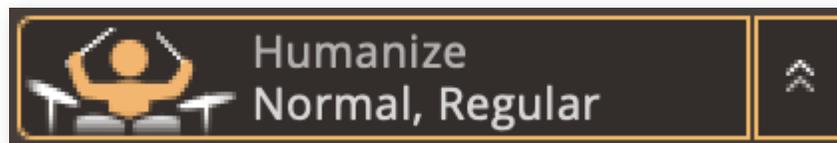
The new Humanize feature that is introduced in EZdrummer 3 automatically adjusts the velocity and micro timing of notes in the Grid Editor. Humanize is active by default and applied to notes added using the pencil tool. It's possible to apply humanization to a selection of notes as well. If you want to change the feel that the humanize algorithm is using, click the drop down menu arrows to the right and select the Velocity Style of your choice.
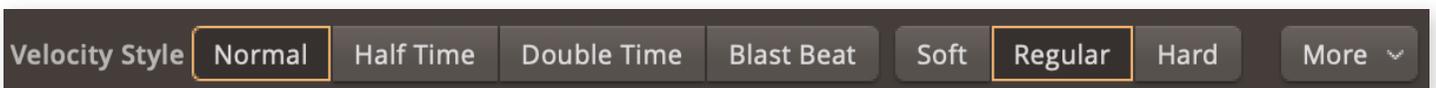
The first four buttons **Normal**, **Half Time**, **Double Time** and **Blast Beat** buttons control where the accents and ghost notes will be placed in your groove. The **Soft, Regular,** and **Hard** buttons set the overall velocity for the notes.

Pressing the More button lets you choose how the Humanize feature changes the microtiming of the selected notes.

Humanize Microtiming

Off

✓ Normal

Pushy

Laid Back

Paste/Move Notes Options

✓ Re-Humanize
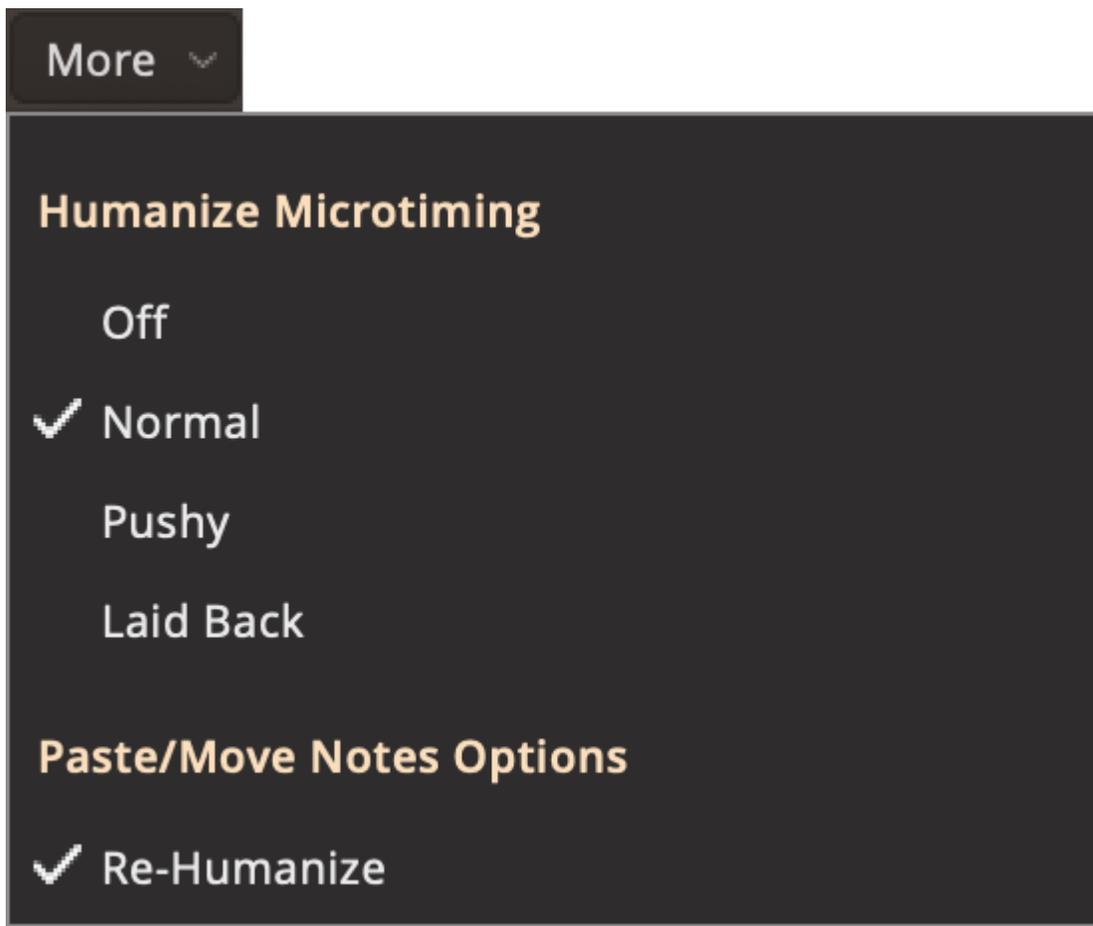
- **Off:** Turns off Microtiming.
- **Normal:** The default Microtiming setting will move the notes very slightly to simulate a real drummer's timing variation.
- **Pushy:** Make your drummer play slightly ahead of the beat.
- **Laid Back:** Move the notes slightly after the beat.

These are very subtle changes, and results may vary depending on the groove that you have created. Choose the setting that sounds best to your ears! Another way of editing the timing to make EZdrummer 3 less "tight" is to use the **Randomize** slider, more about that later in this chapter.

The **Re-Humanize** toggle, if turned on, will recalculate the humanization when you move or paste new notes to the Grid.

5.1.2 TIMING CONTROLS

The second reason you may want to open the grid editor early on is to make sweeping adjustments to the timing of your MIDI. This is mainly done with the Quantize and Timing controls, while disabling Snap to Grid is a useful feature when working with extremely detailed performance. There are many options for changing the behavior of the timing controls in the Options menu described at the end of this section.

IMPORTANT

The importance of context is especially clear with the relative timing controls, since the values you are adjusting are determined when you make your selection (i.e. set a new editing context). Once you change that selection the adjustments you've made are set and new "zero" values are determined for your new selection. The only way to undo the changes to the previous selection at that point, is with the Undo function.

There are three buttons related to the timing controls that are shown when opening the grid editor:

Snap to Grid

This option enables or disables note snapping to the nearest point in the grid. With snapping disabled you have more control over the exact length of the notes, which can be useful when giving your song its final polish.

Snap resolution
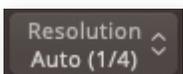
By default notes in the grid editor will snap to whatever resolution the grid is currently displaying. If you want another resolution for snapping, this is where you do it. Typically you will use this function when programming triplets in an otherwise straight song.

Timing

Timing ⌃   In direct opposition to the previous controls, the Timing box lets you make a performance more human-like by adjusting the rhythmic feel of your selection. Dynamic feel controls are adjusted in the MIDI controls described later in this chapter.

QUANTIZE
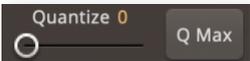
Quantize 0   Q Max   The Quantize Percentage slider will move all selected notes to the nearest grid line by the selected percentage. The Quantize value is also determined by the selected Resolution menu value. Therefore, if you would like to quantize a Hi-Hat to 1/16th notes, simply select all Hi-Hat notes, choose 1/16th from the Resolution menu and then move the slider to 100% (or click the Max button). The Max button sets the Quantize percentage to 100%

SWING
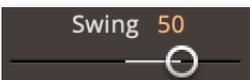
Swing 50   In a swing rhythm, the beat is divided unequally such that the subdivisions of notes alternate between long and short durations. Therefore increasing or decreasing the Swing Slider will move the selected notes into a swing pattern either forward in time (positive Swing value) or back in time (negative Swing value). The Swing slider is closely tied to the Resolution menu, meaning that the correct Resolution (corresponding to your selected notes) must be selected in the Resolution menu in order for the swing to work properly. Selecting a resolution value shorter than that of the selected notes will cause the Swing Slider to have no effect.

For example, let's say that you have selected a series of 1/8 notes for the Ride cymbal. In order to create a typical 1/8th note swing pattern on the Ride cymbal (where every other note is moved forward in time by approximately 2/3rds), it will be necessary to choose 1/8th notes from the Resolution menu. Then adjust the swing slider to 100.

Straight 1/8th notes.

Swing 1/8th notes. Notice how there are long and short time durations between the notes.

RANDOMIZE TIMING SLIDER
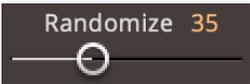
The Randomize Timing Slider will change the timing of the selected notes in an un-uniform way to achieve random timing. This can be especially useful when sequencing your own MIDI from scratch in the Grid Editor for a looser feel.

NUDGE

Nudge will move the selected notes by the set amount. The Nudge unit is set in the Grid Editor Options menu.

Option + Left / Right arrow (Mac) Alt + Left / Right arrow (PC)

5.1.3 THE HEADER DROP-DOWN MENUS

There are three drop-down menus in the Grid Editor header, in this part of the chapter we will walk you through each one step-by-step.

SELECT MENU

The Select Menu provides useful options for selecting groups of notes by note division so that they can be moved or altered together as a group.

- **All:** Select all of the notes in the currently selected Groove(s).
- **Invert Selection:** (Shift + I) This option will choose the opposite notes of those that are currently selected. For example, if you chose to select all 1/4th notes in a 1/8th note

sequence, the selected notes will fall directly on the 1,2,3, and 4. If you were to invert this selection, the selected notes would fall on the "and" in-between the 1,2,3, and 4.

- **By Resolution:** You can select notes based on resolution. In order to use these selection options, click on the Note Lane (to select all notes in that lane), or lasso select a group of notes that you want to refine with the pointer tool. Then by choosing one of the Note Values in the Select menu EZD3 will refine your selection so that it only includes the notes that fall on the desired note divisions. This can type of selection can be performed for multiple note lanes at a time by shift-clicking them to add them to the selection.
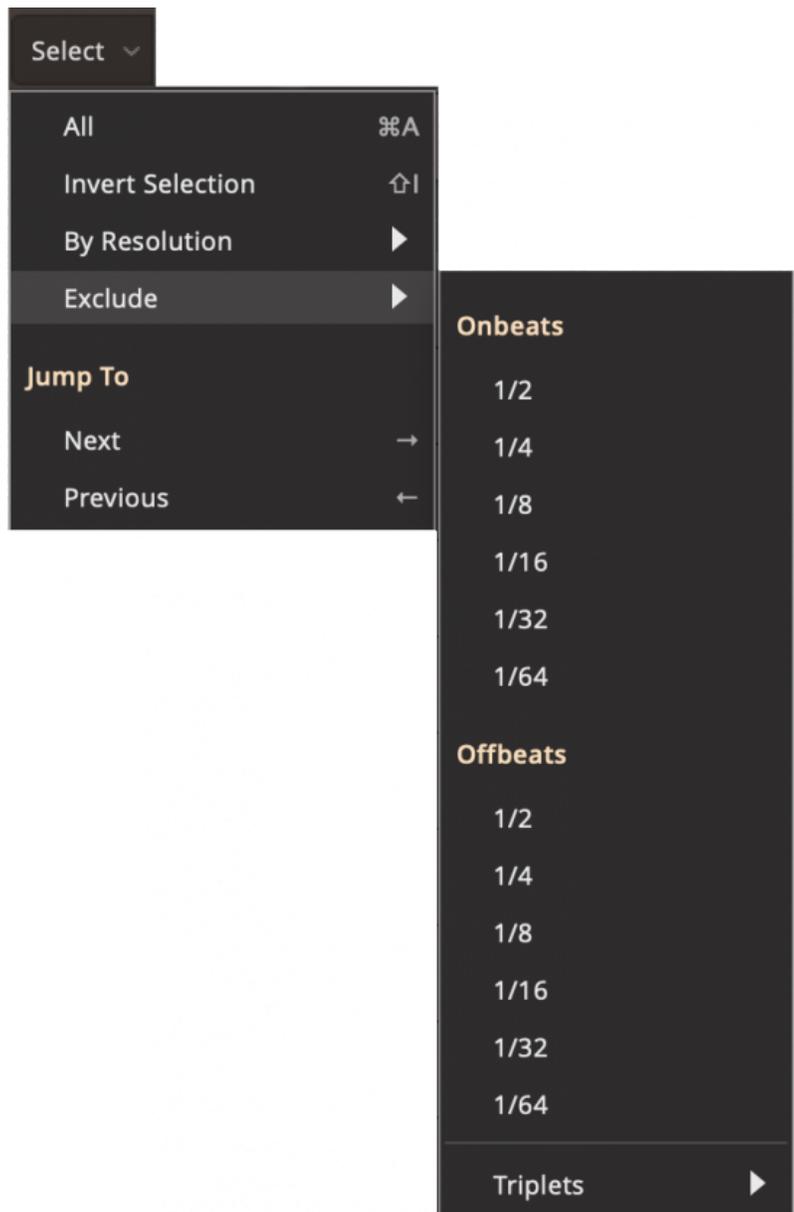
- **Exclude:** Exclude can further refine a selection by removing Onbeats or Offbeats from the group of selected notes.

- **Jump To:** (Left and Right arrow keys) This option will select either the Next note or the Previous note. Jump To selects one note at a time, so if a group of notes is currently selected and the Jump To keyboard short-cut is performed it will select the Next or Previous single note to the selected sequence.

A practical example of how this would be used would be to select all of the 1/4th notes in a 1/8th note Hi-Hat pattern, and then reduce their velocity as a group, or drag this custom selection of notes to a different articulation of the Hi-Hat.

NOTE MENU

- **Copy:** Copies the selected MIDI notes
- **Cut:** Cuts the selected MIDI notes.
- **Paste:** Pastes the MIDI notes in the clipboard to the playhead position.
- **Remove:** Removes the selected MIDI notes
- **Mute:** Mutes the selected MIDI notes.
- **Stretch Notes:** Changes the tempo of the selected notes with different types of tempo alterations, also available as a filter in the Grooves tab, see chapter 4.1.
- **Timing Settings (Quantize, Nudge, Swing):** Options for copying and pasting Timing settings to selected notes in the Grid Editor, and an option to set the Quantize option to the minimum value.
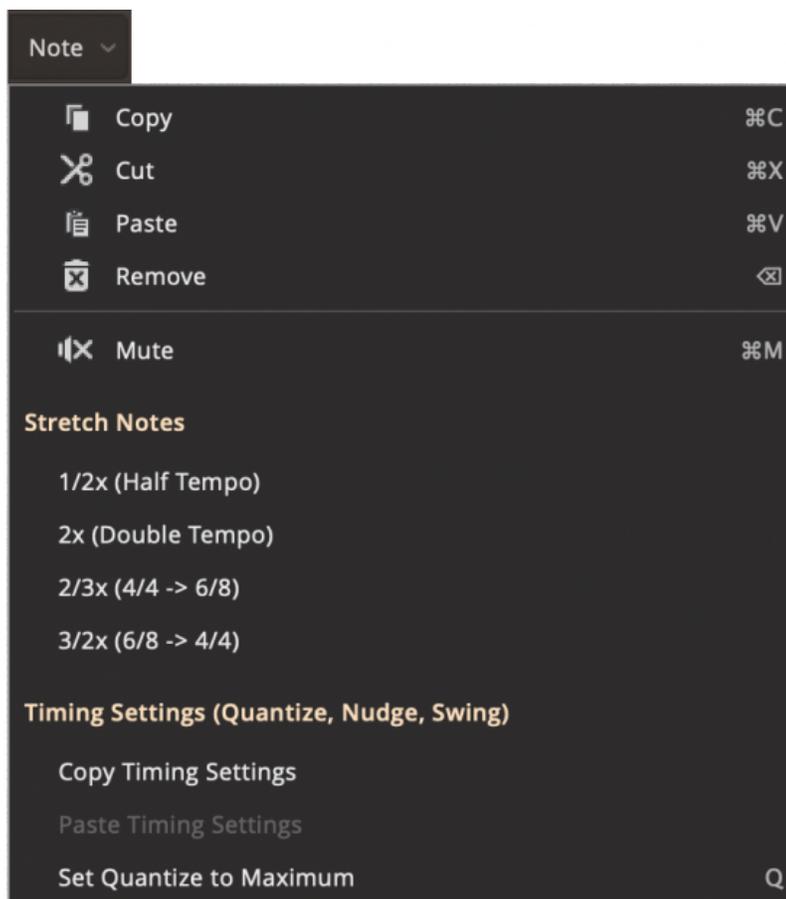
OPTIONS MENU

- **Auto-Scroll:** This option will cause the Grid Editor note display to scroll along with the playhead as it plays back your sequence. If Auto-Scroll is disabled the Note workspace will remain in a static position.

- **Snap to Grid Options:** Here you can choose for notes to snap to the selected Quantization level or the Relative Grid. Relative Grid uses the relative distance between notes regardless of if they sit on grid lines or not. For example, if you recorded MIDI yourself that is very slightly off of the grid and you want to adjust the timing moved notes would snap to a distance of the Quantization value rather than the grid itself. This keeps the original timing and feel intact.

- **Nudge Unit:** These options control the behavior of the Nudge control. Here you can select 1/128th note, Milliseconds, or Follow Resolution, which will use the resolution setting in the Resolution menu.

- **Preview Sounds:** This allows the user to turn off the sound preview of the articulation when clicking on a note. This is handy while editing when you do not want to hear sounds while adding or moving notes.
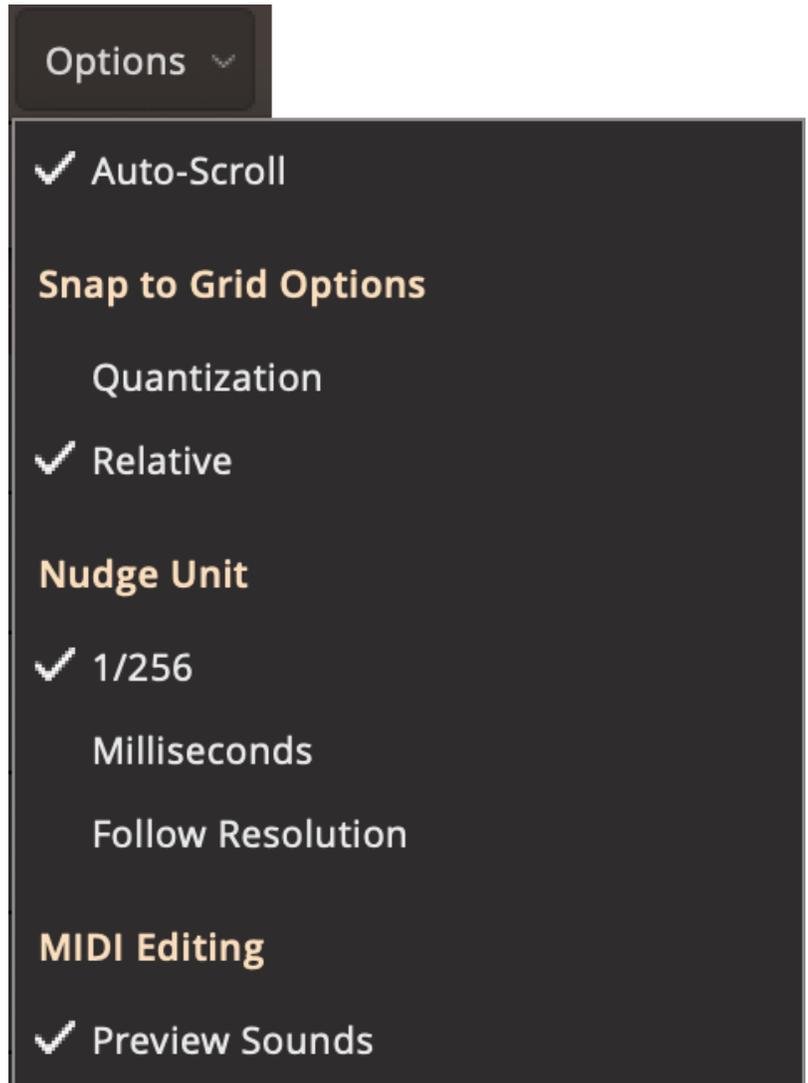
5.2 THE MIDI NOTE WORKSPACE

This is the main area of the Grid Editor, and it is where you will add, remove, and change the timing of notes. MIDI notes in EZdrummer 3's Grid Editor are represented as grey

diamonds. Velocity is represented in the brightness of the diamond, meaning that the more bright a MIDI note appears in the interface the higher its velocity.
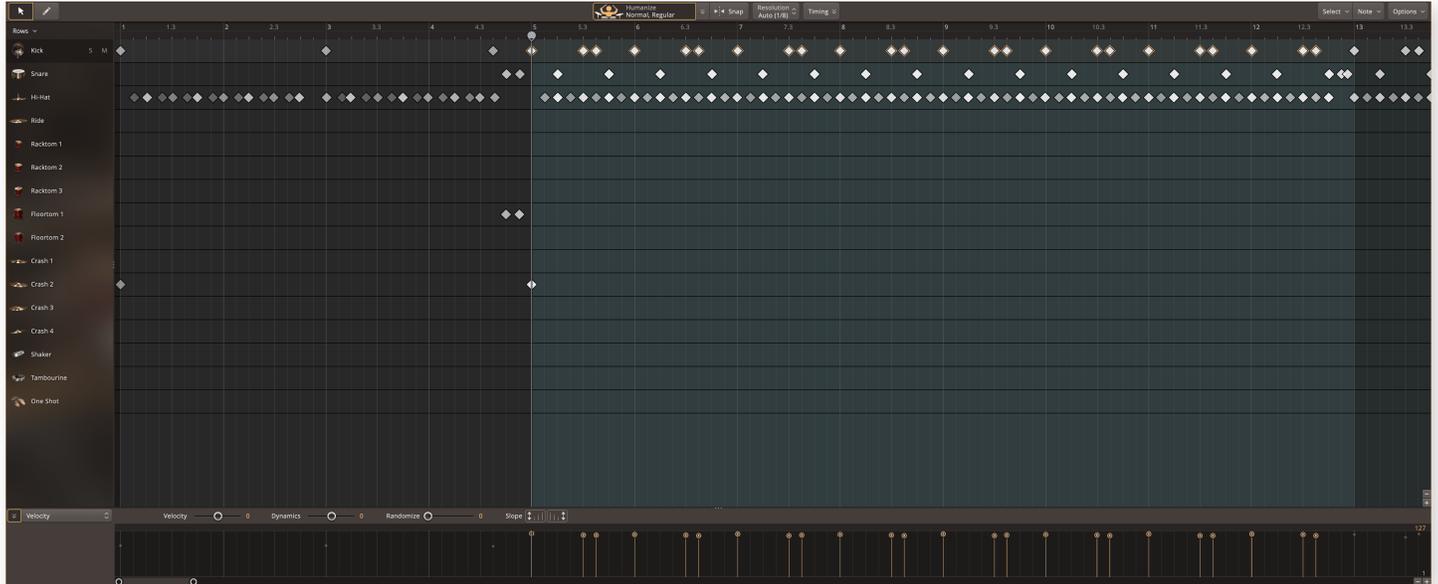
5.2.1 THE NOTE ROWS

To the left of the MIDI note workspace are the Note Rows for every loaded instrument in your kit. Clicking on a Note Row for an instrument will select all MIDI notes for that instrument in the selected Song Block or Blocks.
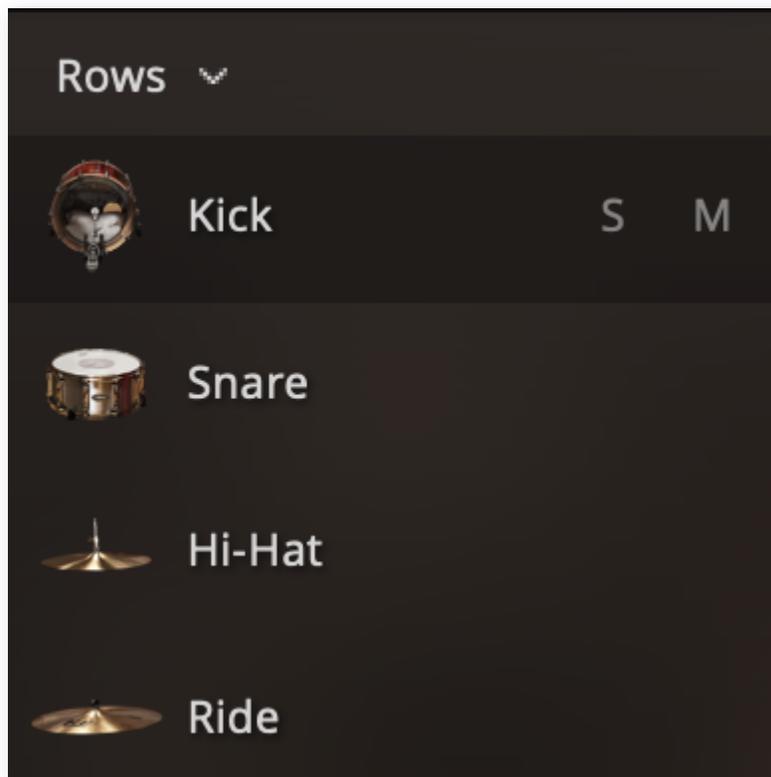
The Rows Menu allows for the following options:

- **Reset Order:** Reset Order will re-order any user changed Note Rows to the default EZD3 order.
- **Collapse All:** Choosing the Collapse All option will cause all note rows to collapse their Articulation Note Rows. These can be thought of as sub rows to the main instrument.
- **Expand All:** Expand all will expand all articulation note rows for all instruments.
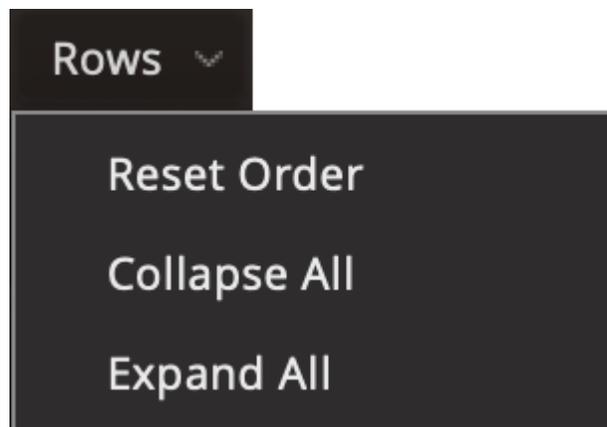
Each Note Row contains the following:

- **Expandable / Collapsible Arrow:** This arrow will display Note Rows for all of the included articulations of the instrument. Once expanded MIDI can be edited or added on these sub Note Rows.

- **Menu:** The Note Row menu contains the option to "Show Note Length." When creating drum MIDI note length is *not always* important because most instruments don't need or respond to note-off messages.
- **Solo and Mute:** These options allow you to quickly solo or mute the selected Note Row MIDI can be heard or muted on an instrument by instrument basis.

CLEAR/RECALL SOLO AND MUTE
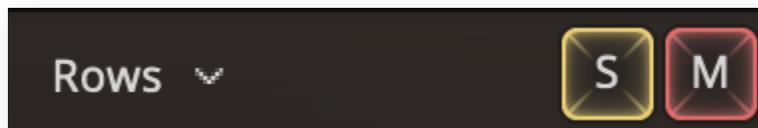
If a note lane (or multiple lanes) in the Grid Editor has been Soloed or Muted a global option will appear to clear all Soloed or Muted lanes. If the solo or mute function has been cleared a "Recall Solo or Mute" button will appear. This will recall the user-selected Solo or Muted channels.

ACCESSING ARTICULATION NOTE ROWS

Instruments that have multiple articulations recorded display an arrow in the Row list. Clicking on that arrow will display all of the available articulations for that instrument below as sub Rows.

SELECTING NOTES

- Individual notes can be selected by clicking on them.

- Multiple notes can be selected by clicking outside of a note and dragging a lasso over the desired notes.
- Clicking a Note Lane will select all notes in the Song Block for that instrument.
- Option-click and drag to copy notes (Mac). Alt + Click + Drag (PC)
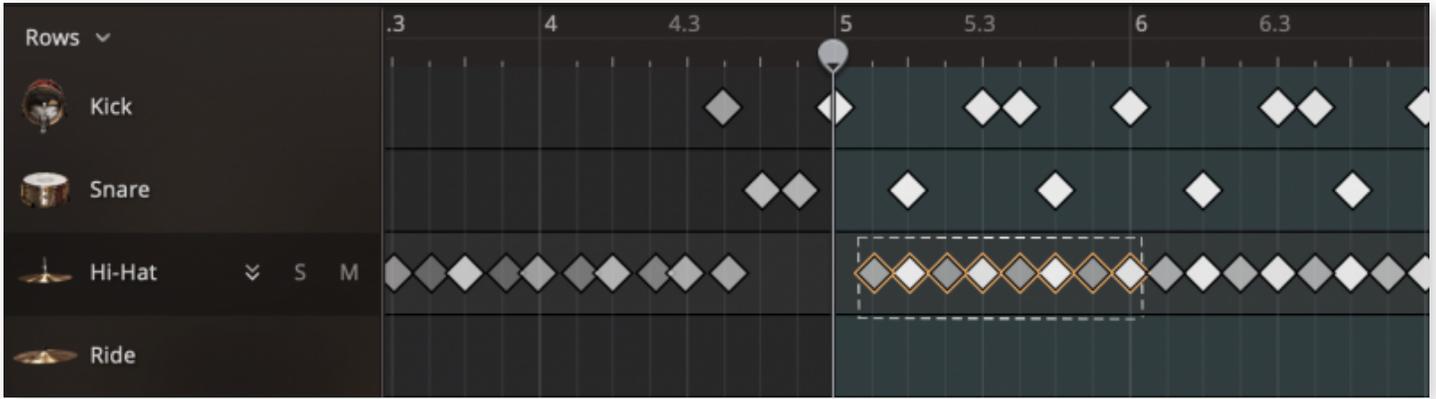
Click and drag to create a lasso and drag over multiple notes.

5.2.2 ADVANCED MIDI EDITING & AUTOMATION

In theory, the Humanize feature that is implemented in the EZdrummer 3 Grid Editor should take care of most of your needs so that you do not need to edit these following parameters in detail, but sometimes you want to dive into the details to customize precisely how you want EZdrummer 3 to play your groove.

VELOCITY POINTS

Each MIDI note also has a corresponding velocity point that can be dragged up or down to increase or decrease that note's velocity either by dragging the velocity point itself or by using the Velocity Slider to the left.
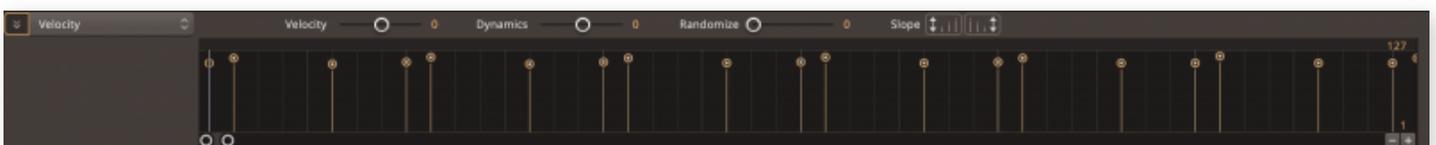
DYNAMICS

To the right of the Velocity Slider is the Dynamics Slider. The Dynamics Slider is intended to be used with multiple selected MIDI notes that have differing velocities. When multiple notes are selected with differing velocities the Dynamics slider will increase the distance between the highest and lowest velocities.

In this picture, the Dynamics Control is turned to 100%. Thus there is a lot of distance between the highest and lowest notes.

In this picture the Dynamics Control is turned down to 0% and therefore all notes are at the same velocity.

RANDOMIZE VELOCITY

The Randomize Velocity Slider will do just that, randomize velocities. It's incredibly useful if you have created a MIDI sequence yourself and would like to adjust the velocities of the sequence to achieve a more human variance. Like the Dynamics Slider, Randomize Velocities only works with a multi-note selection.

MIDI SLOPE

Perfect crescendos or decrescendos can be created in seconds with the MIDI slope tools. When a group of notes is selected you can use the MIDI slope control to increase or decrease velocities over time.
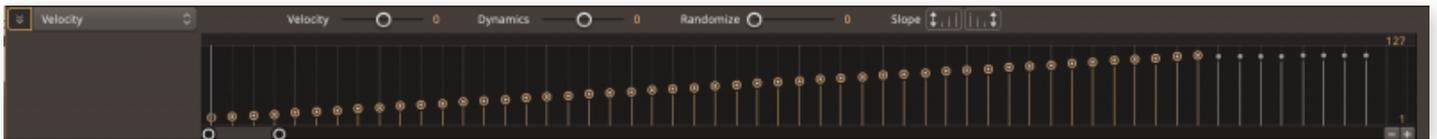
ADVANCED VIEW DROP DOWN MENU

The bottom area of the MIDI Note Workspace contains a menu that allows you to access advanced parameters for further MIDI editing. By default, this menu selection is set to Velocity as this will be the most commonly used.
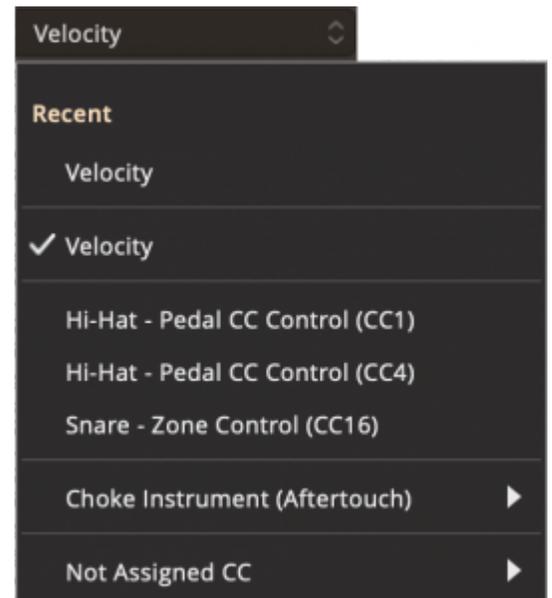
- **Recent:** Displays a list of recently selected options in this menu. This is useful if you have custom assigned CC values or have used Aftertouch and would like to quickly navigate back to these parameters.

- **Velocity:** Choosing Velocity from this menu will change the display to the right of the menu to the default velocity view where note velocities can be adjusted.

- **Pedal CC and Zone Controls:** Choosing any of these CC options will display the Continuous Controller Data for the chosen value. When selected, CC data can be drawn in or edited using the global cursor tools at the top left of the Grid Editor. In MIDI terms, a continuous controller (CC) is a MIDI message capable of transmitting a range of values (0-127). The MIDI Spec makes 128 different continuous controllers available

for each MIDI channel. The most commonly used CC values for EZdrummer 3 are contained already assigned and displayed here by default. All other CC values can be found under the Not assigned menu option.

- o Enable Curve: Clicking the Enable Curve allows you to draw in or edit an existing CC Curve. Alternatively the curve could be bypassed by de-selecting the Enable Curve button.
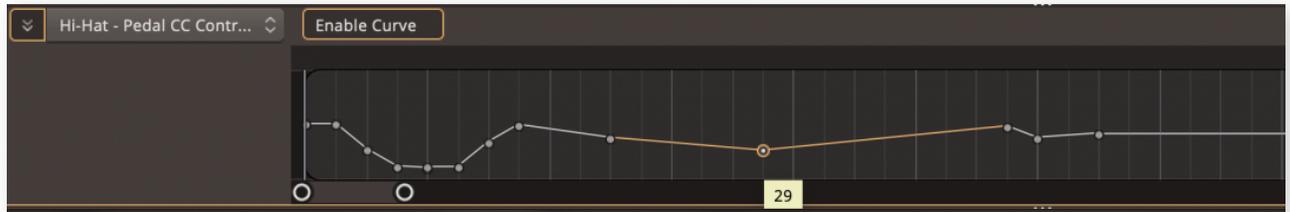
- **Channel Aftertouch:** Here you can select from the available aftertouch channels for your kit. Aftertouch can be selected on a note basis or as a MIDI channel (for controlling all aftertouch on an entire MIDI channel). To edit Aftertouch manually first select the desired Aftertouch Note from the Aftertouch Menu, and then draw in (with the pencil tool) an aftertouch box some point in time after the note. When the playhead reaches the point of the aftertouch box the choke will begin.
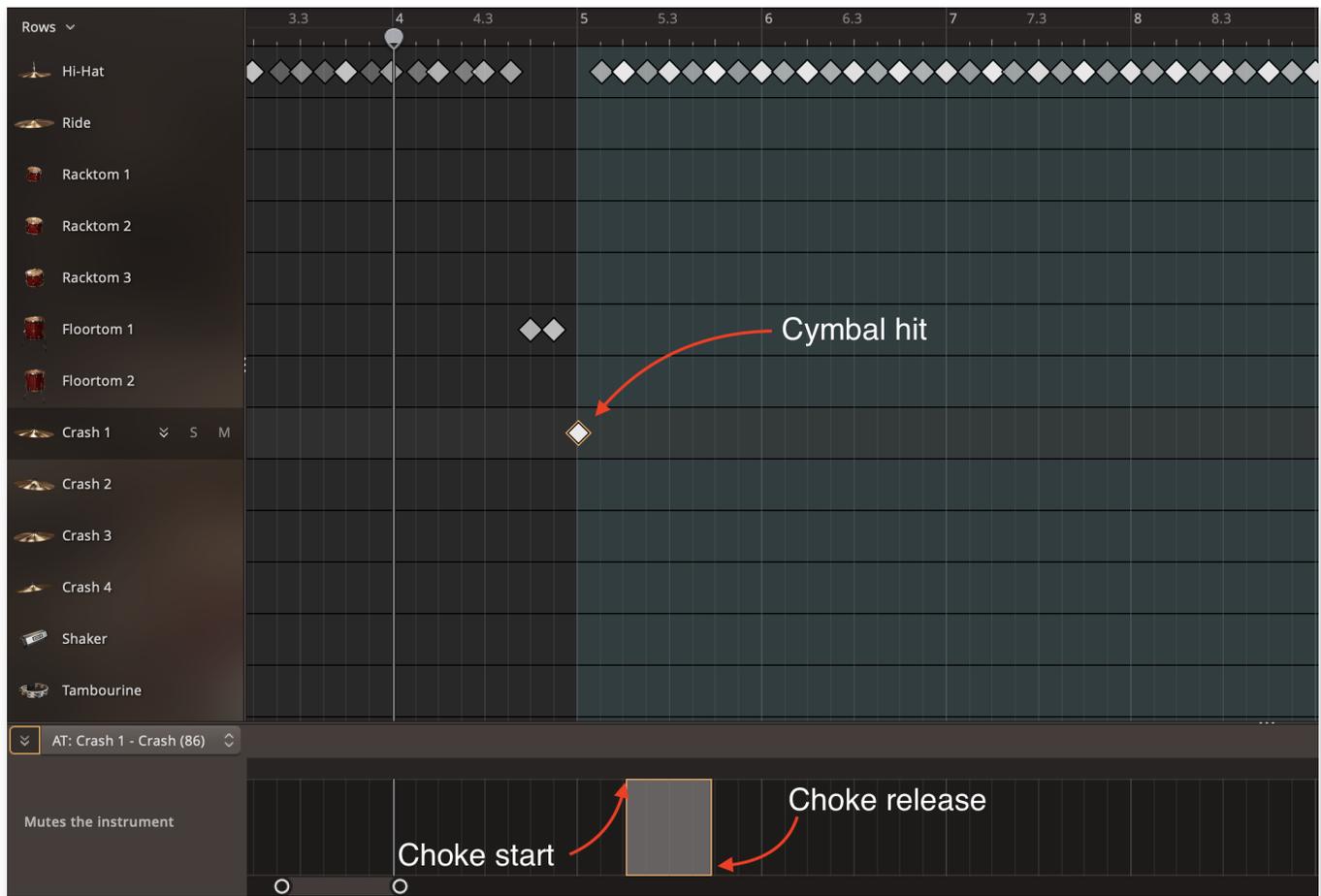
- For example, if you have a note on crash #1 and you would like to choke this cymbal after its initial hit, select Crash 1 from the Aftertouch sub-menu, then draw in an Aftertouch Box at the desired point (*after the initial hit*) that you would like to choke the cymbal. The Choke Start position indicated in the picture can be thought of as the moment that a hand grabs the cymbal, and the choke release position can be thought of as the point at which the hand releases the cymbal. For this reason, any cymbal notes that occur during the same time period that an Aftertouch "Box" occupies will have an instantly choked sound (just as if you were holding a cymbal in your hand while hitting it).

- **Not Assigned CC:** A list of all unused CC values.

Its important to mention that CC data will not appear with Toontrack's Grooves. All Toontrack grooves use dedicated articulations translated from the originally recorded CC data. This is done for compatibility and ease of editing. CC data would only be present

from MIDI that you have recorded yourself with an electronic drum kit or other MIDI controller.

AUTOMATION

In EZdrummer 3 CC data can be used for more than typical e-drum controls. Some parameters (knobs or sliders) inside of EZdrummer 3 can be assigned to a CC value therefore they can be automated! To assign a parameter inside of EZdrummer 3 to a CC value simply right-click the desired control and choose a CC value from the CC submenu.
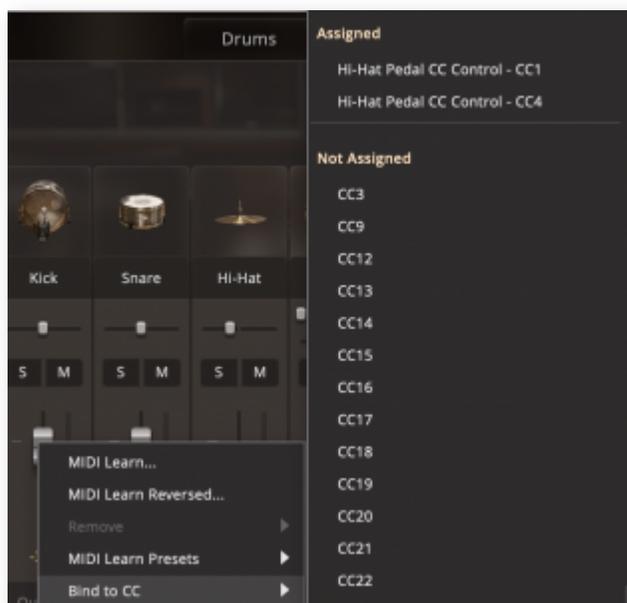
In this case, the fader for the Kick channel in the Mixer view has been right-clicked and assigned to CC 12.

Once a parameter has been assigned to a CC value, the CC editor is where you would edit its automation. Clicking on the drop-down menu will display any currently assigned CC values below the preset CC values. Simply select the CC value that you want to edit and then use the pointer tools to create breakpoints.

In this picture, we have assigned the Kick channel Volume to CC 12. This was done by right-clicking the Kick fader in the Mixer view and then selecting CC 12 from the CC submenu. Now that it is assigned, automation for this CC value can be drawn inside of the Grid Editor.

All assignable parameters display the MIDI CC context menu when right-clicked. By default, CC 1, 4, and 16 are bound to Hi-Hat Pedal Control and Snare Zone Control respectively.

The assignable parameters are:

- Master Volume,
- The transport controls Play, Record, Stop, and Toggle Loop,
- All Mixer and effects controls in the Mixer Tab.

As you assign these to a parameter, they will be listed in the Advanced View Drop-down menu in the grid editor ready to be automated.

Good to know...

The MIDI CC context menu contains the following options:

- **MIDI Learn...:** This option puts EZdrummer 3 on standby waiting for you to send a message from the control you want to assign the selected parameter to. Click anywhere on the screen to cancel MIDI Learn.

- **MIDI Learn Reversed...:** The same as MIDI Learn, but all values are translated into the opposite end so that a value change of 0-10 from the controller is translated as 127 to 116 in the envelope and so on.

- **Remove:** This submenu lists all assigned parameters and lets you unassign them. If there are no parameters assigned to any control, the option is disabled.

- **MIDI Learn Presets:** Once you have assigned parameters to MIDI controls to your liking, you can save them as a MIDI Learn Preset. To save a preset simply select Save or Save As..., while Delete removes the currently loaded MIDI Learn Preset. Saved presets are located in the User Presets sub-sub menu.

- **Bind to CC:** This submenu contains all assigned and unassigned controls for manual assignment. Simply select the control you want to assign the parameter to.

6. THE MIXER TAB

The Mixer tab allows you to control the overall balance of the selected Library Preset. Amongst other things, it allows you to tweak levels, mute or solo individual channels, adjust effects, and set output routing. The number of channels in the Mixer is dynamic and varies with the selected Preset.

VIDEO INTRODUCTION

EZdrummer 3: Mixer

6.1 THE MIXER MENU

The Mixer Menu provides useful options for altering the mixer globally.

- **Stereo Reverse:** This option will change all of the panning in the mixer for every channel to the opposite side. Channels panned in the center will remain in the center. Drummer perspective is selected by default, and that will have the instruments panned so that they sound like you are sitting behind the drum kit and playing. The Audience perspective option will sound like you are standing in front of the drum kit.

- **Stereo or Multichannel Outputs:** The output selection provides the choice between a quick stereo and multi-channel output preset. Choosing stereo simply selects output 1/2 for every microphone channel, while choosing Multichannel loads a Multichannel output preset that groups microphone channels by instrument and buses each instrument category to the same output. It should be noted however that this is just a preset suggestion and all outputs for all channels can be set individually by the user in any way that you choose.
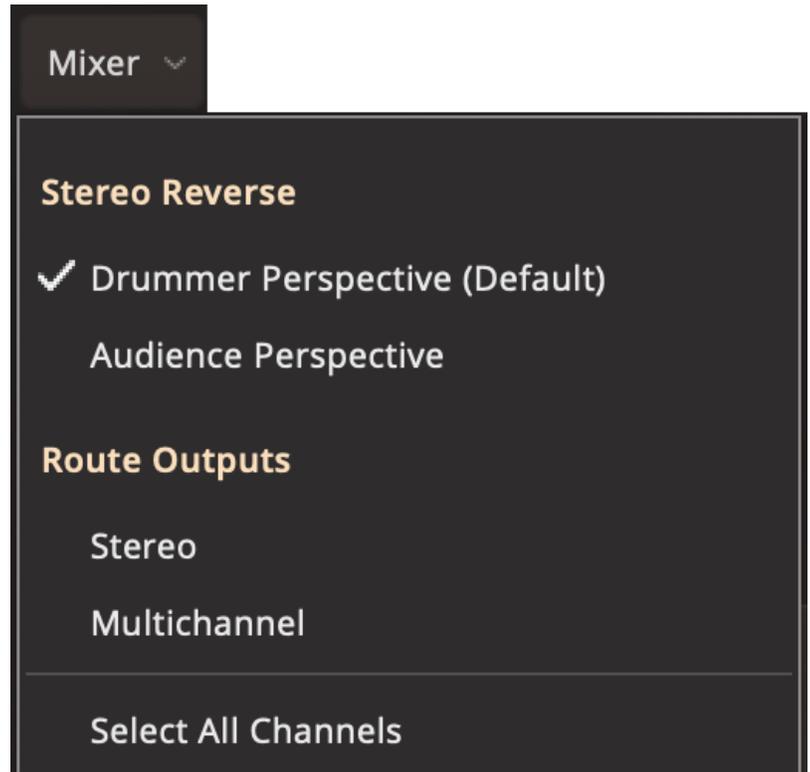
6.2 MIXER CHANNEL DESCRIPTION

In the Mixer tab you have – depending on the selected Library Preset – a set number of channels with various standard controls and pre-configured effects. The channels are basically a representation of what was used during recording and subsequent mixing down as the Library Presets was created.

The Mixer allows control over microphone volume, pan, solo, and mute as well as the specially tailored effects. Each Library Preset has of course been carefully balanced to sound as good as possible, but feel free to experiment. You can save any changes made in the Mixer with the project or you can save your own Library User Presets, available for any project. See 3. The Drums Tab for more information about User Presets.

GRAPHICAL REPRESENTATION

At the very top of each channel, there is a graphical representation of the source audio that is being sent to that channel. For example, the Kick channel has a clickable Kick graphic that will trigger the kick drum as if it was clicked in the Drums view.

THE CHANNEL CONTROLS

- **Pan Control:** Moving back to where we left off on the Microphone Channel strip is the pan control. Here you can alter the spatial positioning from left to right of the desired channels.
- **Channel Name:** Above the Pan Control is the channel name.
- **Level and Fader:** The level indicator shows the current value of the fader (orange). The Level Fader allows you to control the volume of the channel.
- **Solo/Mute:** Solo (Isolate), Mute (turn off audio).
- **Output:** Clicking in the output section opens a menu where you can choose from any one of the 16 stereo outputs or 16 stereo buses. Multiple outputs will be described below in the output section of this chapter.

INSTRUMENT CHANNELS AND GROUP CHANNELS

In the Mixer, you have a number of channels. Some channels allow you to adjust the microphone volume for specific instruments such as Kick, Snare, Percussion, or Hi-Hat.

Other channels, which can be called Group Channels, control the relative volume of the whole kit as picked up by microphones such as Overhead (OH) or Room Ambience (Amb).

Instrument Volume, see 3.2 The Instrument Properties, is the volume that the specific Instrument is played with, that is, the relative level of the sound that the instrument will produce in all microphones.

Microphone Volume, found here in the Mixer, is the volume that a specific microphone will produce, that is, the relative level of sound that all instruments will produce in that microphone.

SELECTING CHANNELS

You can select a channel by clicking anywhere in it where there is no control, for example on the name. By holding Ctrl (Win)/Cmd (Mac), you can select several channels. Shift-click also works to select a range of channels. Selected channels will be "grouped" so that moving the volume fader for one channel will also move the fader for other selected channels while retaining the relative balance between them.

Apart from the volume fader, also Solo/Mute status and output channel are "grouped" for selected channels. Clicking on a selected channel again deselects it (and all other channels that were selected).

USING THE MIXER

Every Library Preset has its own set of effects and effect parameters. Examples of effects are delay, reverb, EQ, mic bleed, compression, and tape drive.
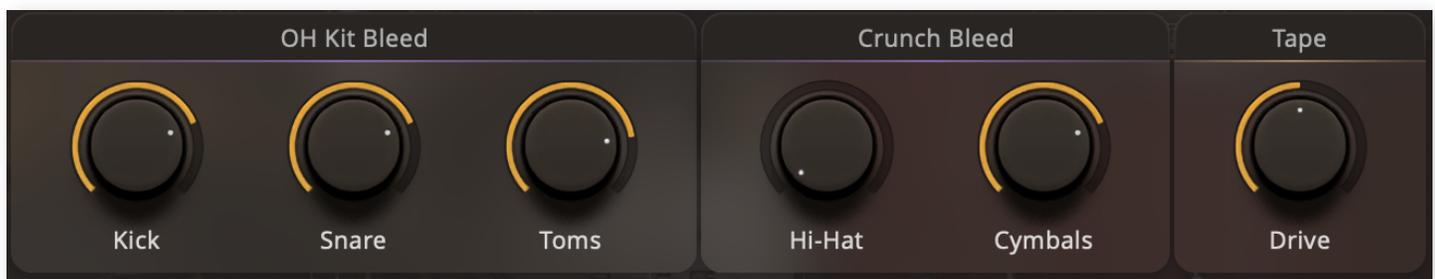
You can find out which channels are affected by a parameter by clicking the control. Affected channels will be highlighted in the mixer.
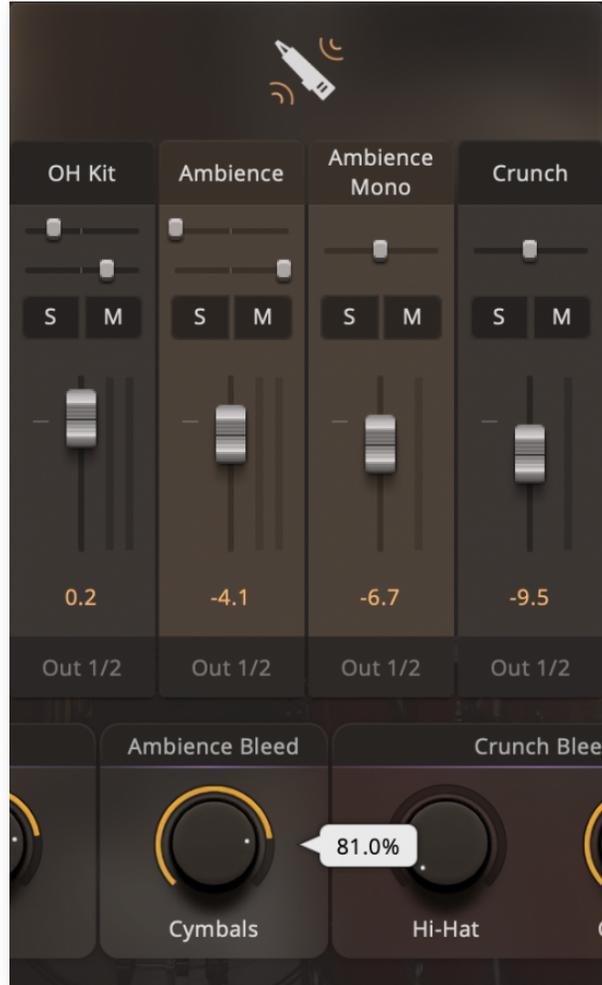
In a Library Preset, effects are "hard-wired" to specific channels and you cannot remove or add effects, but you can usually change to what degree an effect is used and also set other parameters.

Some terms may need explaining. "Bleed" or "Mic Bleed" refers to what degree a specific microphone channel picks up other instruments in the kit, which in turn changes the overall sound. "Tape Drive" is a saturation effect emulating how the sound changes the harder the recording level is pushed when recording on analog tape.

OUTPUTS

By default EZdrummer 3 outputs into your DAW as any stereo instrument you may be familiar with. It can, however, be launched as a multichannel instrument in most

compatible DAWs so that further processing can be applied, therefore allowing you to use your entire arsenal of plugins within your DAW.

MULTIPLE OUTPUTS (MULTI-OUT)

Clicking the 'Output' selection at the bottom of the channel strip will reveal all possible outputs for this particular channel. Here it is possible to select different outputs for each channel (or for groups of channels) and send them to individual tracks in your host DAW. This is a common practice because many users like to have access to all of the individual instruments in the drum kit so that they can be processed with other plugins alongside all other instruments that they have recorded in their DAW

As stated earlier in the chapter there is also a multi-channel preset available in the Mixer menu. This preset will change the outputs of all channels with similar channels being grouped in a commonly used way.

Routing the outputs of EZdrummer 3 to individual tracks in your DAW is handled differently in each one of Toontrack's supported host DAWs. Please refer to the DAWs manual for more information about routing outputs from plugins.

7. THE SONG TRACK

The Song Track is your canvas. It's where you will drag grooves from the Grooves tab in order to sequence and edit your drum track.
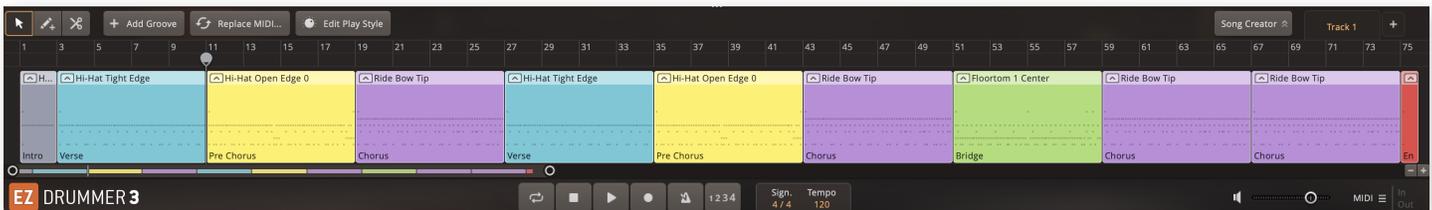
The Song Track is a global function present on the Drums, Grooves, Grid Editor, Mixer, and Bandmate tab. Screen space is a valuable asset when working with EZdrummer 3, and for this reason, we have made it possible to increase or decrease the size of the song track by hovering the mouse on its uppermost outline. When doing this the mouse cursor will change to a double arrow and you can drag the song track to be larger or smaller, or collapse it to the minimum size. This can also be accomplished by using the option in the View Menu.

7.1 THE SONG TRACK VIEW

The song track is composed of three areas: its very own header bar, the song track, and the global transport. Edit Play Style, while connected to the song track, has its own view. We will describe Edit Play Style in detail in a later chapter.

You can resize the song track to an extent, and it can be minimized to give you more space when working in the different

tabs. To resize the song track, simply grab the handle in the top middle of it and drag up or down. Drag far down to minimize the song track.
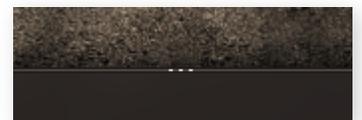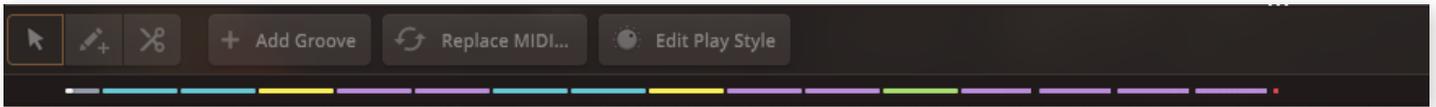
In its minimized state, you can still see the different song parts and you can also move the playhead by dragging or clicking.

7.2 THE TRANSPORT BAR

The transport bar contains the song track transport controls, the track settings, as well as the audio out and MIDI in and out monitors.

TRANSPORT CONTROLS

- **Follow Host:** This button is displayed when you load EZdrummer 3 as a plugin inside your DAW. When the button is highlighted, the transport controls follow your host. This means anything in your song track will play at an appropriate position whenever you activate playback in your host. It also locks the song track tempo to whatever is set in your DAW, regardless of any information in the tempo track.

- **Toggle Loop:** Activates or deactivates looping between the loop start and end markers. To set loop markers, simply click and drag on the bar numbers in the timeline. If there are no loop points set, activating the loop markers are automatically set to the entire track. Looping can also be toggled by clicking the loop area once it has been set.

- **Stop:** Stops playback. If pressed when playback is paused, it jumps between last playhead position and the loop start marker (or the first bar if no loop

markers are set or active).

- **Start:** Toggles playback. Starts playback if playback is paused, and stops playback if playing.

- **Toggle Record:** Activate MIDI record mode. Enables recording MIDI straight into the song track. Recording is started by pressing Start.

- **Toggle Metronome:** Activate to hear the metronome during playback. The metronome can be configured from the Metronome Settings page.

- **Toggle Count-in:** Activate count-in when MIDI record mode is active.

Note about Follow Host and EZD3 as a plugin

EZdrummer 3 supports changing meters in the timeline. Many DAWs do as well, but these settings are not relayed to their plugins. If you activate Follow Host in a project with multiple time signatures, while playback will be perfectly synced in time with the DAW, you may need to update the time signature track to match that of your DAW if you run into issues lining up beats.

TRACK SETTINGS

The song track settings are set per song track. Changing tracks will automatically update these values.
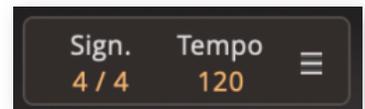
Note

We often use the terms song track and project interchangeably. While a project may contain multiple song tracks with different settings, in the case of projects with only a single song track, these settings do govern the entire project.

The tempo and time signature tracks editors can be accessed via the menu to the right of the song track tempo. More about the Time Signature Editor and the Tempo Editor later in this chapter.
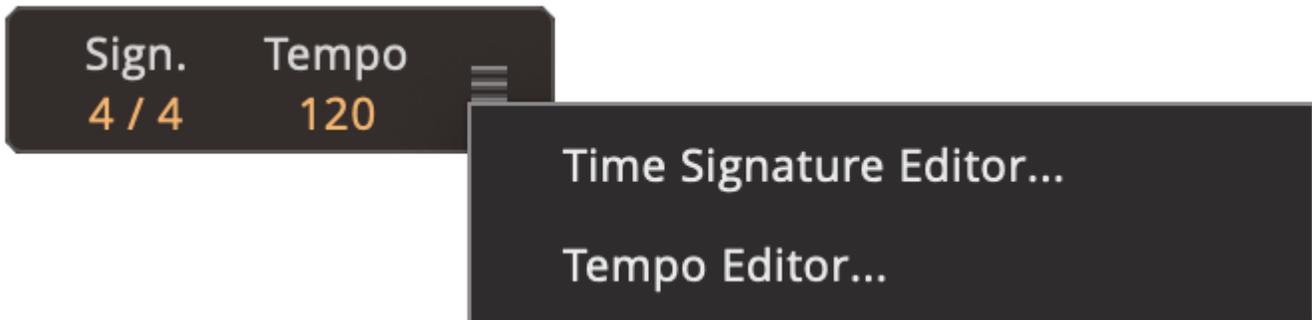
TIME SIGNATURE

The first track setting is the time signature. Only even subdivisions are available, but you can select the number of beats in a bar freely (within reason). When you drag a groove, or any MIDI file, into an empty song track, the song track time signature is automatically updated to match the groove. EZdrummer 3 does not support multiple time signatures within a single groove; Only the initial time signature is changed by this action and additional changes must be added from the time signature editor.

IMPORTANT

Changing the time signature does not modify or affect song blocks or grooves in any way. A 4/4 groove is not converted or cropped to fit in a 3/4 track, and especially odd meters will need to be manually adapted.

Time signature can also be changed within a track, in which case this setting is active until the first change in the time signature track. The time signature editor is described in the next section of this chapter.

TEMPO

Setting tempo is more
straightforward than time signature.
Simply click on the tempo value
and tap or set your desired tempo.
You can also double-click the tempo to input a value directly. Since tempo does not affect
quantization (although lowering tempo can cause faster grooves to sound out of rhythm),
this slider does not have any averse effects on the song structure itself.

As with the time signature, tempo has its own track in the timeline. If you add tempo
changes in that track, the value in the transport bar is active until the first change in the
Tempo Editor. The Tempo Editor is described in the next section of this chapter.

INPUT AND OUTPUT MONITORS

At the bottom right is the master volume monitor and
fader. If you have dialed in your Mixer levels to perfection
and just want to alter the output levels, this is the place to
do it. Ctrl/Cmd-click to reset it to unity.
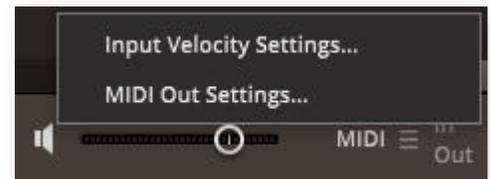
Next to the master volume is the MIDI In/Out monitor. These indicators flash green
whenever EZdrummer 3 receives (In) or sends (Out) a MIDI message. MIDI out is disabled
by default and is activated in the general settings page. You can access the relevant
settings pages for MIDI by clicking the hamburger menu.

WINDOW RESIZING

EZdrummer 3 standalone is fully resizable (down to a minimum size). Simply grab the edge
of the EZD3 window and drag to change its size. In case EZD3 is loaded in a window that
does not support resizing, there are also preset sizes available in the View global menu,
which is described in 9.5 The View Menu.

7.3 THE SONG TRACK HEADER BAR

The header bar for the song track is always close at hand and contains the tools you will use when you build your song from scratch, or when editing your song once its structure is in place. All the options in the header bar work within the context of the song track, and affect the song part types and MIDI within the track.

On the far left side are the different cursor tools used in the song track, as well as the Add Groove button. Holding Alt/Cmd+alt is a useful way of quickly changing tools. The pointer and pencil tools turn into the split tool when Alt/Cmd+alt is held, while the split tool turns into the pointer tool. Only the pointer and pencil tool can resize blocks in the timeline.

- **Pointer Tool:** Also called the selection tool, in this mode you can select and move blocks. Clicking and dragging an empty spot in the song track lets you make an area selection.
- **Pencil Tool:** This tool is strictly for inserting and removing blocks in the different tracks. It only inserts blocks in a single track at a time and only within a single bar. To insert longer blocks, simply hold the mouse button down and drag to the side, and you can make them as long as you like. To remove a block, double-click it. The pencil tool always snaps to the current grid resolution, so if you want to insert blocks shorter than a bar, zoom in first.
- **Split Tool:** Also called the slicing tool. In this mode, the cursor splits blocks already on the timeline. To split the entire groove, hold Ctrl or Cmd when splitting. As with the pencil tool, splitting Grooves always snap to the grid.
- **Add Groove:** This button inserts a full four-bar groove at the first free slot in the timeline *after the current playhead position*. If the slot is smaller than four bars, the inserted groove is shortened to fit the free area. The Add Groove button always adds a simple eighth-note groove.

SONG TRACK SELECTION

On the far right side of the header bar is the track selector, which contains the "Add Song Track" button, as well as a tab for every song track. If you have many tracks, a drop-down menu will appear with all the tracks. The song track tabs have a context menu of their own:

- **Remove Song Track:** This option removes the selected song track. This action is reversible with Undo.
- **Rename:** If you want to rename a song track for easier identification you can double click the tab or select this option and enter a new name for the track.
- **Duplicate Song Track:** This option lets you copy the entire selected track into a new track.

PLAY STYLE BUTTONS
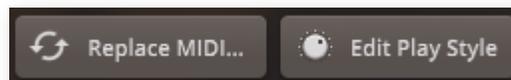
On the left of the header bar are the buttons that will make your groove fit in your song. These are all described more in detail later in this chapter.

IMPORTANT

The buttons in this section apply to MIDI, but which grooves they affect depends on the current selection, so be sure to check what you have selected before using the buttons.

- **Replace Midi...:** This option lets you replace the contents of a groove and is described in detail later in this chapter.

- **Edit Play Style:** This button opens the Edit Play Style view, which has its own section in this chapter.

7.4 THE TIMELINE
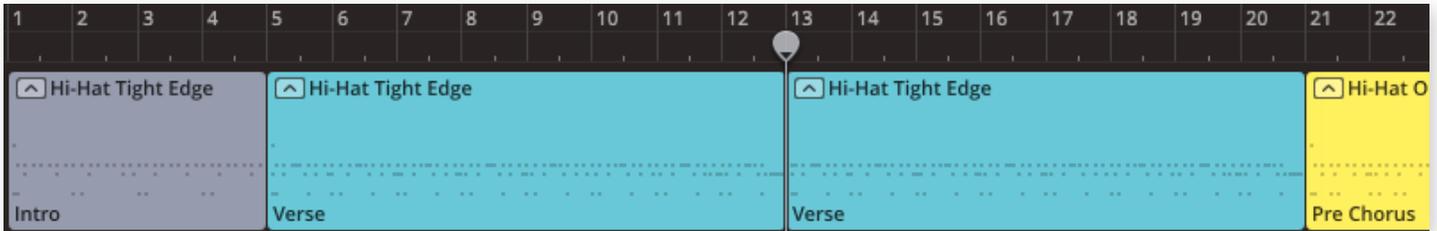
The Song Track itself is the same timeline you would find in a DAW. It has a playhead that moves as you play, a row at the top showing bar numbers, and vertical lines that indicate bar lines and you can zoom in and out to get a better view. Above the timeline is the header bar we just went over; since EZD3 offers a specialized workflow, it offers a few features than a DAW can't. Some of these may be familiar from the other Toontrack products, while others are new and a few have been altered to better work with this product.

THE PARTS OF THE TIMELINE

The timeline is used to visualize and work with grooves with a global
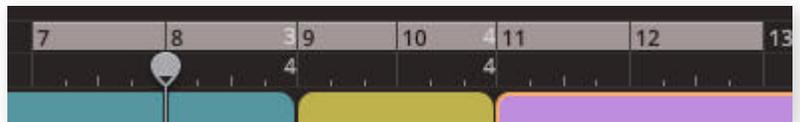
header for the active track. The header contains the bar numbers, any time signature markers, any loop markers, and the playhead. To move the playhead, simply click anywhere to the left or right of the playhead, or click and drag.

At the bottom of the Song Track is a horizontal scrollbar. To scroll,
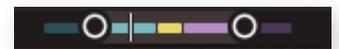
simply drag it to the left or right, or hold shift while scrolling on your mouse wheel. It also works if you have a mouse with horizontal scrolling. To zoom the timeline in and out there

are two buttons in the bottom right, but the more easy way is to drag the round handles at the end of the scrollbar, or hold control while scrolling the mouse wheel.

The **loop markers** are set by clicking and dragging on the bar numbers. The left end of the white bar that appears is the loop start marker, and the right end is the loop end marker. During playback, whenever the playhead reaches the loop end marker it jumps back to the loop start marker and continues playing. Clicking the bar deactivates the loop, the same as pressing the loop toggle in the transport.

The header also has a context menu that is shown when right-clicking anywhere on it:

- **Show Straight/Triplets:** Sets the resolution of the bar subdivisions. Straight automatically divides the bars into half/quarter/eighth notes etc, while triplets do the same, but for triplets.
- **Edit Time Signature...:** Opens the time signature track described below.
- **Edit Tempo...:** Opens the tempo track described below.
- **Set Track Length:** Opens a dialog that lets you specify how long the track is. When exporting the song track, anything outside of this range is cut from the exported file.
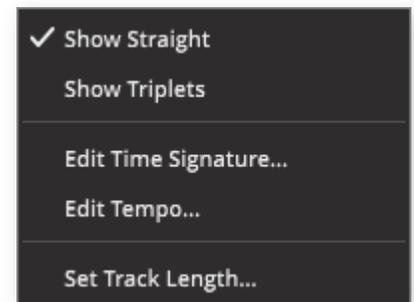
Header... bar?

Now we've introduced two very similar terms. Header bar and just header. What's the difference? A header labels and organizes content, such as the column headers in the search results, or the header in the timeline, containing bar lines, time signature changes, and loop markers. A bar is a row containing different options for interacting with or displaying that content, such as a menu bar, navigation bar, or our conglomeration of the two, the header bar. Technically, a bar is simply a horizontal row, but let's not muddy the waters even more.

THE SONG TRACK PARTS

The song track displays all the information about the grooves in the timeline. The Song Track is used for organizing your track and contains the actual playing grooves.

The common context menu items in the Song Track are:

- **Copy:** Copies the currently selected groove(s) and stores the selection in the clipboard.
- **Cut:** Removes the currently selected groove(s) and stores the selection in the clipboard.
- **Paste at Playhead:** Pastes the groove(s) in the clipboard at the current position of the playhead. The clipboard is tied to the song track, so copying something else not part of the Song Track (such as individual notes in the grid editor or text from outside of EZD3) does not empty the clipboard.
- **Remove:** Removes the currently selected groove(s).
- **Merge:** This menu option becomes available when you have more than one groove selected in a single track. Selecting it merges the two grooves into a single groove. Having multiple grooves selected over multiple tracks merges the grooves only within each track.
- **Set Loop Area:** Sets the loop start and end markers to the first and last bar of the current selection.
- **Select All:** Selects all Grooves in the current Song Track.
- **Edit Playstyle...:** Opens the Edit Playstyle Bar above the timeline.

SONG PARTS

The song part labels help you organize your song into coherent parts. Whenever you add or drag a groove into the song track, the entire groove is always inserted as a groove of a single song part type. The default part type is "Verse", although the groove may contain a more appropriate type.

If you minimize the Song Track, the only indication you have of where you are in your song is the song part colors, so make sure to take the time to give form to your song.

The context menu options that affect the Song Part are:

- **Song Part:** This expandable menu allows you to change the Part Type of the selected Groove(s). Simply expand the menu and choose the type that you want (shown in the image to the right).
- **Manage User Song Parts:** You can create your own Song Parts with a custom name and color in EZdrummer 3 in the Manage User Song Parts window.
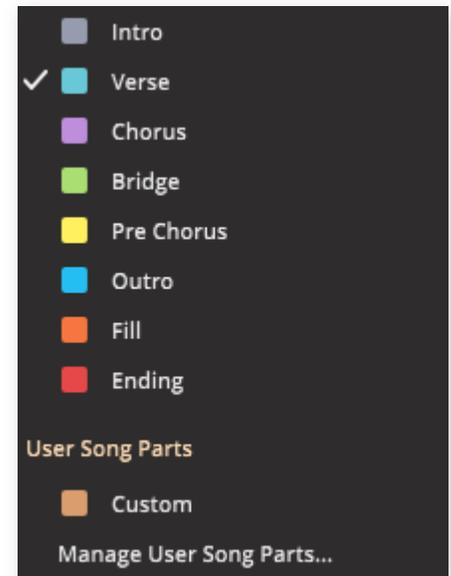
THE GROOVES

The Song track contains grooves, which ultimately contain what EZD3 actually plays from the song track. The grooves are displayed with a visual representation of their contents and can be dragged and dropped straight from the Grooves tab into the song track, or made from scratch with the various tools available. Double-clicking a groove opens it in the grid editor. Working with MIDI is discussed later in this chapter and the next chapter, so we'll keep this section brief.

The context menu options affecting grooves are as follows. They are all available when one or more grooves are selected.

- **Mute:** This option silences the selected grooves. A muted groove is grayed out and has a speaker icon with a cross in front on the left edge of the block.
- **Quantize:** This sub-menu allows you to tighten up the MIDI. Simply select the note value you wish to quantize the selected blocks to, and they will be arranged into a grid with that resolution.
- **Find:** This sub-menu has two options. The *Search with Tap2Find* option applies a Tap2Find search filter in the Grooves Tab. If you have a groove from the grooves tab selected, the **Show In Browser** option applies a browser filter on the containing folder, which is useful if you like a groove, but would like to listen to variations of it.

- **Change Tempo:** Here you can alter the tempo of the selected Song Bock(s) with selections of 1/2 tempo, and 2x (double) tempo. It is also possible to select 2/3x and 3/2x tempo. 2/3x slows the tempo of a groove by a factor of 1/3 so that a 4/4 groove could be used in a 6/8 time signature song. 3/2 speeds up the tempo by a factor of 1.5, so that a 6/8 Groove could be used in 4/4).

- **Remove Notes:** This option displays the Groove Parts that are present in the selected Groove, and provides the ability to remove them on an individual basis from the Groove.

THE TIME SIGNATURE EDITOR

This editor lets you control the meter of your song track beyond the initial setting. To open the time signature editor, simply right-click the bar numbers on the timeline, or open the Track global menu and select "Time Signature Editor". To close the editor, redo the same action, or click the cross that appears in the far right-hand side of the track when it is opened.

The time signature editor is straightforward: the selected groove is highlighted in a lighter shade of gray and you can select multiple time signature blocks by holding Shift or Ctrl and clicking the blocks you wish to select. Shift selects a span, while Ctrl expands the selection with single blocks. The blocks can be resized by dragging at the edge of each block next to the time signature, one bar at a time in the appropriate time signature.

The time signature in each block is set in the same way as the global song track time signature. Clicking the number on the right side opens a list with subdivisions, while you're free to set the left-hand number between 1 and 32. The first block in the time signature track corresponds with the song track time signature, so changing that block also changes the time signature set in the transport bar.

The context menu for the time signature track is different from the others. These are the options available when you right-click a block in the time signature track:

- **Add:** Adds a new time signature block starting on the bar you opened the context menu from, and continuing until the end or the next block.
- **Select All:** Selects all blocks in the track.
- **Copy:** Copies the selected block(s) and places them in the clipboard.
- **Paste:** Pastes the blocks currently in the clipboard on the bar you opened the context menu from.
- **Remove:** Removes the selected blocks from the track. The blocks are replaced by the preceding time signature, which may cause subsequent blocks to misalign, so use carefully.

The Time Signature Editor has a single lane in the timeline, but its own header bar with a drop-down menu.

The Options menu contains the following.

- **Add at Playhead:** Removes the selected block(s) and places them in the clipboard. The block is replaced by the preceding time signature, which may cause subsequent blocks to misalign, so use carefully.
- **Select All:** Selects all blocks in the track.
- **Copy:** Copies the selected block(s) and places them in the clipboard.
- **Paste at Playhead:** Pastes the blocks currently in the clipboard at the playhead.
- **Remove/Remove All:** Removes all, or selected block(s) from the song track. The block is replaced by the preceding time signature, which may cause subsequent blocks to misalign, so use carefully.
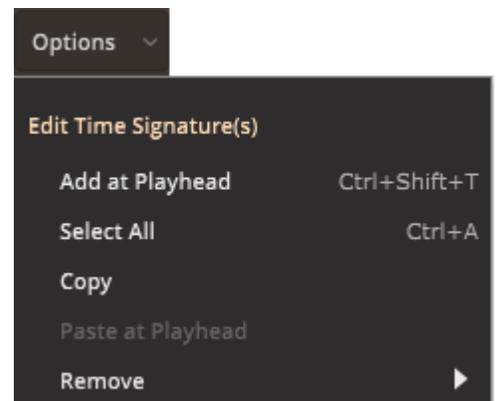
THE TEMPO EDITOR
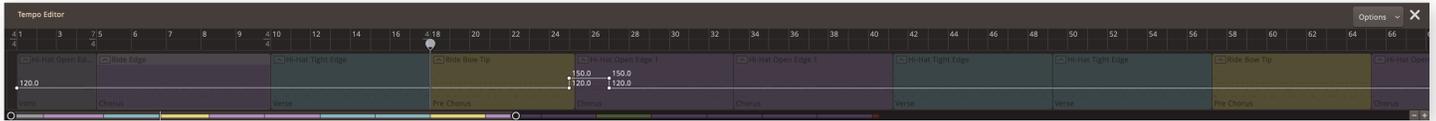
This editor lets you control the tempo of your song track beyond the initial setting. To open the tempo editor, right-click the bar numbers on the timeline, or open the Track global menu and select "Edit Tempo". You can also access the editor via the transport panel as described in chapter 7.2. To close the editor, simply do the same as before, or click the cross that appears on the far right-hand side of the track when it is opened.

The tempo editor timeline is an envelope that spans the entire track. The initial value of the track, the value of the first node, corresponds with the tempo setting for the song track. To select a node or marker, simply click it. To modify its value, grab it and drag it up or down or use the functions available in the tempo track header bar. You can select multiple nodes by holding Shift or Ctrl while clicking individual nodes, or by holding and dragging over an area.

One feature that is handy and important, is that when you're moving a node around, only the selected nodes are affected. This means you can't drag a node beyond another, which prevents unwanted modification of the tempo track. Selected nodes are always in their position relative to each other, so you won't end up in a situation where two nodes are "squished" together because another node is stopping their movement.

The context menu for the tempo track contains three items:

- **Add:** Adds a node *on the line* at the position you right-clicked in the timeline.
- **Select All:** Selects all nodes on the track.
- **Remove:** Removes all selected nodes from the track.
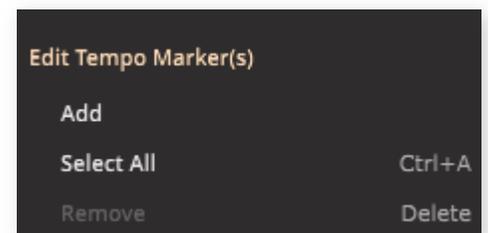
The header bar for the tempo track contains an Options menu that contains similar items to the context menu, but some of the options affect the track as a whole.

- **Add Breakpoint at Playhead:** This sub-menu contains options for inserting a node with or without a tempo change in the tempo track.
- **Select All:** This sub-menu contains options for copying and pasting nodes, as well as removing them.
- **Remove:** Removes all nodes, or the selected nodes from the track.

7.5 REPLACE MIDI...
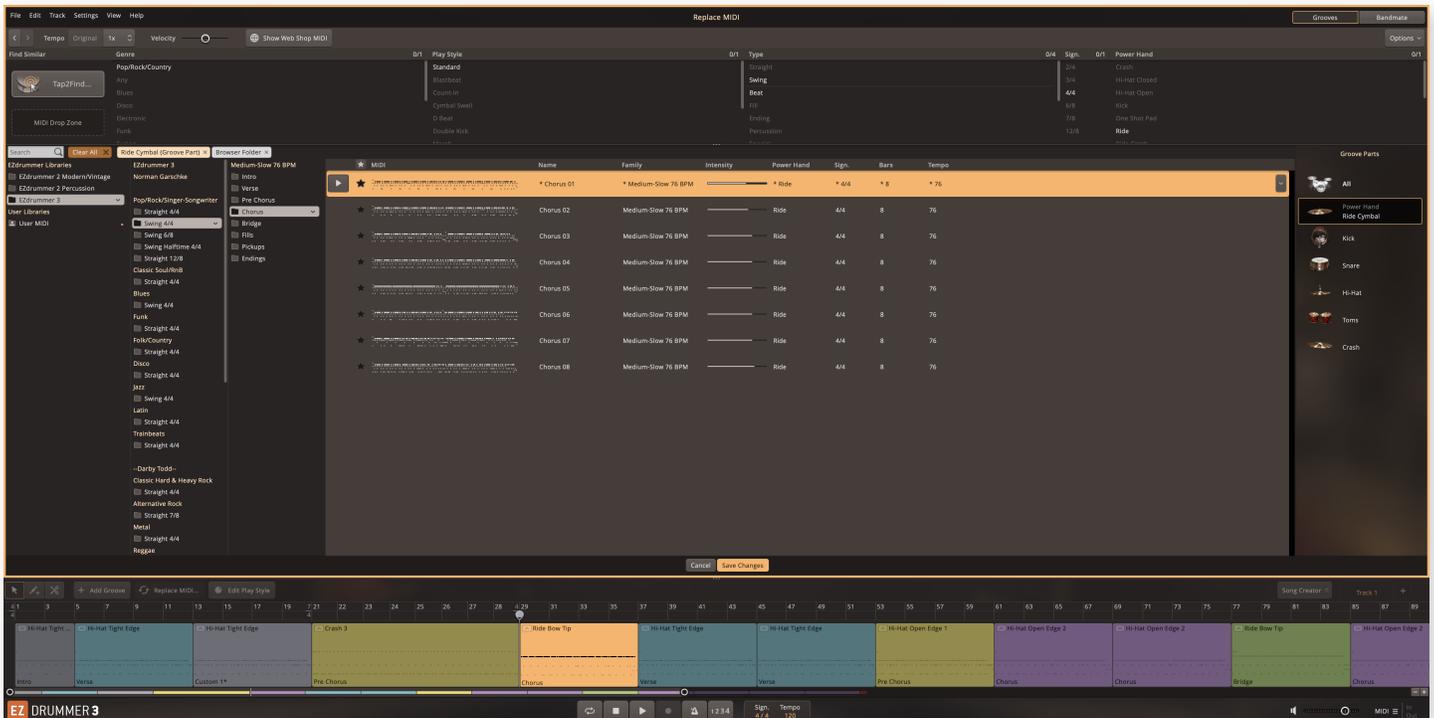
This is an incredibly useful function in the later stages of your songwriting, or if you early on feel that a groove needs to be switched up quickly. To start replacing MIDI, simply make a selection in the song track and click the Replace MIDI... button. The entire selection is affected when you apply the changes, and shorter grooves are looped when replacing.

A quick way to make your own groove is to add a simple eighth-note groove in the song track with the Add Groove button, then move on to setting the rhythm and feel of the groove by combining the groove you just added with Groove Parts from other MIDI in your Grooves library using Replace MIDI. This lets you create entire songs in minutes once you've decided on the basics.

The Replace MIDI works identically to the Grooves tab. You can apply search filters, browser your library folders and preview the grooves before applying any changes. The one difference is that when you preview, the playback is based on the combination of the groove parts you selected and the groove you selected in the Song Track, rather than those of the groove in the search results. Handy!

Once you have found the parts you want to replace your selection with, simply press Save Changes and the groove is replaced.

IMPORTANT

Unlike the other functions in the song track, replacing MIDI can only be undone with the Undo function. The replacing MIDI is not put "on top" of the original groove — it completely replaces it.

Notice

The Replace MIDI window has two sections, one for the Grooves tab and one for the Bandmate tab. They are both accessible in the upper right corner of the window, although the later is only available if you have imported an idea into the Bandmate tab

and will instead of replacing groove parts in the song track, it replaces it in the Bandmate timeline. Read more about Bandmate in chapter 8.

CUSTOMIZING YOUR GROOVE

As hinted above, a quick way of writing a custom drum groove is simply adding a simple groove with the Add Groove button and using Replace MIDI to change different parts of the groove to make it fit in your song.

In this example, we will demonstrate this workflow. We have already selected the preset from the Drum tab so the song will sound the way we want to, now we just need to make it groove.

1. From a new project, start your songwriting by laying out some basic song blocks on the song track. In this example, a single song block was added, shortened to four bars, and copied into three blocks in total by holding Ctrl/Cmd and dragging the first song.

2. Listen to the groove, in our case, we think that the kick pattern could be more lively across the whole 12-bar idea. We would also like to change the Power Hand in the last 4 bars of the song.

3. Use Replace MIDI to quickly reach your goal. In this example, we entered a rhythm on the kick using the Tap2Find function. Preview the different grooves in the search results and apply the one that's closest to what you're looking for. Don't spend too much time here, as the rhythm can always be tweaked later on. By default, all groove parts are selected. To only apply the Kick pattern to your groove, select the kick in the menu to the right.

4. We can then, after saving, in a similar fashion find a groove with a Power Hand that you like and change the original Hi-Hat Power Hand to that groove part. Make sure that you only select the groove that you want to change, since the changes will apply to all selected grooves.
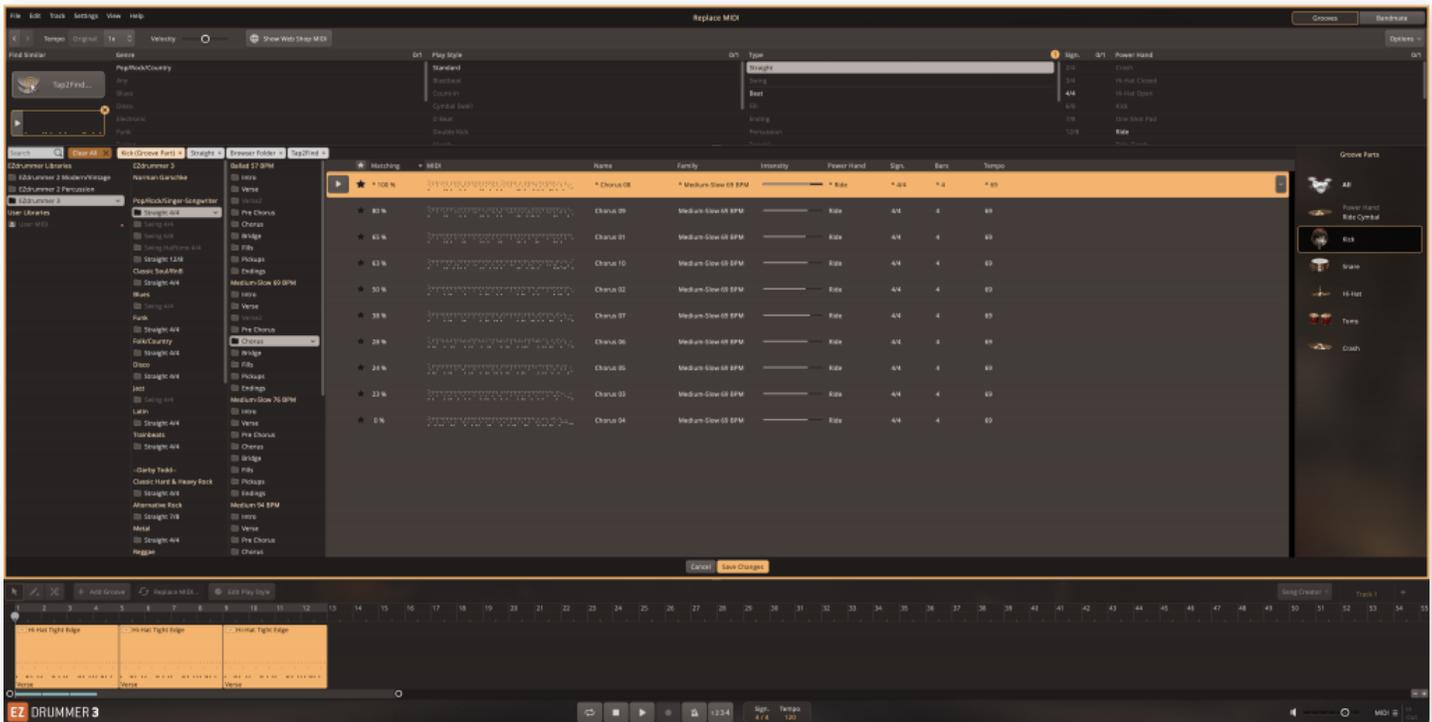
These were quick changes to meet the original vision for the track, but any more and we should probably have waited to hear what the other instruments were playing first before spending more time refining the groove.

Overchoice

The observant reader may have noticed we didn't use the the Grid Editor, Edit Play Style or Bandmate to adjust the groove. We also didn't set any song parts, since it wasn't required in such a short song. Having all these tools at your disposal does not mean you must use them every time.

If you find yourself tweaking endlessly, maybe you haven't really thought through what you're looking for. In those situations, it's better to make a note and come back at a later stage when you have had some time to think about what was actually missing or needed to be changed. Maybe you then come to the conclusion that your original choice was the proper one, or that the music was recorded in a way that was supported by the original groove, and that no changes are necessary.

7.6 EDIT PLAY STYLE

Pressing the "Edit Play Style" button in the song track header bar opens this view, which gives you access to interactive controls that you can use to make your drummer play your groove in a different way. This feature affects the grooves that you have selected on the Song Track.

Edit Play Style is a powerful feature that can be used to modify how individual instruments in grooves added to the Song Track play back. Any single instrument or the whole kit can be affected by Edit Play Style.

USING THIS FEATURE YOU CAN

- Control the number and intensity of hits in real time.
- Change the velocity.
- Add percussion.
- Change the leading instrument (Power Hand)

- Change the articulation for any instrument.
- Quantize individual or all instruments.

Edit Play Style is primarily intended to be applied to single Grooves to create variation, but it is entirely possible to use Edit Play Style for several selected Grooves. This is done either by selecting them in the Song Track after you opened Edit Play Style or by using the arrow. When the Edit Play Style window is open, recording into the song track is not possible.

EZdrummer 3: Edit Play Style

OPENING

Edit Play Style can be accessed in the following ways:

- Right clicking on a Groove and selecting Edit Play Style.
- Selecting a Groove and pressing the "E" key.
- Clicking the small arrow in the upper left of any Groove.

CLOSING

Edit Play Style is closed by clicking the X in the Top Right of the window, clicking the small arrow on the currently selected Groove, or by clicking the Edit Play Style button in the Song track header.
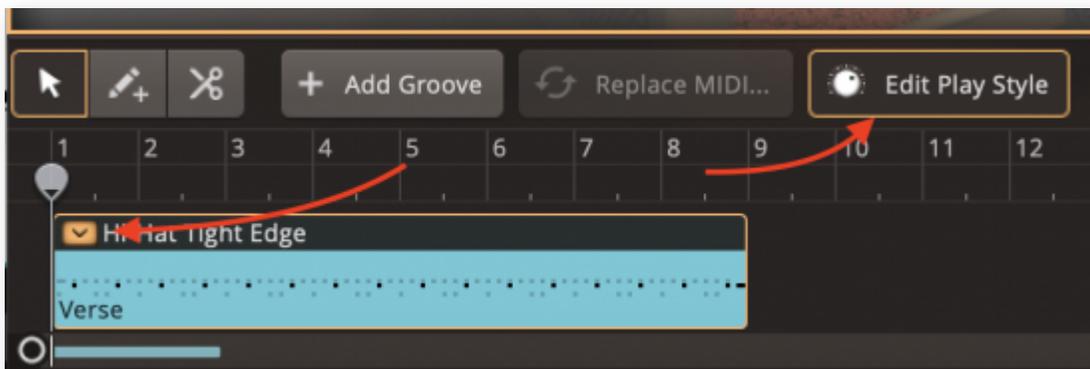
SELECTING INSTRUMENTS

As with Song Track operations, most functions affect only what is currently selected.

When you open the Edit Play Style window, all instruments used in the selected groove(s) are by default highlighted with an orange outline. Instruments not used are greyed out. Clicking an instrument will select it and deselect all others. You can also click the "Select Instrument" button at the bottom of the window to open a menu where all instruments are listed and the instruments used in the groove are specified. Select one or choose one of the grouped options "All Playing Drums", "All Toms" or "All Cymbals."

In the groove, notes belonging to the selected instrument(s) are also highlighted for better visual feedback of your actions to the individual notes (or hits).
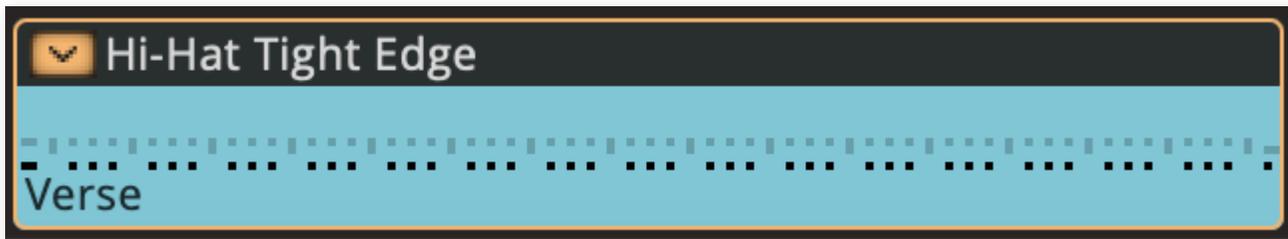
UNDO/REDO

Any action performed using Edit Play Style can be undone/redone using the Undo/Redo key command (Alt+Z) or by clicking the Global Edit menu and selecting Undo/Redo.

AMOUNT (ADD/REMOVE HITS)

Edit Play Style allows you to dynamically increase or decrease the number of hits played in a groove for all or individual instruments. This feature utilizes a smart algorithm that calculates the probabilities of where a real drummer would add or remove hits in a groove. In other words, it does not arbitrarily add or subtract hits but uses information gathered from tens of thousands of real drum performances to change the groove while keeping a natural feel.
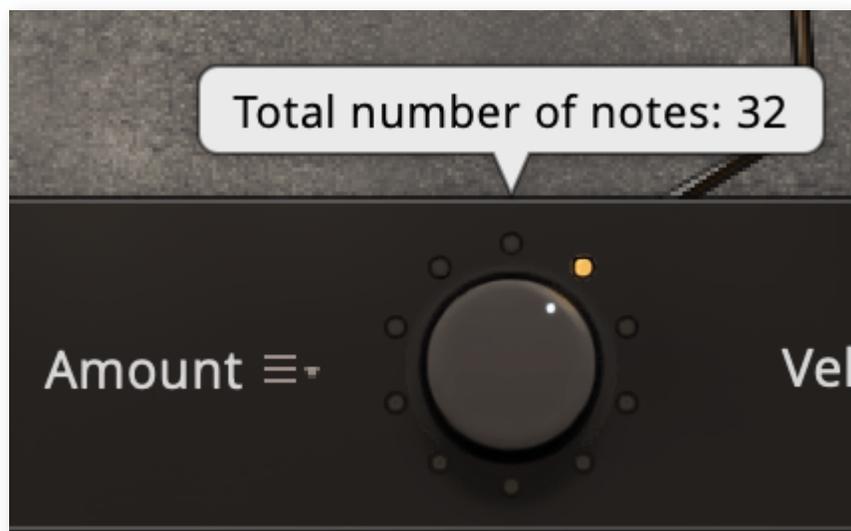
As the knob is increased or decreased the total number of hits for the selected instrument will be displayed.

USING ADD / REMOVE HITS

1. Select the instrument for which you wish to change the number of hits. Note that you can also use this feature to add hits for instruments not used in the original groove (i.e. greyed out instruments).

2. Start song playback so you can hear the results directly. If you want to listen to only the selected instrument(s), click the Solo Selected button.

3. Use the Amount knob to either remove hits (turn counter-clockwise) or add hits (turn clockwise).

4. To reset the Amount to its original value, use the drop-down menu to the left of the Amount knob. (You can also press Cmd (Mac)/Ctrl (Win) and click on the knob to reset.

ADJUSTING VELOCITY

Here it's possible to change the velocity levels for notes belonging to the selected instrument in a groove.
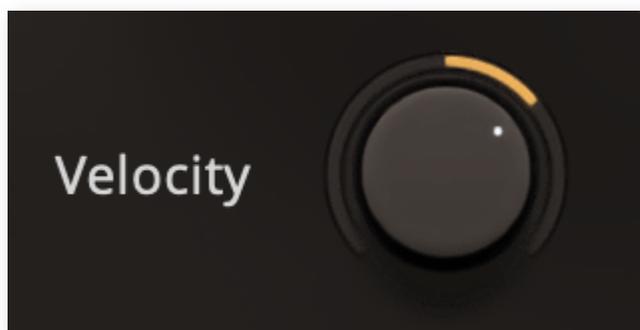
1. Select the instrument for which you wish to adjust the velocity.

2. Start playback to hear the results.

3. Use the Velocity knob to raise or lower the velocity values for the notes played. The relative balance between velocity values in the groove will be retained.

ADDING PERCUSSION

If you have previously added any additional percussion instruments (i.e. Future Hit instruments) on the Drums Tab, you will also see them in Edit Play Style. MIDI for these additional percussion instruments can also be automatically generated in Edit Play Style by doing the following:

1. Select the Future Hit instrument in the Edit Play Style window.
2. Start playback to hear the results.
3. Increase the amount knob. The more the knob is turned for a future hit percussion instrument the more intense the performance will become.

CUT MIDI

This will remove all notes from one or several selected instruments and move them to the clipboard.

1. Select the instrument(s) you wish to cut MIDI from.
2. Right-click a selected instrument and select Cut MIDI from the context menu.

COPYING/PASTING MIDI TO OTHER INSTRUMENTS

You can copy notes from a selected instrument (or from several instruments) and paste them onto another instrument using Edit Play Style:

1. Select the instrument and right-click it to open the context menu.
2. Select Copy MIDI from the menu to copy the notes to the clipboard.
3. Right-click on another instrument in the kit and from the Paste submenu, select the instrument you copied. The instrument you paste notes to can be any kit instrument, even one that was not used in the original groove. Any notes previously played by the instrument you paste to will be replaced by the copied notes.

   If you use this method to copy and paste within the same groove, it will result in two instruments playing the same notes which might not be desired. In that case,

instead use "Cut MIDI" from the context menu in step 2.

REMOVE MIDI

This command can be used to remove all notes played by one or several instruments. "Remove MIDI" will not place anything in the clipboard but will reduce the number of hits to zero. You can later use the Amount knob to restore the removed hits.
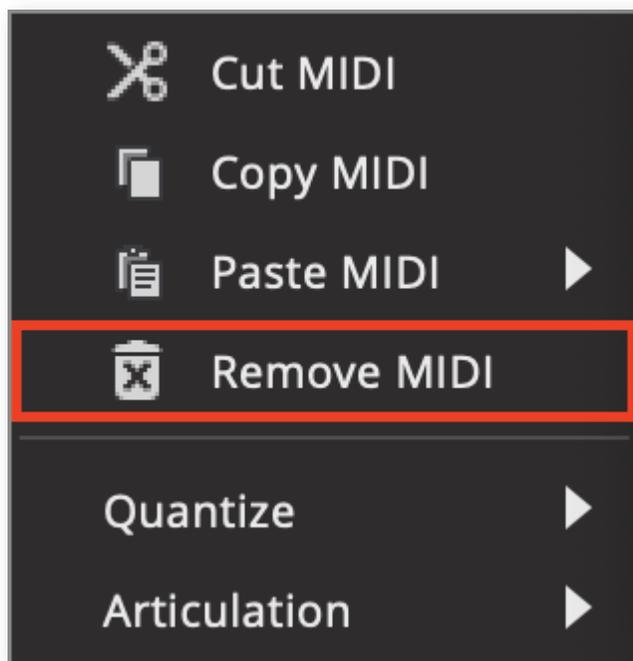
1. Select the instrument(s) you wish to remove MIDI from.
2. Right click a selected instrument and select Remove MIDI from the context menu.

QUANTIZE

You can quantize notes played by individual instruments using Edit Play Style.

1. Select the instrument(s) you wish to quantize.
2. Right click to open the context menu, and then select a value from the Quantize submenu.

ARTICULATION

Edit Play Style allows you to set what articulation any kit instrument plays.

1. For the Opening Hit and Power Hand the articulation selection is available directly from a menu opened by clicking the handle.
2. For other instruments it is set from the context menu. This only works when a single instrument is selected.
3. Open the menu and select a different articulation.

POWER HAND

All grooves have a "Power Hand" instrument assigned, and Grooves on the Song Track are also automatically named after the instruments Power Hand. The Power Hand defines the leading instrument of the groove. In most cases this will be a hi-hat or a ride cymbal.

It is possible to change the Power Hand instrument for the selected Groove to any other kit instrument by simply dragging the Power Hand flag to any other instrument in the kit.

Drag the Power Hand flag to any other instrument in the kit to instantly transpose the MIDI from the original instrument to the new instrument.

- Any MIDI notes that the original Power Hand instrument played will now be played by the new instrument.
- If the new Power Hand instrument was already playing notes in the Groove, these will be merged with the notes played by the original Power Hand instrument.
- The articulation of the new Power Hand Instrument can be altered by clicking on the down arrow of the Power Hand flag.

OPENING HIT

The Opening Hit adds a single hit to the beginning of the groove. Just like the Power Hand, the Opening Hit can be moved to any instrument in the drum kit by dragging the handle. You can activate or deactivate it by clicking the On/Off button.
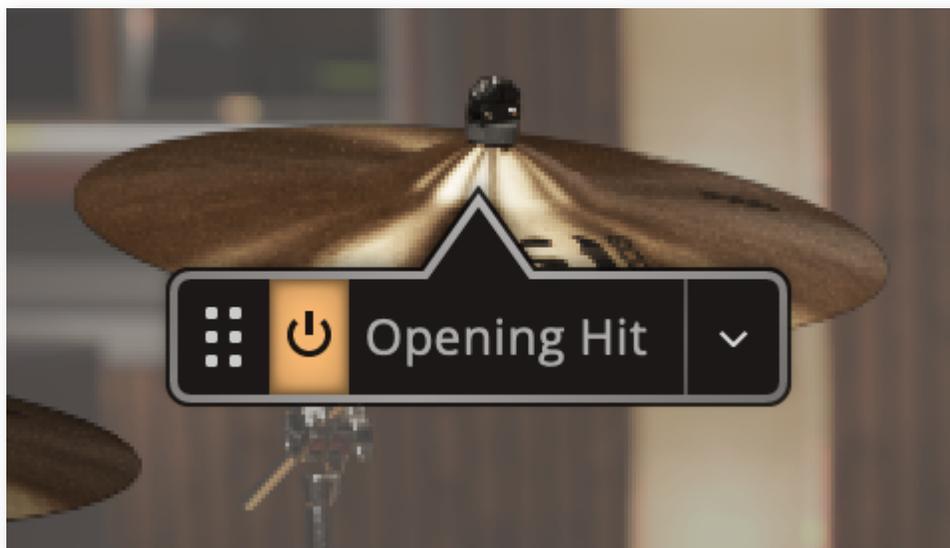
7.7 SONG CREATOR

The Song Creator allows you to create a complete drum track based on a chosen source file (Groove) with just a few mouse clicks.

EZdrummer 3: Song Creator

SHOWING/HIDING

To open the Song Creator window, click the Song Creator button in the Song Track header. The Song Creator window opens as an extension of the Song Track. To hide the Song Creator click the "X" in the upper right corner, or again click the Song Creator button.
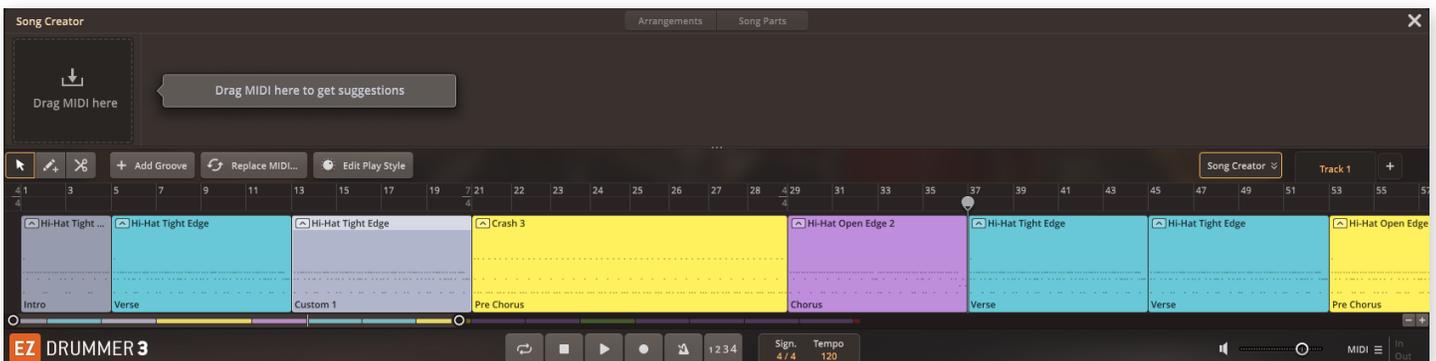
CHOOSING A SOURCE MIDI FILE

The Song Creator works by analyzing a given groove (or source MIDI) and based on that groove it instantly presents multiple variations categorized into song parts. To specify which groove is used as the source MIDI, you can drag it to the MIDI drop zone from the Song Track, or Grooves tab. It is also possible to right-click any MIDI file and choose "Use with Song Creator."

Once you have specified a source file you will be presented with groove variations divided into columns sorted by song part (Intro, Verse, Chorus etc.), all based on the originally selected groove. The source file itself will appear in the section of its original classification from the Grooves Tab.
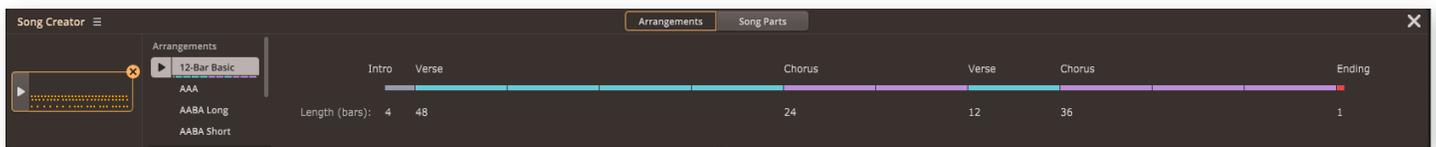
You can audition any groove by selecting it in the Song Creator. If it's suitable, drag it to the Song Track. Using this method you can quickly build up a complete drum track.

USING ARRANGEMENTS

You can complete an entire drum track in a quick way by using the Arrangements that get generated when you drag a Groove into the Song Creator drop zone.

Several pre-made Arrangements are available from the list on the left in the Song Creator window. These are based on commonly used song structures where A, B, and C

represent verse, chorus, and bridge, respectively. Additional song elements such as intro, ending and pre-chorus may also be part of a structure.

You can load an Arrangement to the Song Track by using the right-click context menu or by simply dragging it onto the Song Track.
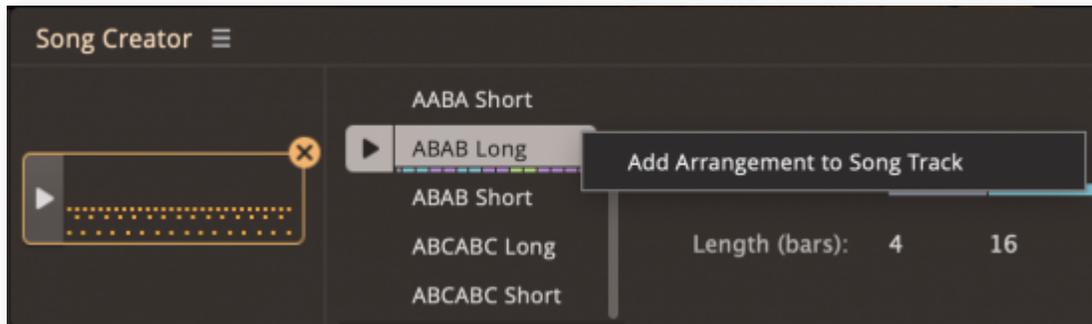
SAVING SONG TRACK ARRANGEMENTS

If you have built a complete drum track, for example by dragging grooves from the Song Creator columns to the Song Track, you can save its structure as a new Arrangement in the Song Creator menu. Note that no MIDI is saved by this function, only the order and lengths of the song elements. The structure can then be used with any Source MIDI file to create new songs.
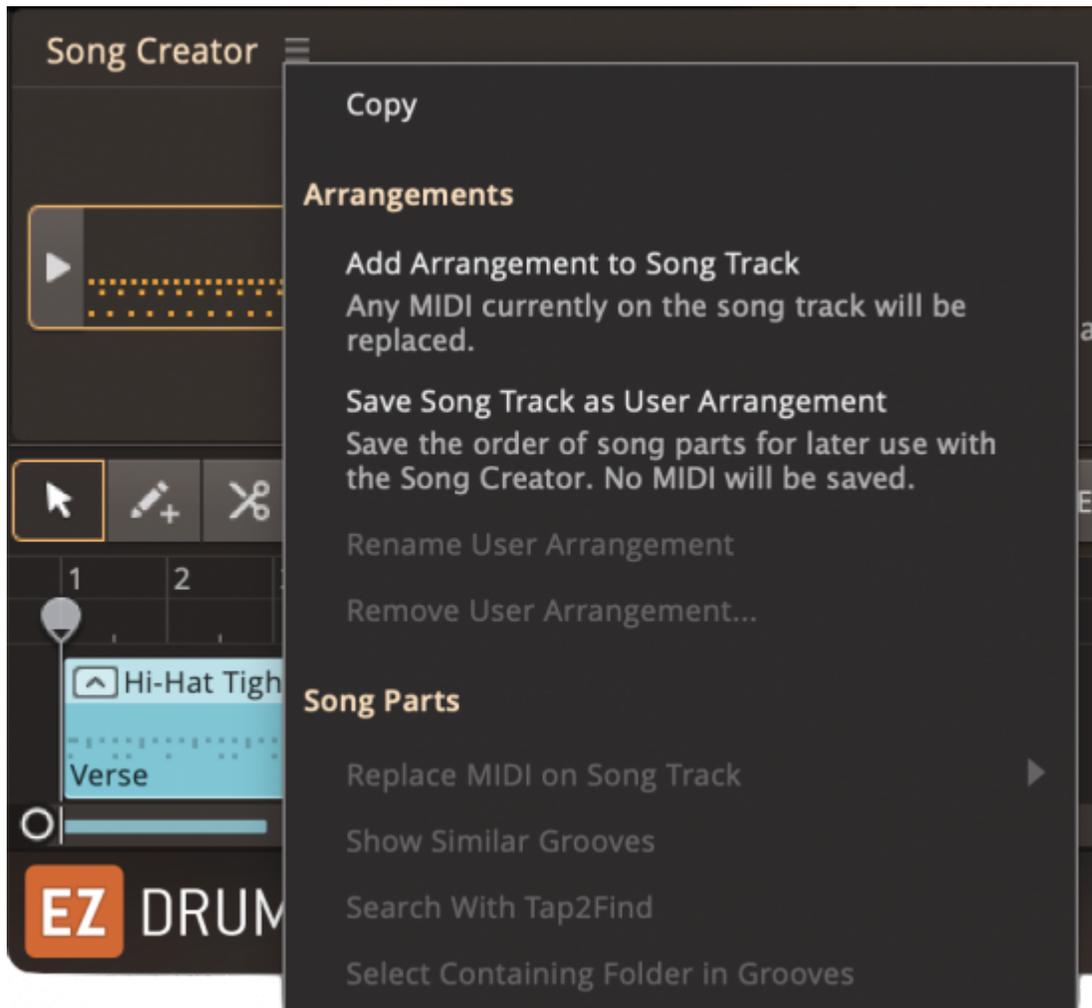
User saved Arrangements can be loaded, renamed, or removed by right-clicking them.
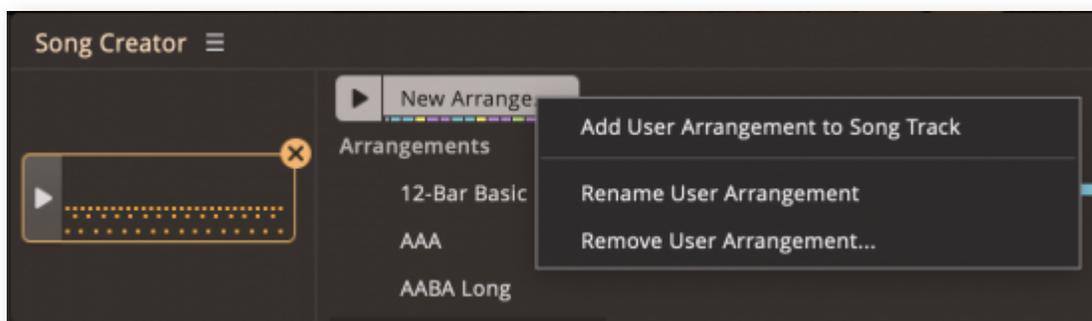
SONG PARTS CONTEXTUAL MENU (RIGHT-CLICK SONG PART)

Right-clicking on any of the grooves in the Song Parts section will bring up a contextual menu with a few useful options.

- **Copy:** This copies the groove so that it can be pasted at a later time.
- **Show Similar Grooves:** Search for similar grooves in the Grooves browser by Tags.
- **Search with Tap2Find:** This option will import the MIDI file into Tap2Find so that you can search for other grooves that are similar.
- **Select Containing Folder in Grooves:** This will show you where the groove is located in the browser section of the Grooves page. Please note that this option will only work if you own the MIDI pack from which the song block originated.
- **Replace All "…" on Track:** This will swap all existing grooves of the same song part with the new selection on the Song Track.
- **Replace Selected Blocks on Track:** This requires that grooves are selected on the Song Track. The selected Grooves will then be replaced with the newly chosen groove in the Song Creator.
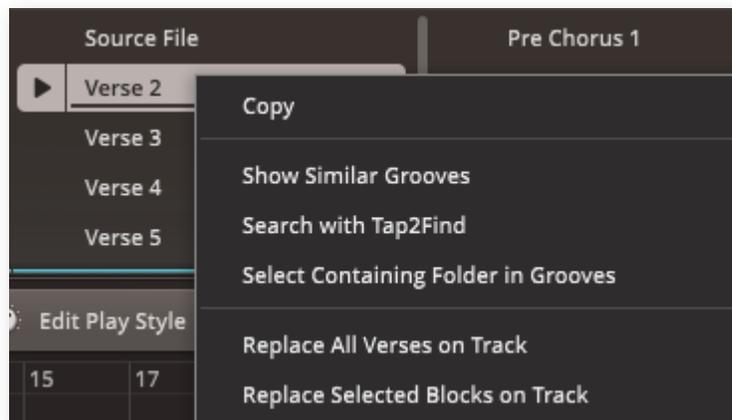
8. THE BANDMATE TAB

The Bandmate is a completely new concept in EZdrummer 3 that can give you custom-made grooves that fits your idea. Just let it listen to your recorded audio or MIDI, and Bandmate will help you get your songwriting started!

Before we get into it, it's important to get a different perspective about the Bandmate. Unlike all the other features of EZdrummer 3, which are all connected through the song track, Bandmate can in many ways be considered a separate application from EZdrummer 3. While it uses EZdrummer 3 as a host application and playback is sent through EZdrummer 3, it has its own transport controls, tempo settings, and the song

track in Bandmate is not connected to anything else in EZD3 in any way. This means you can keep a Bandmate session open in your project, and continuously work on it as you get further into your songwriting process.

VIDEO INTRODUCTION

EZdrummer 3: Bandmate

8.1 THE BANDMATE WALKTHROUGH
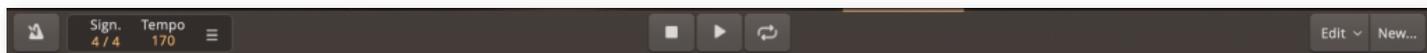
Once you have imported the idea that you are working on, the header bar appears at the top of the Bandmate view. In here are the controls you will be using to control the song

track of the Bandmate. Keep in mind that these controls are completely separate from the main EZdrummer 3 song track.
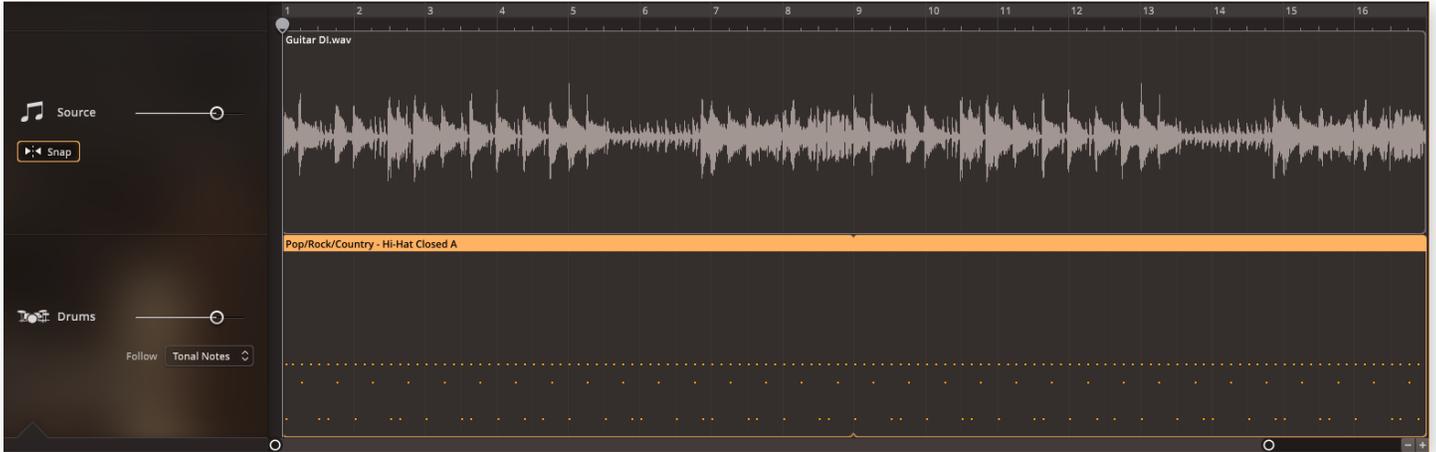
In the middle is the Bandmate timeline, which allows you to see and edit your imported audio and the generated MIDI.

At the bottom of the Bandmate are the MIDI editing controls and Grooves browser. Here you can customize and fine-tune the groove that Bandmate chose to match your idea.

In this chapter, we will dissect these sections and describe the components one by one.

THE HEADER BAR

The header bar contains the tools to control the Bandmate playback and to manage your Bandmate session. For the most part, these controls behave the same as the transport controls for the Song Track (see 7. The Song Track) so we will only mention how they are different in this part of the manual.

Tempo controls

The tempo controls will behave the same as the corresponding song track tempo controls. The one difference is that you have a drop-down menu where you can pick and choose from the tempos that Bandmate has detected for your session.
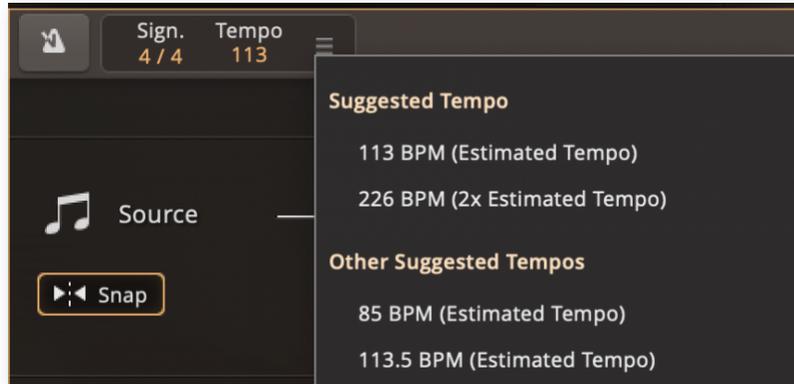
The Edit menu in the Bandmate (not to be confused with the global Edit menu, see chapter 9.2.) lets you remove the current groove that is loaded in Bandmate, or use that groove with the Grooves tab or Song Creator.
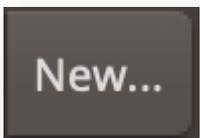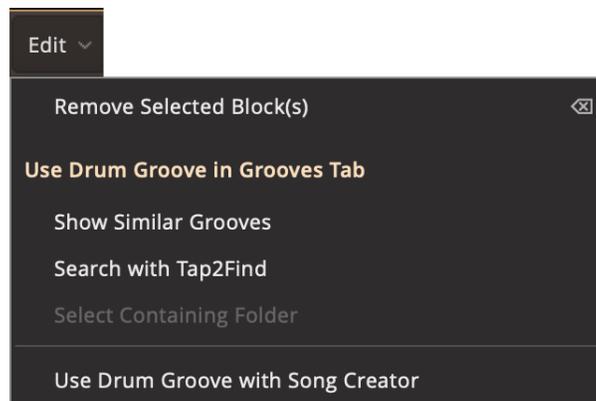
The New button will let you import a new audio or MIDI file for your Bandmate session. Importing a new idea will erase the progress you've made in your existing session. If you click this button by mistake, you can exit the import window by clicking the X.

THE BANDMATE TIMELINE
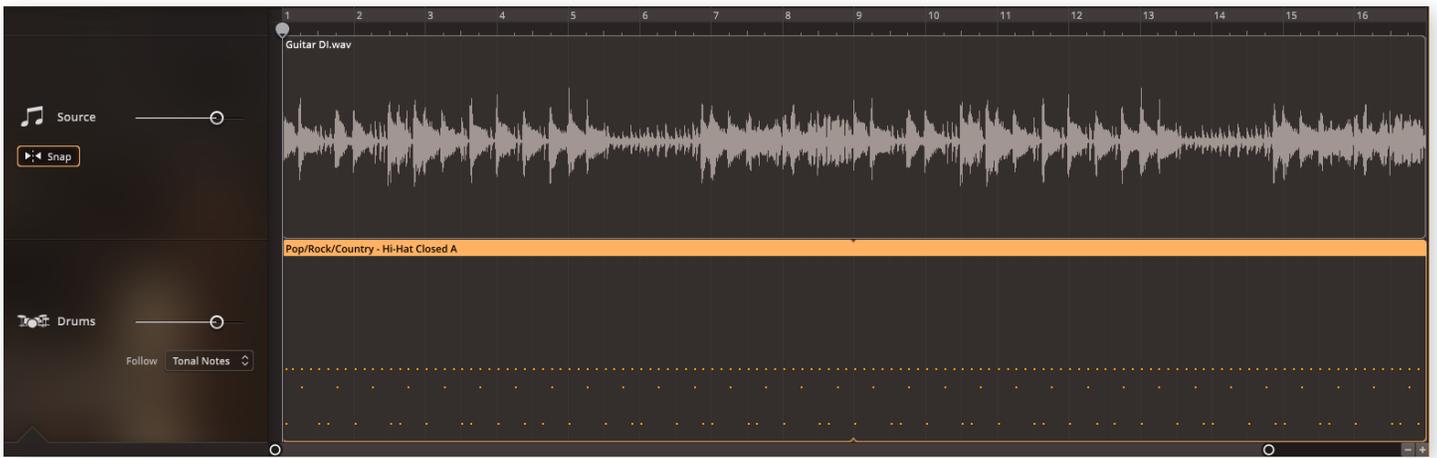
The Bandmate timeline is a way to visualize how the MIDI matches up with the audio or MIDI that you imported, the Source is always going to be at the top, and the groove that Bandmate generated will show up below. It works similarly to the Song track, you can move the MIDI and/or Audio around and trim them to fit perfectly together. The groove that Bandmate chose will be a single groove that repeats, but depending on the idea that you imported, each repeat may be different due to Bandmate reacting to the transients and/or tonal information in your source audio.
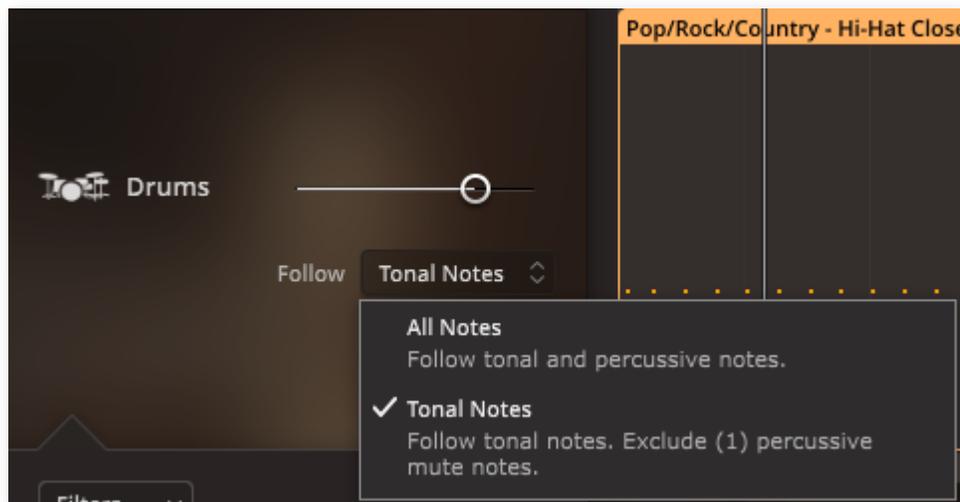
The Follow drop-down menu will let you choose two different types of algorithms that Bandmate can use to interpret the idea that you have recorded and imported.

- **All Notes:** This option will combine following both tonal and percussive information in the source file. If audio has been imported, then Bandmate will follow transients, palm

mutes, and percussive elements in your performance while also taking the underlying tonal information into account.

- **Tonal Notes:** If you want to exclude percussive information from the interpretation, then you can pick the Tonal Notes option to only focus on the tonal information in your source material. Short percussive hits or notes with silence after the initial hit will be excluded

The Snap button under the volume slider for the audio track is used to turn on and off Snap-to-Grid. It can be used to trim and place your idea with precision if it doesn't align with the Bandmate timeline. Snap is turned on by default.
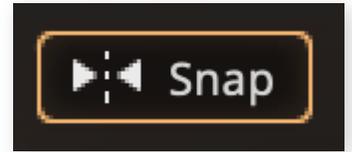
THE GROOVE CONTROLS

The groove controls will manipulate the groove that EZdrummer 3 matched your idea to. They are split into two categories, Amount and Edit.

- **Amount:** The Amount parameters will tell the Bandmate algorithm to use more or less of the instrument you are manipulating based on the accents and transients that

Bandmate finds in your source material.

- **Edit:** The Edit knobs and settings controls the timing and velocity of the groove.

CHOOSE YOUR GROOVE
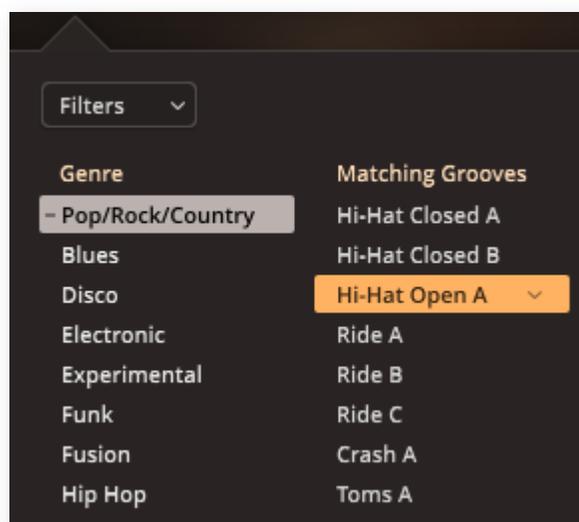
You can replace the groove that Bandmate chose with another matching groove from the browser to the left. The grooves are ordered by genre so that you can find the groove that you are looking for quickly. Each time you choose a new groove, Bandmate will

recalculate and adapt the groove to your idea, placing accents on the transients in a musical way.

There are two types of grooves that can appear in the Bandmate groove browser.

- **Toontrack Drum MIDI** from your Grooves library that matches the rhythm (transients) in the imported source file. Bandmate may automatically modify the grooves to better match the rhythm in certain cases even before you start using the amount knobs. You are able to toggle between the modified groove (2) and the original groove (1).
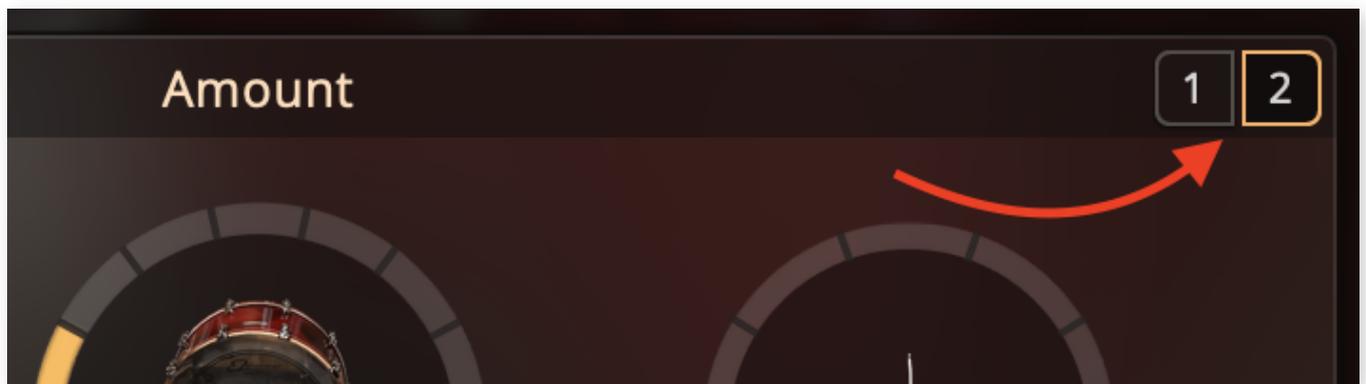
- **Grooves generated by Bandmate** based on MIDI recorded by a real session drummer automatically adjusted to match the rhythm of the source file.

FILTERS

To make it easier for you to find the perfect groove, you are able to use the filters in the drop-down menu. You can make Bandmate list only the grooves that have specific

instruments assigned as the Power Hand. You can also use the Type filters to, for example, only list the Swing/Triplet grooves if your idea has that type of feel.

8.2 THE BANDMATE WORKFLOW
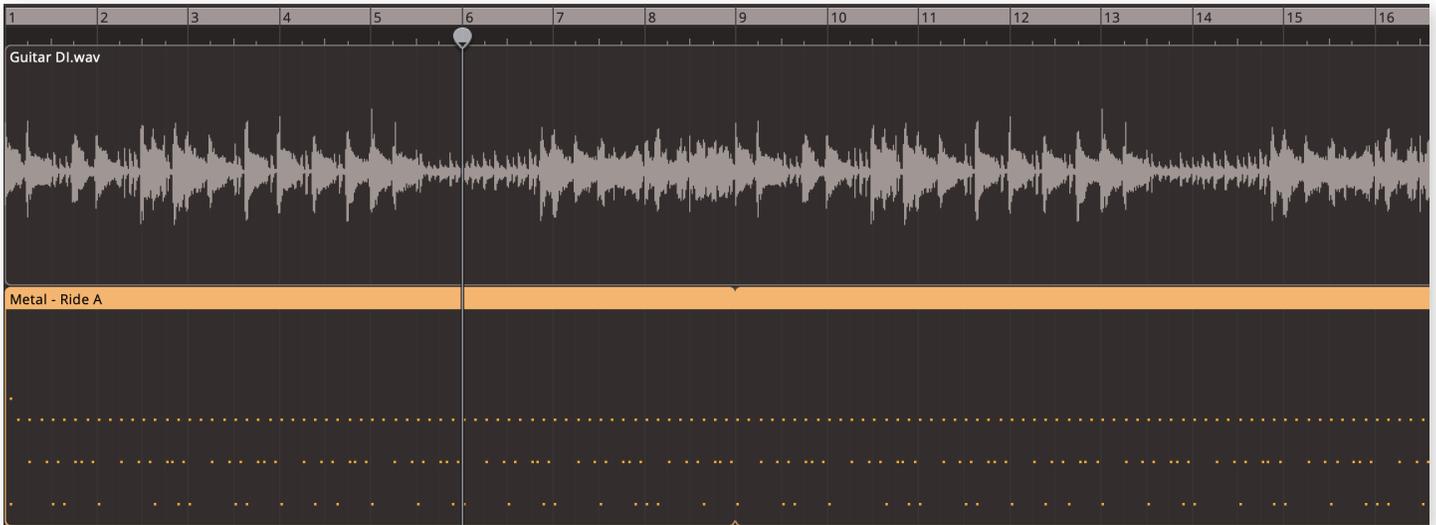
So, how do I use Bandmate?

Let's go through *one* type of workflow that you could think about when using Bandmate. Just to get you started.

YOUR SOURCE MATERIAL

When you first start Bandmate, you may be looking at it and wondering what you should throw at it, or you have the start of a song idea recorded that needs some drums. Either way, you need to decide what you want to import to the Bandmate. Do you want EZdrummer 3 to follow a particular instrument in your song? Then it would be a good idea to solo that instrument and import that single part into Bandmate. Importing full stereo mixes can be done, but it may be harder for EZdrummer 3 to recognize and single out rhythmic information in that type of audio. In the next part of this chapter, we go through

the recommendations to get the best *technical* result out of Bandmate, but there are no rights and wrongs when it comes to creativity in Toontrack software, keep that in mind.

THE TEMPO AND TIME SIGNATURE

While the idea is being imported, you will be met with the tempo and time signature setup dialog. Bandmate will have tried to determine the tempo that your idea was played in. Choosing different settings here can have a huge impact on how the groove fits with your source file. If it doesn't sound right on the first try, then you can manually enter the tempo and/or time signature in the top left of Bandmate, or select the tempo from a list of estimated tempo options.

TRIMMING THE IDEA

When working with audio in Bandmate, you can trim it so that the idea starts at the first beat of bar 1 (or 0). Trimming is done by clicking and dragging the ends of the imported idea on the timeline. Snap-to-Grid is turned on by default, but if your source audio or MIDI is not aligned to the grid, you can turn it off with the button under the source track volume slider so that you can trim it with more accuracy.
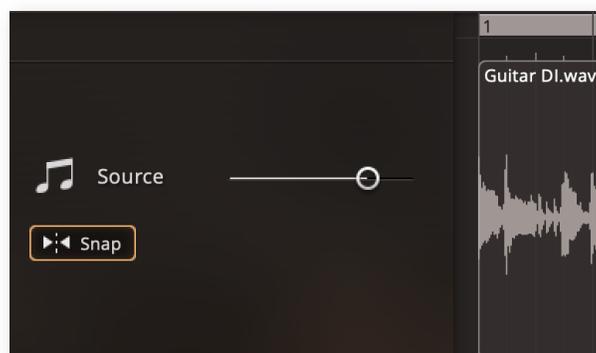
The Snap button.

PICKING YOUR GROOVE

You may or may not know which genre you just had an idea for. Maybe you are about to create something completely new? Browse through the different grooves in the browser menu to the left to see if the feel of the grooves matches your vision.

Note that when you select a groove from the list, it instantly replaces the groove on the Bandmate timeline. Only one groove is able to be on the Bandmate timeline at one time, but you can save grooves by dragging them down to the Song Track.

LOCK IT IN

When everything is in place, you can start to dial in your groove with the amount, and edit knobs. Perhaps you want the kick to follow the guitar riff that you imported? Then increase the kick amount to get more of those accentuations. When you are done tweaking the knobs, you may have an idea that you can later edit in Grid Editor to perfectly fit your song.

You can keep the bandmate session running and come back to it later if you want to make variations to the groove that you just created. If you want to load the next song part into the Bandmate at this point, then click the New button.

8.3 GETTING THE BEST RESULTS

GUIDELINES FOR IMPORTING AUDIO

While Bandmate is an amazing tool to customize MIDI and find the perfect groove for your idea, it is recommended to keep a few things in mind when you are picking audio to import to gain the best results possible.

Any effect applied to the signal makes analysis more complex. Distortion, compression and EQ can in some cases make the analysis less accurate. So, your guitar audio that

was recorded directly to an audio interface can technically give you better results than the miced-up guitar amp turned to 11. In a similar manner, your keyboard performance in MIDI form may be more accurate than the line-out stereo audio. But we do want to encourage you to try it out, be creative! It may give you the results that you wanted.

As you can see in the start view of the Bandmate tab, EZdrummer 3 is designed to read a single instrument, then customize a simple groove to make it work with your idea. That doesn't prevent you from using full mixes as a source track, but you should be aware that the results may vary greatly.

When EZdrummer 3 listens to a full mix it treats the mix as a single instrument. The result will vary and whether it's useful or not is up to the listener. Typically using a full mix as a source will not save you time and sometimes results in nothing. Many times you will get a very funky groove when Bandmate attempts to analyze the instruments that are highlighted in the mix. And sometimes you will be given a revelation that will let you take your song to a new level.

IMPORTING THE SOURCE MATERIAL

To import MIDI or audio into Bandmate, you can use the Select File drop-down menu, or you can just drag and drop files directly from your desktop to the Bandmate drop zone that you can see in the image above. You can also drag the source file to replace other audio or MIDI that you already loaded in a Bandmate session. You can even drag audio or MIDI from your DAW, but please note that not all DAWs support drag and drop.

A quick and dirty way of checking if your DAW should be able to drag and drop export into Bandmate is to click and drag the MIDI or audio from your DAW to the desktop. If a file ends up there that is supported in Bandmate, then it *could* work.

SUPPORTED FILE FORMATS

EZdrummer 3 supports the following file formats when importing audio: WAVE/WAVE RF64 (.wav), 64-bit WAVE (.w64; Mac only), AIFF (.aif/.aiff/.aifc), FLAC (.flac), Ogg Vorbis (.ogg), MPEG Layer 3 (.mp3), WMA (.wma; PC only), CAFF (.caf; Mac only). MIDI is also supported.

EZdrummer 3 always exports files as WAVE.

9. THE GLOBAL MENUS

The Global menus in the top left of the EZdrummer 3 interface are available in all tabs and offer control over various features within the software as a whole.
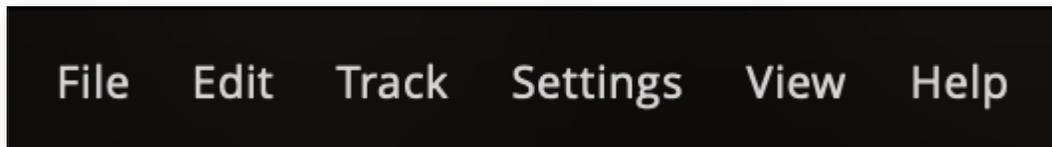
9.1 THE FILE MENU

This menu could also be called the Project menu. In here are all the actions available for loading and saving projects, as well as restoring autosaves and setting the default project to load on a new session.

- **New:** This option opens a new empty project without loading the default preset. If there are unsaved changes in the current project a confirmation dialog is first displayed.
- **Open...:** This option lets you navigate to and open a previously saved project. If there are unsaved changes in the current project a confirmation dialog is first displayed.
- **Open Recent:** This expandable menu displays a list of the last projects you loaded into EZdrummer 3. If there are unsaved changes in the current project when loading a project, a confirmation dialog is first displayed.
- **Import EZdrummer 2 Project...:** Lets you load a previously saved EZdrummer 2 project (.ezdp files) in EZdrummer 3.
- **Save As:** This option opens a save file dialog which lets you specify a project name and location for storing the preset. EZdrummer 3 also begins editing the new save file, rather than staying in the old.

- **Save a Copy:** This function works the same as Save As... but instead of switching over to the new save file, EZdrummer 3 continues working in the one it saved a copy of.

- **Auto-Saved Projects:** This expandable menu contains auto-saves from this session, as well as any preserved auto-saves from other hosts. At the bottom is a link to the Auto-Save settings page.

- **Load Default Project:** This discards the current project and

File

Project

New	⌘N
Open...	⌘O
Open Recent	▶
Import EZdrummer 2 Project...	

Project "Untitled"

Save	⌘S
Save As...	⇧⌘S
Save a Copy...	

| Auto-Saved Projects | ▶ |

Load Default Project

Set Current to Default Project

Delete Current Default Project

replaces it with the default project after closing the confirmation dialog that opens up when selecting the option.

- **Set Current to Default Project:** Saves the currently loaded project state into the default project. If a default project is already set a confirmation dialog is displayed
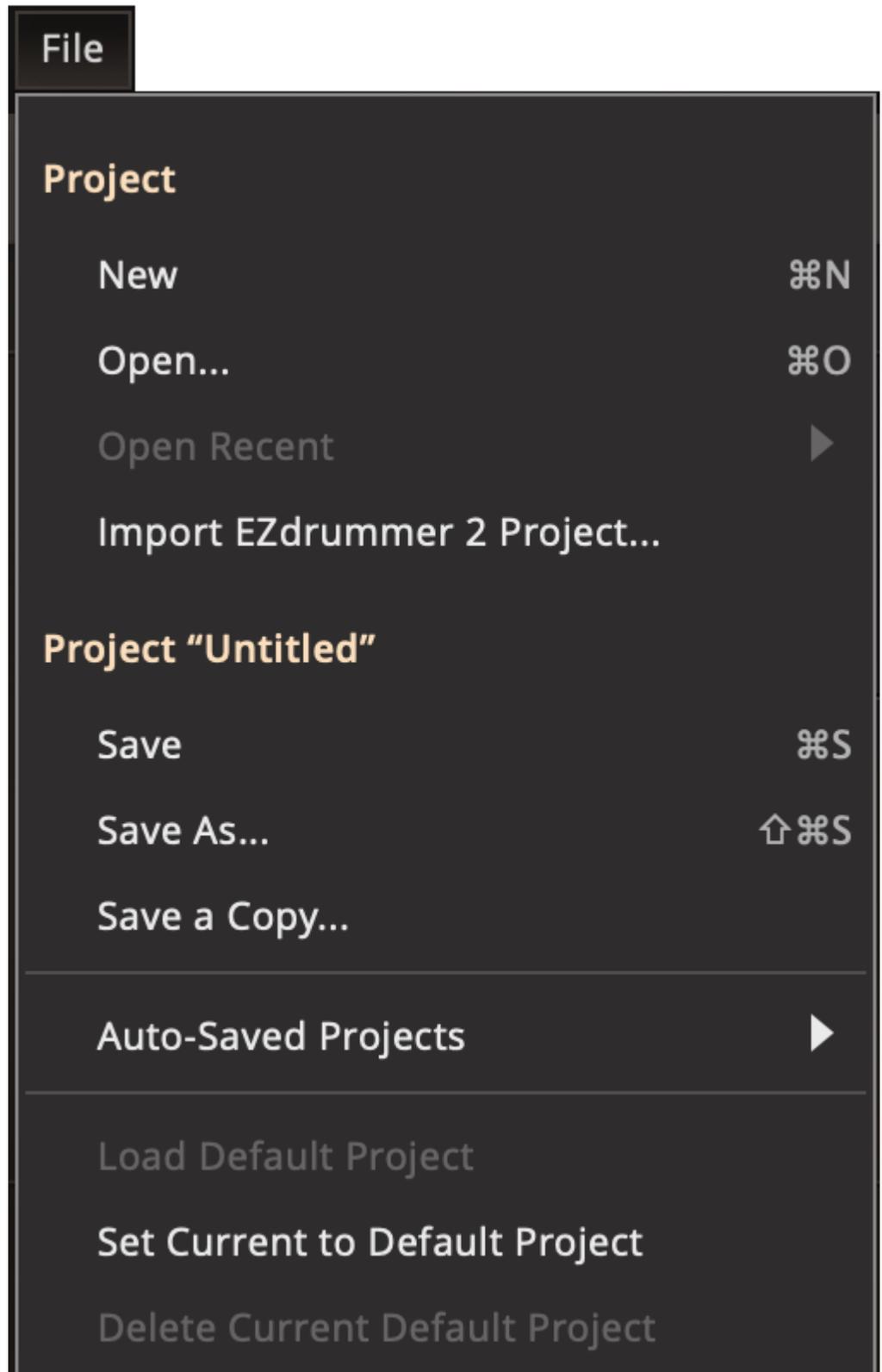
where you can confirm your decision.

- **Exit:** This option exits the EZdrummer 3 standalone host. If you have unsaved changes, a confirmation is displayed before closing the application. (only available in the Windows Stand Alone).

EZDRUMMER 3 PROJECT FILES

Projects saved from the file menu include essentially everything that you see in all of EZdrummer 3's tabs. This includes items that an EZD3 Preset (loaded from the Presets selection menu) would not. Saved in an EZD3 Project are the following:

- Drums selected
- Song Track
- Groove Tab filters
- Selected grooves
- Edit Play Style State
- Grid editor adjustments
- Mixer Tab.
- Bandmate Tab.
- Global settings and window sizes / scale
- Master Volume
- MIDI learn

*Note that **Set Current to Default Project** does not save the E-Drums settings, as opposed to **Save As** that does save them.*

9.2 THE GLOBAL EDIT MENU

This menu may be called a global edit menu, but it is every bit as dedicated to the Song Track as the track menu is. Some of the options here are not available in the Song track

context menu, such as Undo, Redo and History.

- **Undo:** Moves backward in the project history, until the first recorded action modifying the project this session. Undo is limited to 100 events. The history is cleared when ending the session and closing down EZdrummer 3.
- **Redo:** Moves forward in the project history, until the latest action modifying the project. The history is cleared when ending the session and closing down EZdrummer 3.
- **History:** Shows the actions that has modified the EZdrummer 3 project in a list.
- **Select All:** Selects all Grooves on the song track/grid.
- **Copy:** Copies the current selection in the grid editor or song track to the clipboard.
- **Cut:** Cuts the current selection in the grid editor or song track to the clipboard.
- **Paste at Playhead:** Pastes the clipboard to the playhead position in the grid editor or song track. If a Groove is selected, the option to paste Groove Parts or CC data separately is given.
- **Paste on Selected Groove:** Pastes the clipboard to the selected Groove in the grid editor or song track. The option to paste Groove Parts or CC data separately is given.
- **Remove:** Removes the selected MIDI notes or Grooves from the grid editor or song track.
- **Remove Groove Part:** Removes the chosen Groove Part from the selected Groove.
- **Merge:** This menu option becomes available when you have more than one groove selected in a single track. Selecting it merges the two grooves into a single groove. Having multiple grooves selected over multiple tracks merges the grooves only within each track.
- **Mute:** This option silences the selected Grooves. A muted Groove is grayed out and has a speaker icon with a cross in front on the left edge of the block. A muted MIDI note is grayed out and marked with a diagonal line.
- **Quantize:** This sub-menu allows you to tighten up the MIDI. Simply select the note value you wish to quantize the selected blocks to, and they will be arranged into a grid with that resolution.
- **Stretch Notes:** Here you can alter the tempo of the selected Groove(s) with selections of 1/2 tempo, and 2x (double) tempo. It is also possible to select 2/3x and 3/2x tempo.

2/3x slows the tempo of a groove by a factor of 1/3 so that a 4/4 groove could be used in a 6/8 time signature song. 3/2 speeds up the tempo by a factor of 1.5, so that a 6/8 Groove could be used in 4/4).

- **Find:** This sub-menu has two options. The *Search with Tap2Find* option applies a Tap2Find search filter in the Grooves Tab. If you have a groove from the grooves tab selected, the **Show In Browser** option applies a browser filter on the containing folder, which is useful if you like a groove, but would like to listen to variations of it.

- **Song Part:** This expandable menu allows you to change the Part Type of the selected Groove(s). Simply expand the menu and choose the type that you want (shown in the image to the right).

- **Edit Play Style:** Open the Edit Playstyle view.

- **Set Loop Area:** Adds a loop area to the selected Groove(s) in

Edit

Undo	⌘Z
Redo	⇧⌘Z
History	▶
Select All	
Copy	
Cut	
Paste at Playhead	
Paste on Selected Groove	▶
Remove	
Remove Groove Part	▶
Merge	
Mute	
Quantize	▶
Stretch Notes	▶
Find	▶
Song Part	▶
Edit Play Style	
Set Loop Area	
Use with Song Creator	
Replace Groove in Bandmate	
Stop All Audio	X
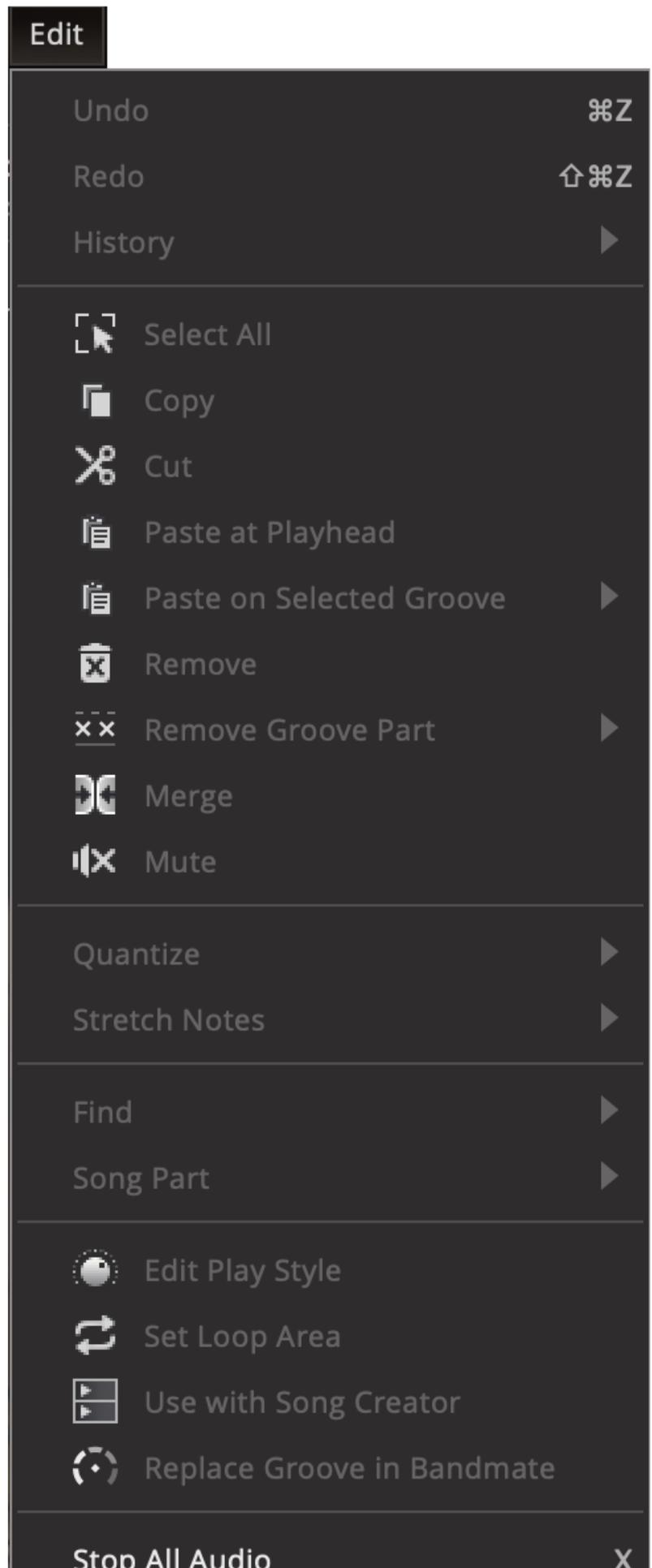
the song track.

- **Use with Song Creator:** Uses the selected Groove in the Song Creator.

- **Replace Groove in Bandmate:** Replaces the Groove currently in use in the Bandmate tab with the selected Groove.

- **Stop All Audio:** This option stops playback and any ringing notes. It is also available next to the master volume in the transport bar.

9.3 THE TRACK MENU

The Track Menu gathers many of the features from the song track into a single menu. There are additional options in this menu that are not already described in chapter 7, but all will be listed with reference to their song track counterpart.

- **New Song Track:** This option corresponds to the Add New Song Track button on the far right of the song track header bar.

- **Duplicate Current Song Track:** This option corresponds to the Duplicate Song Track option in the song track tabs context menu (opened by right-clicking a song track tab).

- **Delete Current Song Track:** This option corresponds to the Remove Song Track option in the song track tabs context menu.

- **New Empty Block:** This option creates a new empty Groove block on the song track, we call it an Empty Block in this case since the Groove does not contain any MIDI. It corresponds to the New Empty Block item in the song track context menu.

- **Show Triplets:** Enabling this option corresponds to the Show Triplets option in the song track header context menu. Disabling it corresponds to the Show Straight option in the same menu.

- **Automatically Loop Section:** With this option enabled, the loop markers move with your current selection in the song track. The loop toggle must be enabled for the option

to work.

- **Auto-Scroll:** With this option enabled the timeline automatically scrolls as the playhead moves during playback. This option is separate from the option with the same name in the grid editor options menu, which only affects the behavior of the grid editor timeline.

- **Set Track Length...:** This option corresponds to the option with the same name in the song track header context menu and opens the track length dialogue.

- **Move Playhead:**

- **Time Signature Editor:** This option corresponds to the option with the same name in the song track header context menu and opens the time signature editor in the song track timeline.

Track

- New Song Track
- Duplicate Current Song Track
- Delete Current Song Track

- New Empty Block

- Show Triplets
- Automatically Loop Selection
- ✓ Auto-Scroll
- Set Track Length...

- Move Playhead ▶

- Time Signature Editor...
- Tempo Editor...

- Export Song as MIDI File...
- Import MIDI File...
- Import Tempo from MIDI File...
- Import Time Signatures from MIDI File...

Bounce

- Export Song as Audio File(s)...

- **Tempo Editor:** This option corresponds to the option with the same name in the song track header context menu and opens the tempo editor in the song track timeline.

- **Export Song as MIDI file...:** his option lets you export your currently active song track as a single MIDI file. Song parts and chord changes are not exported with the MIDI. In order to keep those, either select all blocks in the Song Track and add them to your User MIDI, or save the entire session as an EZdrummer 3 project.
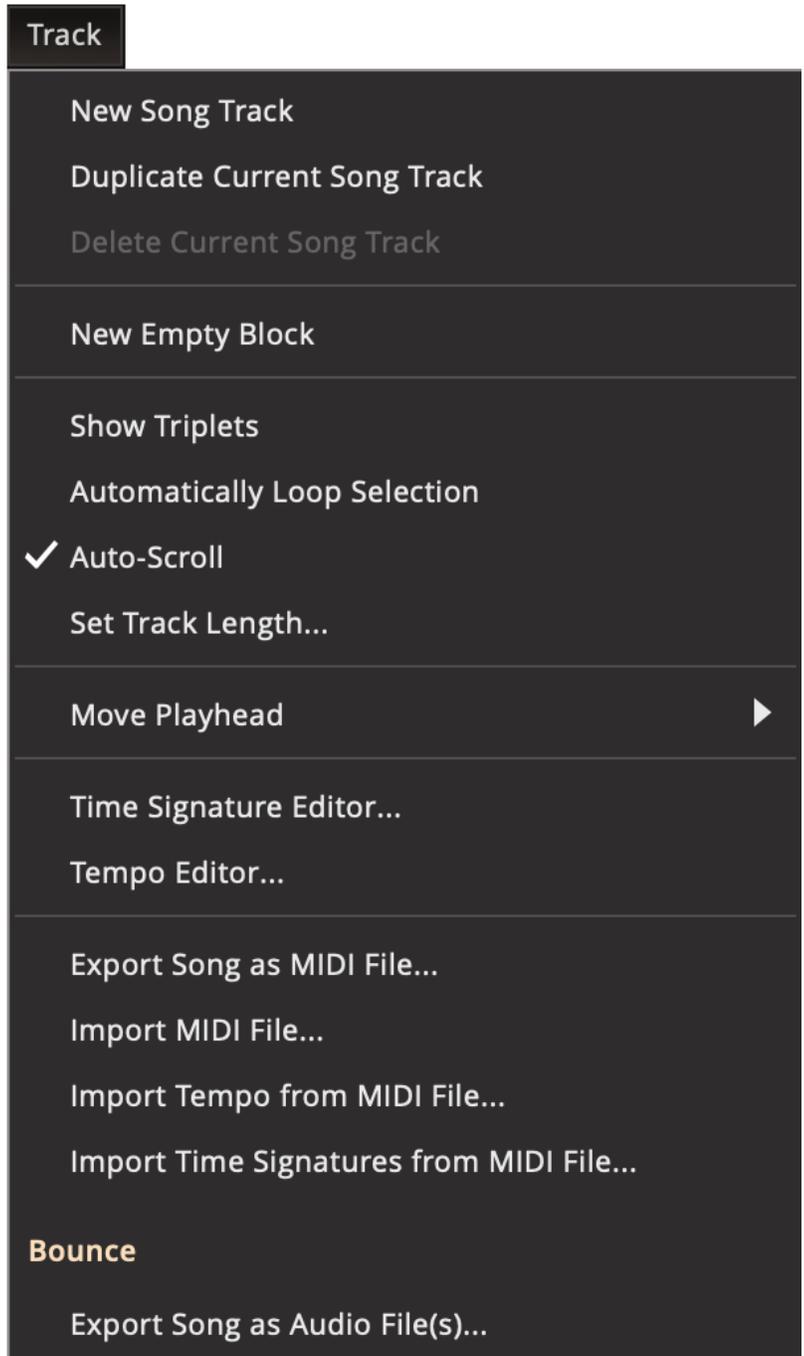
- **Import MIDI file...:** This option display a file open dialog which lets you open MIDI tracks and import them into the song track at the playhead position.

- **Import Tempo from MIDI file...:** This option display a file open dialog which lets you open a MIDI track, but only import the tempo information it contains into the EZdrummer 3 tempo track.

- **Import Time Signatures from MIDI file...:** This option lets you open a MIDI file and import the Time Signature information it contains into the EZdrummer 3 tempo track.

- **Export Song as Audio file(s)...:** In EZdrummer 3, you can export a stereo audio file, or export separate audio files for each output channel in the Mixer. You can select Full Mix to export a single stereo audio file, or specify the channels that you want to export with the Stems option.

Export Song Track as Audio File(s)

✕

◉ **Full Mix**

Export all mixer outputs as one stereo audio file.

◯ **Stems**

Export selected mixer outputs as separate files.

	Output	Channel(s)
☑	1/2	Kick In, Kick Out, Kick Sub, One Shot, One Shot OH, Shaker, Shaker OH, Tamb, Ta...
☑	3/4	Snare Top
☑	5/6	Snare Bottom
☑	7/8	Hi-Hat
☑	9/10	Racktom 1, Racktom 2, Racktom 3, Floortom 1, Floortom 2
☑	11/12	Ride, OH

Filename Prefix   My Song

9.4 THE SETTINGS MENU

All the options in this menu but the E-Drums item opens the different tabs in the Settings window. There is an additional option available in the standalone host, **Audio/MIDI Setup**, which you can use to modify your audio input and output settings, as well as setup any MIDI devices you want to use within EZdrummer 3.
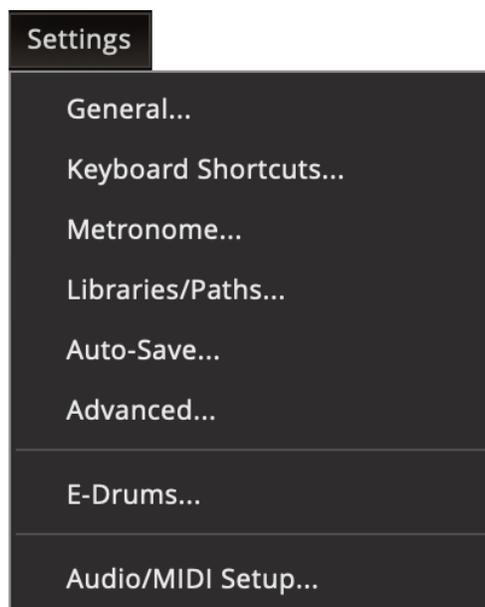
The tabs in the settings window have descriptions available for each option they contain, although it is worthwhile reading up on them before digging too deep, since many of them are good to keep in the back of your mind when using EZdrummer 3.

Common for all but the Advanced tab is the Reset All button, which restores all settings within that tab to the default values assigned when you last installed or updated EZdrummer 3.

9.4.1 THE GENERAL TAB

As the name implies the General Tab of the settings window offers general workflow options for EZdrummer 3.
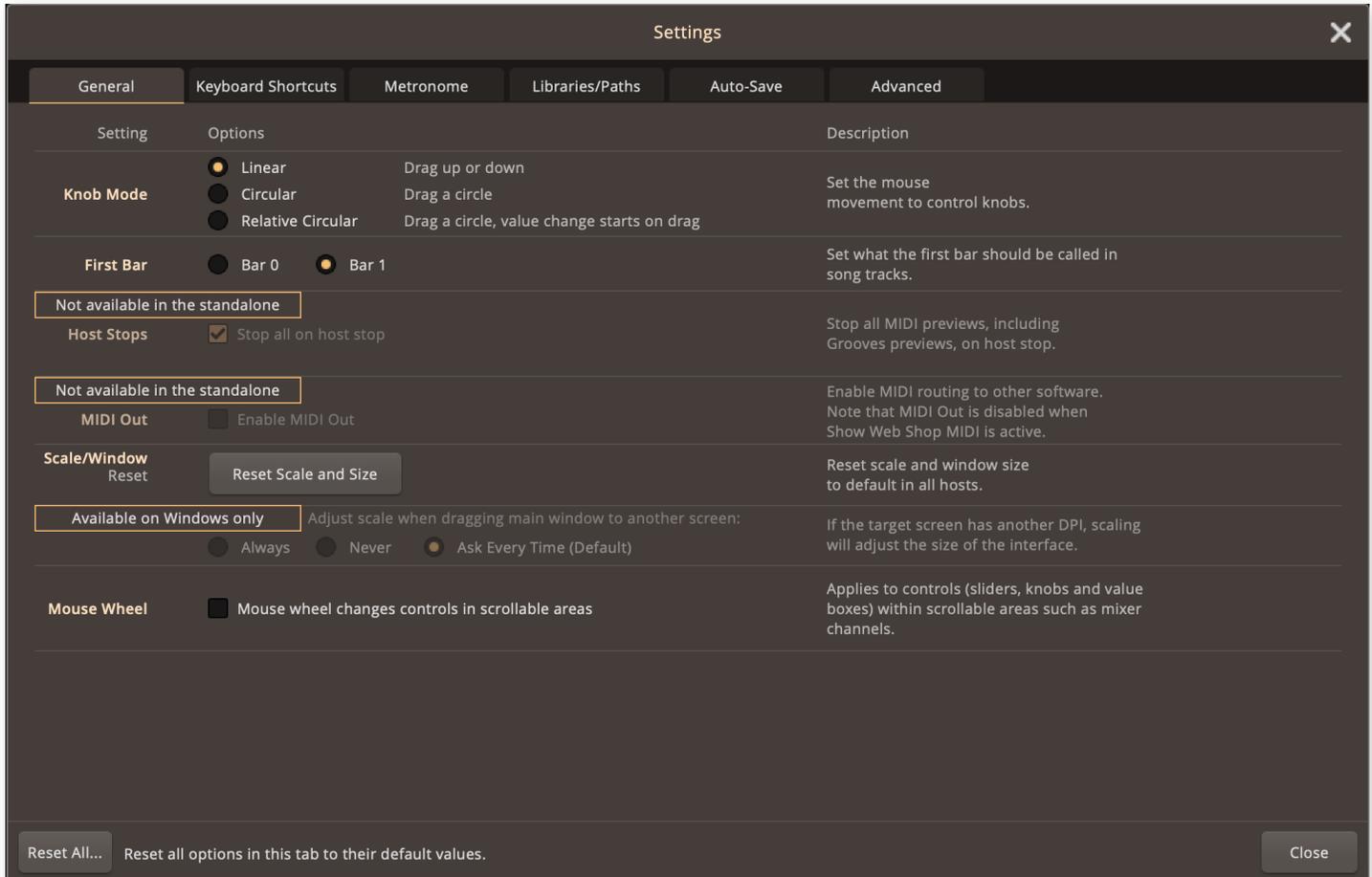
- **Knob Mode:** Provides the option to control how all knobs in EZdrummer 3 operate.
- **First Bar:** This controls both the Song Track and the Bandmate Tab. Here you have the choice to start at bar 1 or 0 (for compatibility with hosts that use bar 0).
- **Host Stops:** Checking this option will stop all MIDI playback in EZdrummer 3 when the host stops. This only applies to EZdrummer 3 when it is launched as a plugin in your host DAW therefore, it is not available in the EZD3 standalone application (as seen in the picture above).
- **MIDI Out:** Checking this option allows MIDI to be sent from EZdrummer 3 to other software that is also launched in your host DAW. This option is intended to be used inside of a host DAW with multiple software instruments launched, therefore is not

available in standalone. It is useful if you would like to send MIDI from EZdrummer 3 to other virtual instruments launched in your DAW. Additional routing will be required inside of your DAW in order to complete the process.

A MIDI Out Menu and signal indicator are also present in the bottom right corner of the EZdrummer 3 interface. Here you can choose to view the E-Drums settings page (described in 9.4.7 E-Drums Settings) or open the MIDI out settings (described above).
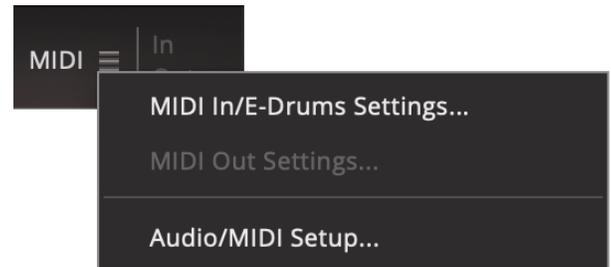
- **Scale and Window:** Clicking the reset button here will reset the size and scaling for all versions of the EZdrummer 3 plugin in all of your available hosts. Additionally, a few clearly described Windows-only options are available.
- **Mouse Wheel:** This gives you the option to allow your mouse wheel to change values within EZdrummer 3. When un-selected the mouse wheel will not have any effect on the EZD3 controls.
- **Reset All:** This will change all settings back to their default.

9.4.2 THE KEYBOARD SHORTCUTS TAB

The Keyboard Shortcuts tab provides a customizable guide to all of the available shortcuts in EZdrummer 3.

By default key commands are enabled in all hosts that can use EZdrummer 3 as a plugin (DAWs). However, there may be instances where EZdrummer 3's keyboard shortcuts duplicate those in the host. In this case, you can either disable keyboard shortcuts in EZD3 by unchecking the box pictured below or create your own custom keyboard shortcuts that do not interfere with the host.

Settings	✕

General	**Keyboard Shortcuts**	Metronome	Libraries/Paths	Auto-Save	Advanced

Shortcut	Key Combination	☑ Enable keyboard shortcuts in DAWs

General

Undo	⌘Z
Redo	⇧⌘Z
Cut	⌘X
Paste	⌘V
Copy	⌘C
Delete	⌫
Select All	⌘A
Solo	S
Mute	M
Clear/Recall Solo	⌥S
Clear/Recall Mute	⌥M
Stop All Audio	X
Zoom In Horizontally	⌘Plus
Zoom Out Horizontally	⌘Minus
Zoom In Vertically	⇧Plus
Zoom Out Vertically	⇧Minus
Show Drums Tab	⌥1
Show Grooves Tab	⌥2
Show Grid Editor	⌥3
Show Mixer Tab	⌥4
Show Bandmate Tab	⌥5

Standalone / Forward to Host

Start/Stop Playback (Standalone)	Space

Reset All...	Reset all options in this tab to their default values.	Close

Editing Keyboard Shortcuts:

- **Remove Shortcut:** Hovering over a keyboard shortcut will reveal an X in the right corner of the shortcut. Click the X to remove the shortcut from EZdrummer 3. This could be done if you simply want to remove a shortcut that interferes with your host, or one that you do not want to accidentally trigger.

Solo	S	
Mute	M	✕
Clear/Recall Solo	⌥S	Remove the key binding for this shortcut
Clear/Recall Mute	⌥M	
Stop All Audio	X	
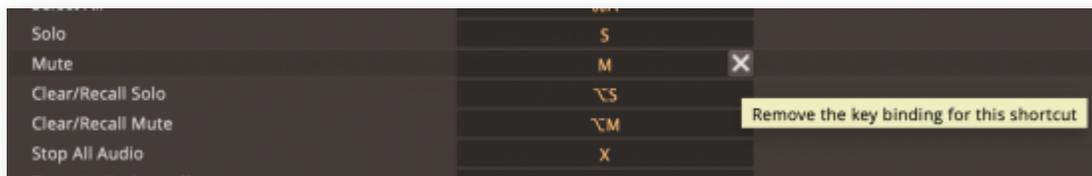
- **Change Shortcut:** Clicking on a shortcut will prompt you to type in a custom key combination that will then be used for the desired action.
- **Reset all:** Use this option to change all keyboard shortcuts back to their factory default settings.

9.4.3 THE METRONOME TAB

The Metronome Settings tab provides useful options for controlling the behavior of the metronome. The Metronome on and off button is located in the Transport at the bottom of EZdrummer 3.
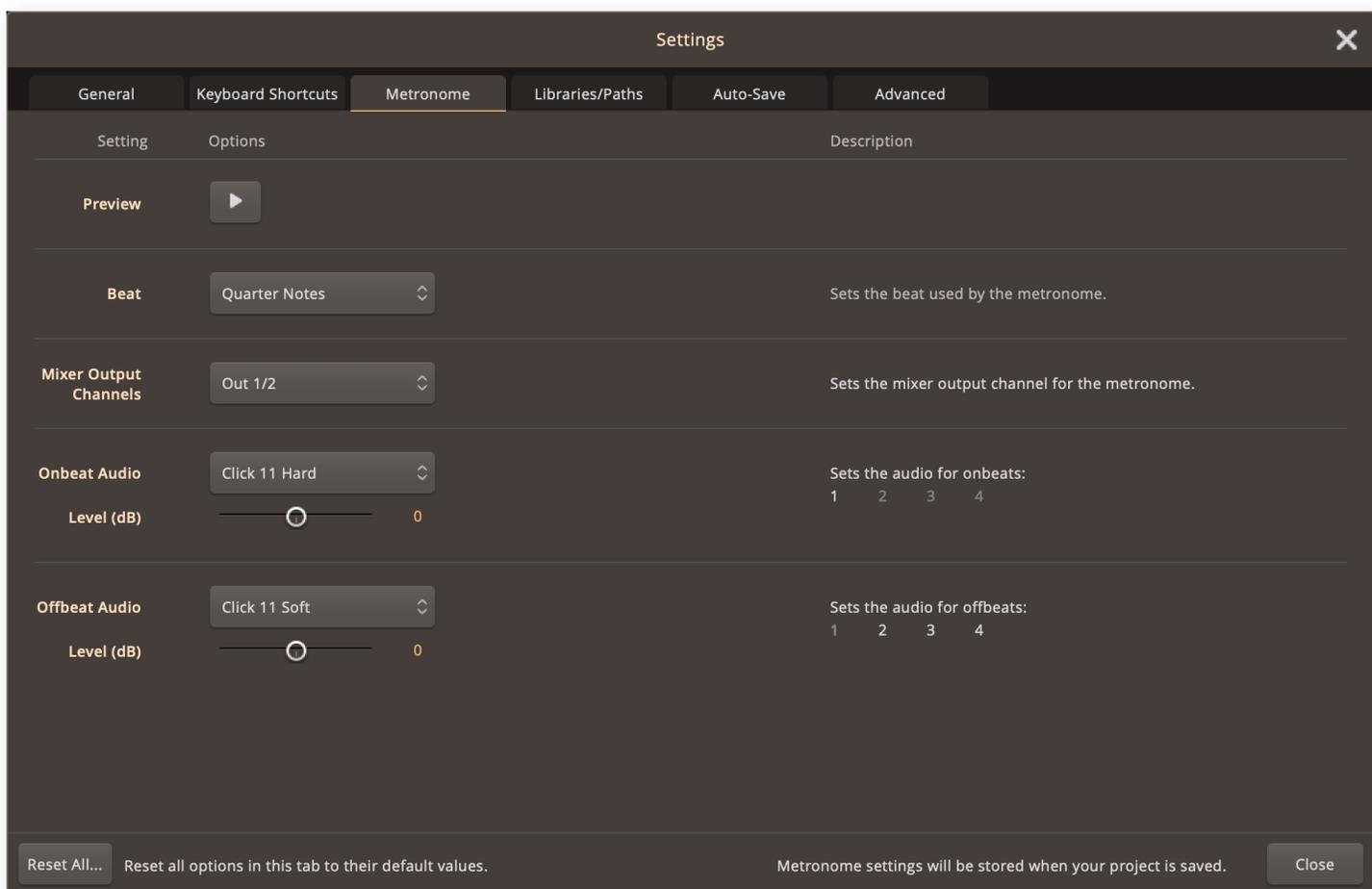
- **Preview**: Allows the user to check the sound and level of the Metronome.
- **Beat**: Provides options for the beat used by the Metronome. *It is often useful to set to eighth or sixteenth notes when slow tempos are used.*
- **Mixer Output Channels:** This allows the user to decide the output channel for the Metronome. Very useful when EZD3 is used with multiple outputs sent to a DAW. In this

case you could route the Metronome to its own dedicated output in EZD3 and then bring it in on an input of your DAW (for access and level directly on a DAW fader).

- **Onbeat and Offbeat Audio:** Sets the sound and level for the beats of the metronome. There are many different sounding clicks available in the drop down menu so that users can find the one that they like the best.

Like the General Tab all Metronome settings can be reset to their default values with the Reset All button.

9.4.4 THE LIBRARIES/PATHS TAB

The Libraries/Paths Settings Tab is where you can view the installation path to your installed EZX libraries and MIDI.

- **Library Paths:** In the main area of this window you see the library path for your version of EZdrummer 3 and the path to your User Presets.
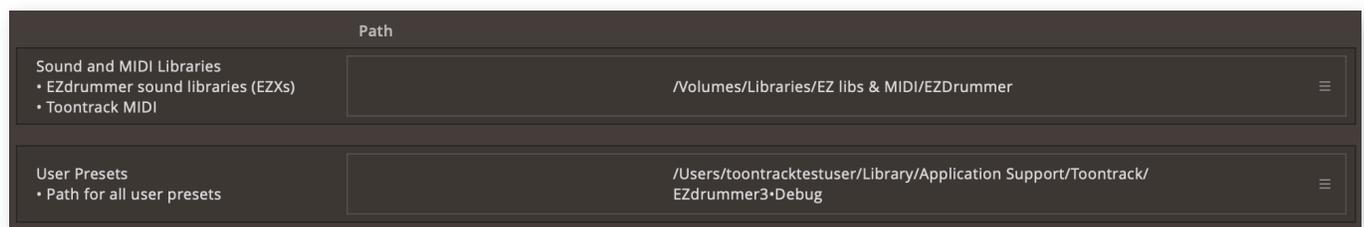
- **Sound and MIDI libraries:** This shows the path to the EZDrummer sound libraries and the installed Drum MIDI for both EZdrummer and Superior Drummer. If EZdrummer 3 can not find the libraries or MIDI files in its set path EZD3 will warn you that no content can be found and it will prompt you to Edit the path to the content. To do this, simply click the now active Locate Folder… button and navigate to the location of this content.

- **Path:** This shows the operating systems path to the folder that contains the sound library.
- **Menu:** Clicking the menu to the right of each library listing will provide you with options for that specific library path.
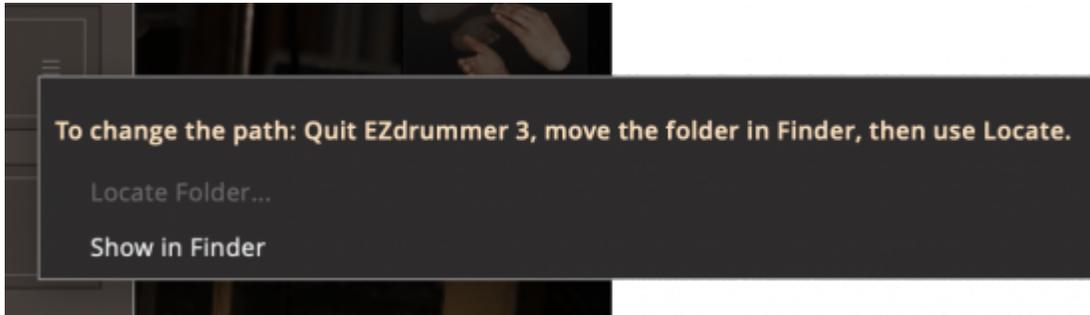
- **Show in Finder:** Opens an operating system window and shows you your sound library folder.

RELOCATING YOUR EZDRUMMER SOUND LIBRARIES

If you want to move your EZdrummer libraries to an external hard drive for example, then the best way is to move the EZDrummer folder that you can get to with the Show in Finder/Explorer option.

1. Find the folder that contains the sounds and MIDI. You can use the Show in Finder/Explorer option from the hamburger menu that we described earlier in this chapter.
2. Exit EZdrummer 3.
3. Move the folder (called EZDrummer by default) to its new location.
4. Make sure that the EZDrummer folder is not still in the old location (remove it if needed).
5. Launch EZdrummer 3 and you will be prompted to look for the sounds by opening the Libraries/Paths settings.
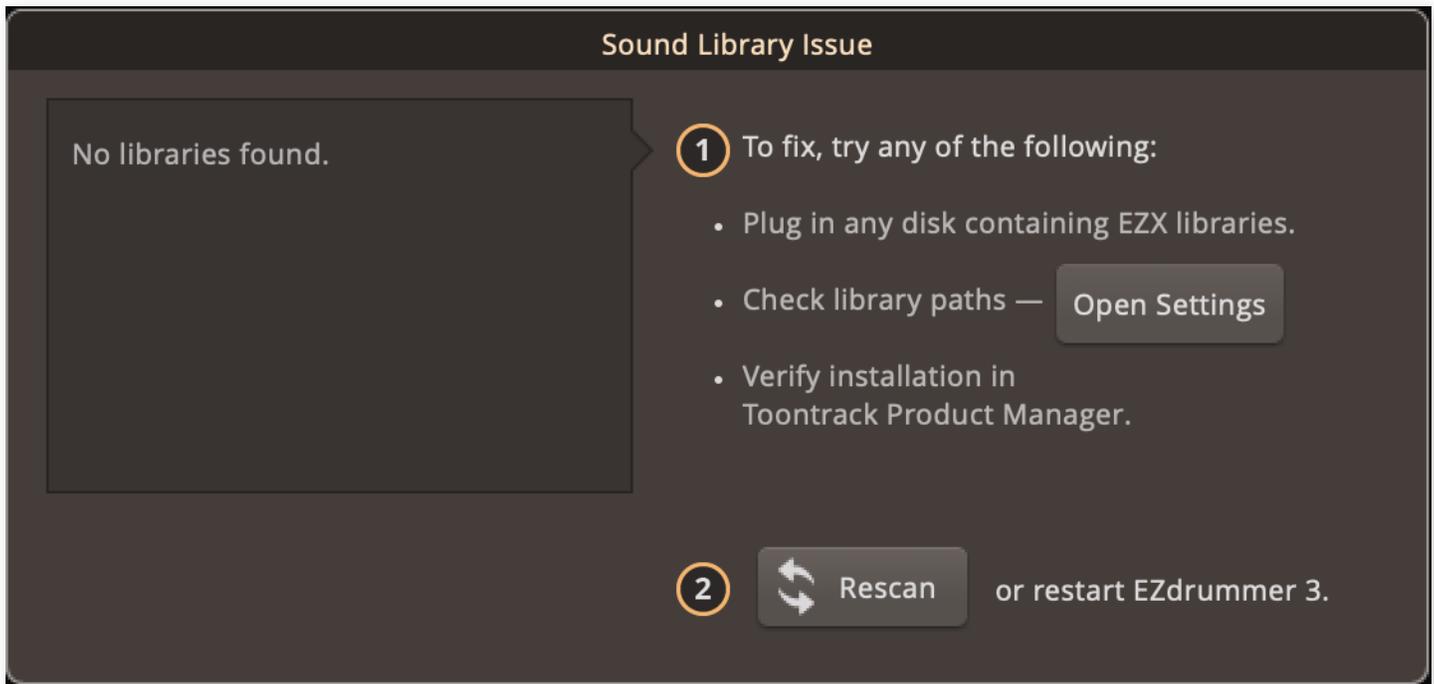
Then click to open the menu for Sound and MIDI libraries and choose Locate Folder. A file browser will open that allows you to navigate to the sound library folder.
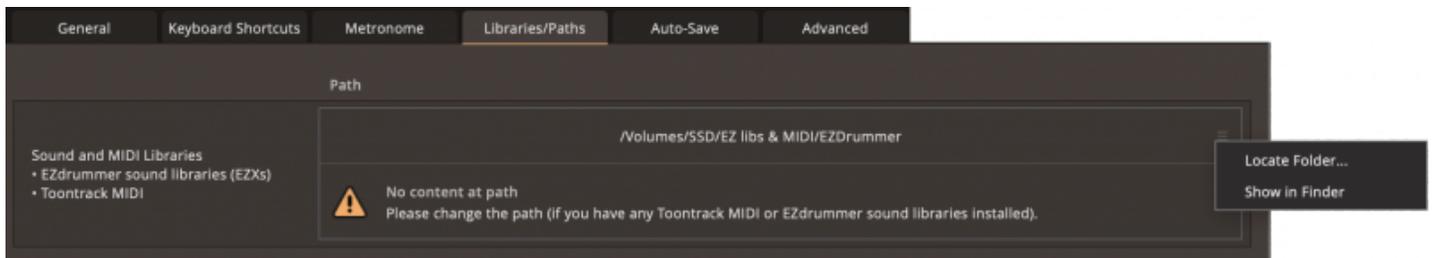
After you have selected the new sound library location, restart EZdrummer 3 and the sounds will load from the new location.

9.4.5 THE AUTO-SAVE TAB

In the Auto-Save Tab, you are presented with options to control the Auto-Save behavior. And Auto-Save EZD3 projects in hosts other than the standalone.
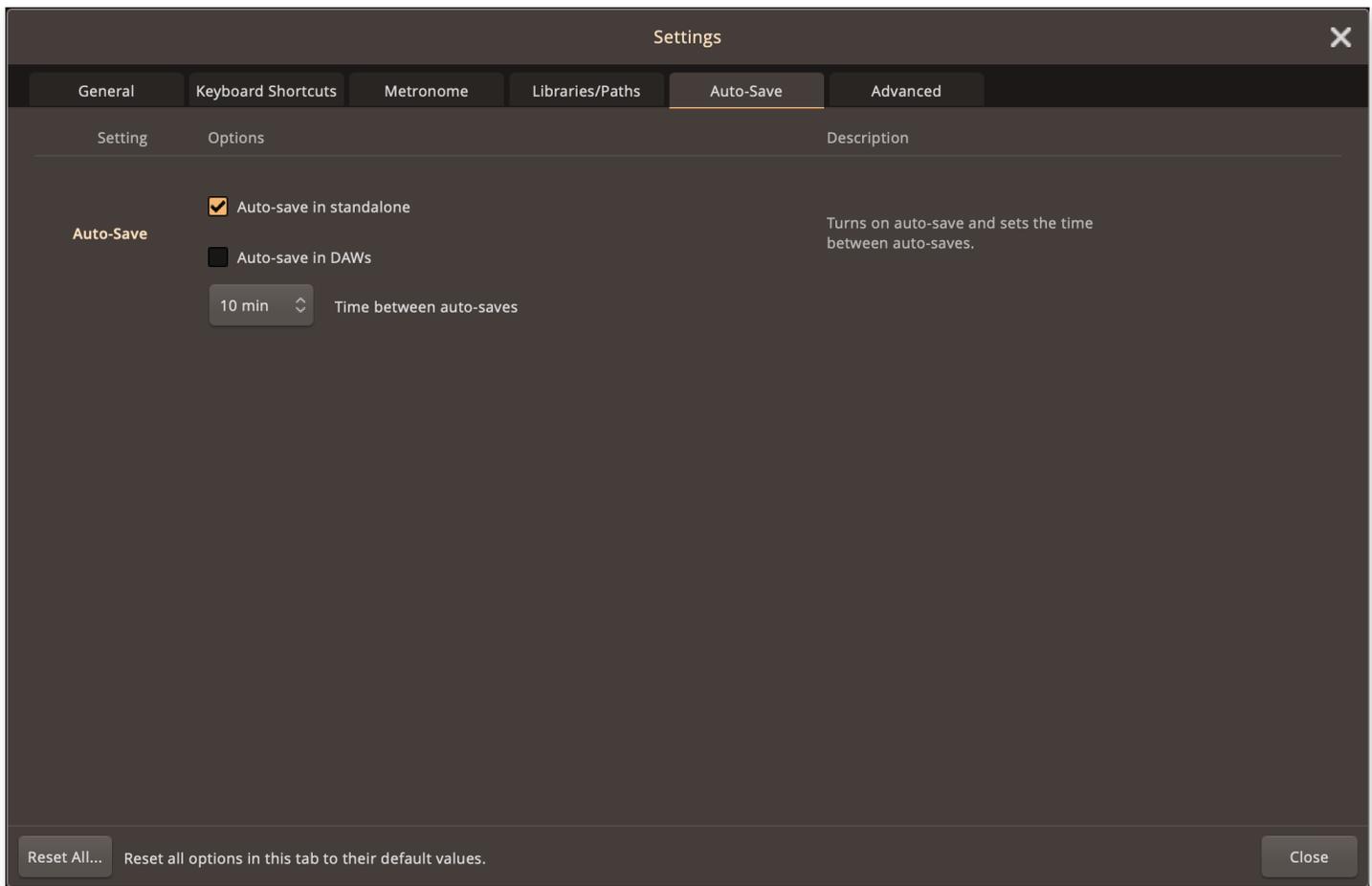
Time durations for the Auto-Save are set with the drop-down menu, and like all other Settings Tabs, Auto-Save options can be reset with the "Reset All" button.

Auto-Saved projects can be accessed from the global File menu in the Auto-Save sub-menu.
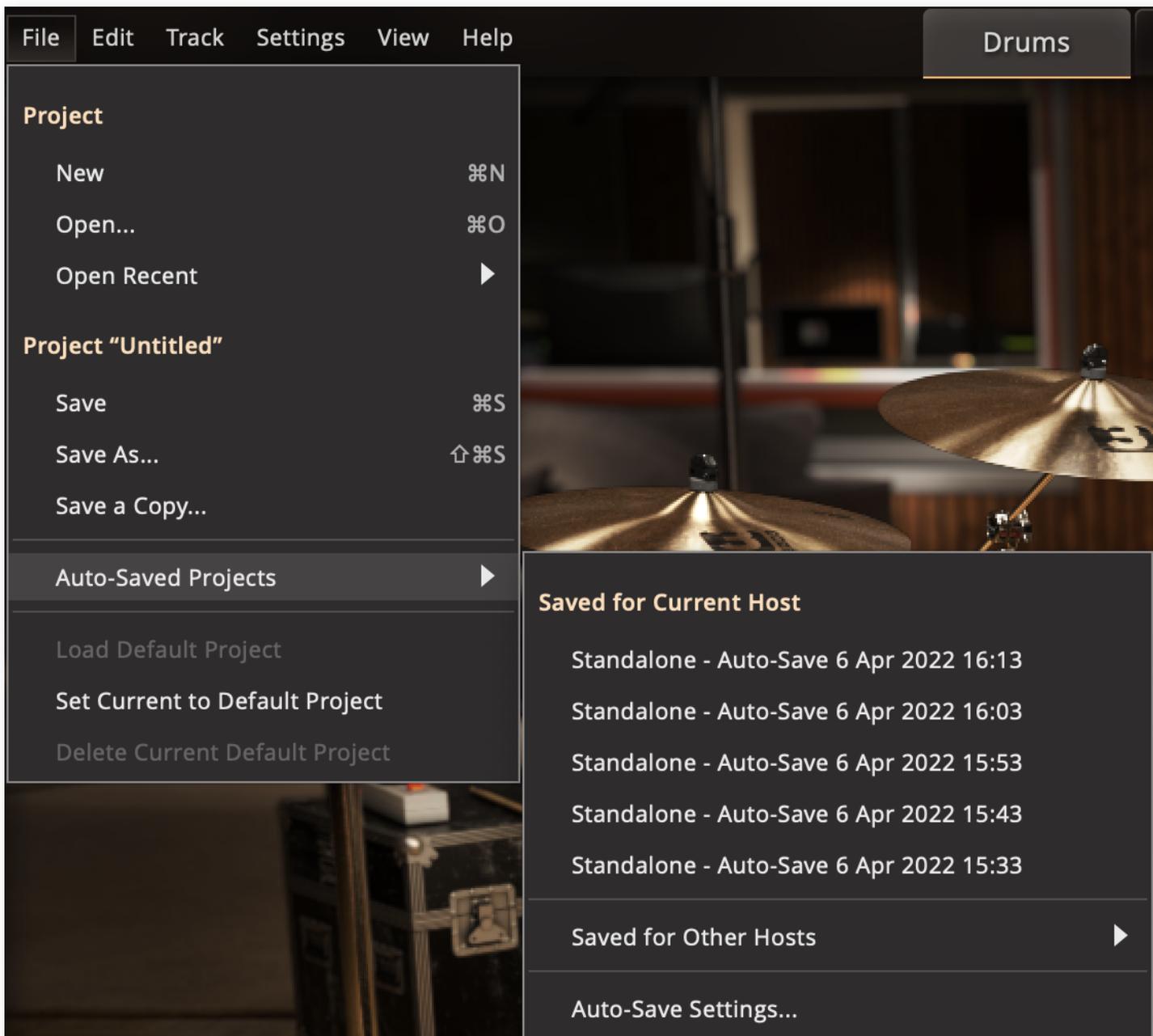
9.4.6 THE ADVANCED TAB

The Advanced tab provides options for resetting the databases of the MIDI browser. The database options should only be used if you encounter a problem with the Search functions in the Grooves Tab.

Settings   ✕

| General | Keyboard Shortcuts | Metronome | Libraries/Paths | Auto-Save | Advanced |

| Setting | Options | | Description |

Factory Restore

MIDI Database   [Restore MIDI Database...]

Restore may fix problems occurring in Grooves, Song Creator, Edit Play Style or User MIDI.
This can take some time and meanwhile, the above listed places will be unavailable.

Note that user-added MIDI libraries included in Grooves will have to be re-added.

Available in Cubase/Nuendo only

Mono Outputs (Cubase/Nuendo)   ☐ Use 32 mono outputs

This setting applies globally to all of your Cubase and Nuendo projects. Older projects may need re-routing.

Only the outputs in the host are affected. The outputs in the EZdrummer 3 mixer will be visually unchanged.

The host needs to be restarted for changes to take effect.

Hit Variation   [EZX Optimized (Default) ⇕]   Set how samples should be picked for individual notes.

Hit variation setting will be stored when your project is saved.   [Close]

Additionally a Mono all Outputs option has been created specifically for use within Cubase projects. Clicking this option will allow you to access individual mono outputs (1-32) instead of 16 stereo outputs.
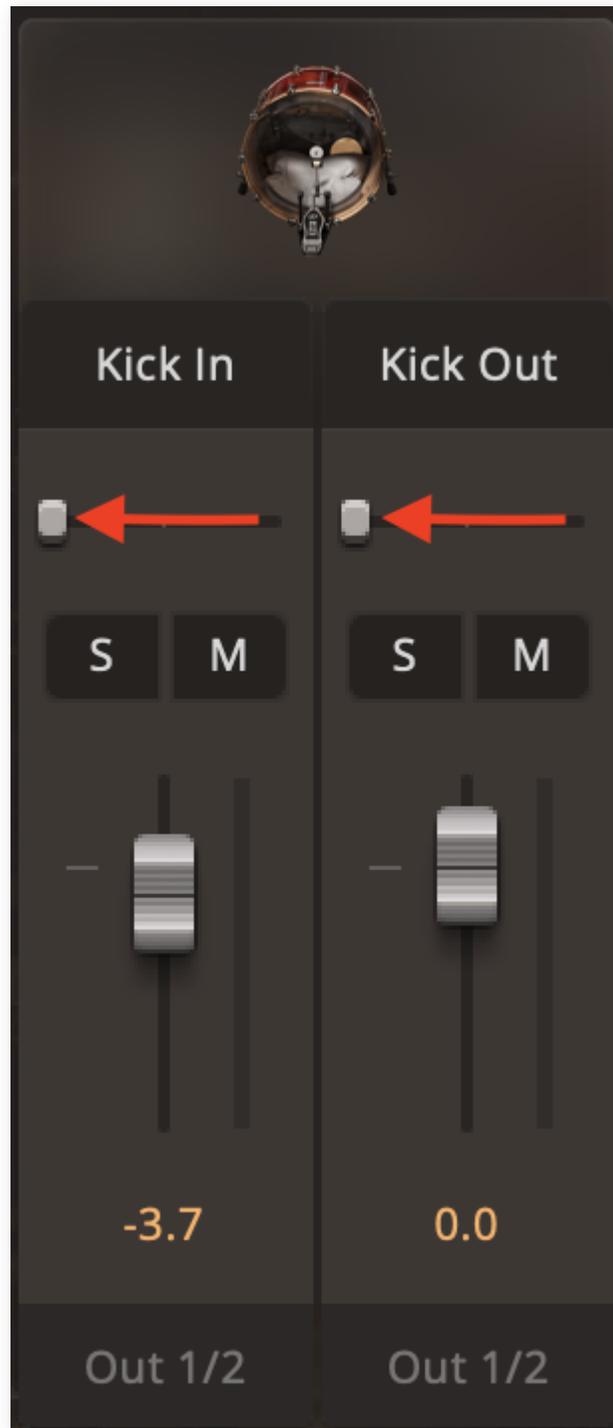
In order for mono channels inside of the EZdrummer 3 mixer (such as the Kick In and Out channel) to be output to a single mono output in Cubase, they must be panned hard left or right. For instance, If you would like to output the "Kick In" channel to mono input 1 in Cubase the correct procedure would be to pan the "Kick In" channel 100% left, then

select Output 1/2 in the EZdrummer 3 mixer (as only stereo outs are available in this menu). This would result in the "Kick In" channel only being output to channel 1. Finally you would then set up the appropriate Cubase channel to recognize EZdrummer 3's output 1 as its source. *(Please see the Cubase manual for more information on using multi output plugins).*

9.4.7 E-DRUMS SETTINGS

The all-new and improved E-Drums settings view in EZdrummer 3 takes E-Drum configuration to a whole new level compared to EZdrummer 2. In this view, you will be able to assign instruments to specific incoming MIDI note values. You are able to edit each

individual instrument's velocity curve, save your customized settings in a preset, activate one of the many new presets that our E-Drum experts have made, and more.

VIDEO INTRODUCTION

EZdrummer 3: E-drums

MIDI DEVICE SETTINGS

You can select your MIDI input source, like your Audio Interface or E-Drums module in the top left of the E-Drums view. First, make sure that you connect your

module or MIDI controller to your computer. The device, if detected, will then show up in the list of MIDI devices that can be used to trigger EZdrummer 3. If the MIDI device is active and communicating with EZdrummer 3, the checkbox is orange.
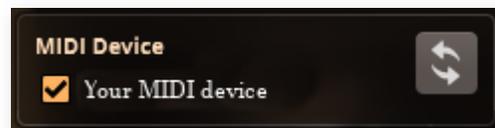
THE E-DRUM PRESETS

Over the years, we have gathered and developed a collection of E-Drum mapping presets that are compatible with a large amount of E-Drum and other MIDI controller manufacturers' products. When you are starting out with your E-Drums or Keyboard and want to start using EZdrummer 3 instead of the built-in sounds in your module, we recommend that you reset your E-Drum module to the default settings for external sounds. A common setting that should be turned off is "Local Control". *Please note that if you have added extra pads to your E-Drums, make sure first that you know how to re-configure your module to include your extra pads after the reset so that they are mapped and can send MIDI to EZdrummer 3.*

When you click the drop-down menu that by default has Toontrack Standard selected, a list of presets and options appears. Select the preset that best suits your module. A lot of times, if it is the same manufacturer, it will work for your module even if your exact module is not on the list. At the bottom of the E-Drum preset drop-down menu, there are preset file managing options.

- **Save As...:** This option lets you save the current E-Drum settings in a user preset with a name of your choice.
- **Save:** Overwrites the previously loaded user preset with the current E-Drum settings.
- **Delete:** Deletes the currently loaded user preset.
- **Manage in Explorer/Finder:** Opens a file explorer in the folder where the user presets are located.
- **Rescan User Presets:** Scans the user preset folder for new presets, or removed presets and updates the User Presets subitems.
- **Set Current State to Default:** Saves the current E-Drums settings to the default preset that is loaded when you start a new EZdrummer 3 project.
- **Load Default State:** Loads the default preset.
- **Reset Default State:** Resets the default preset to factory settings.

THE MIDI MAPPING AND VELOCITY PROPERTIES

This property box displays the currently selected drum at the top. Any changes you make in this box will be applied to the instrument that is selected. By default, the Velocity transform properties are showing.
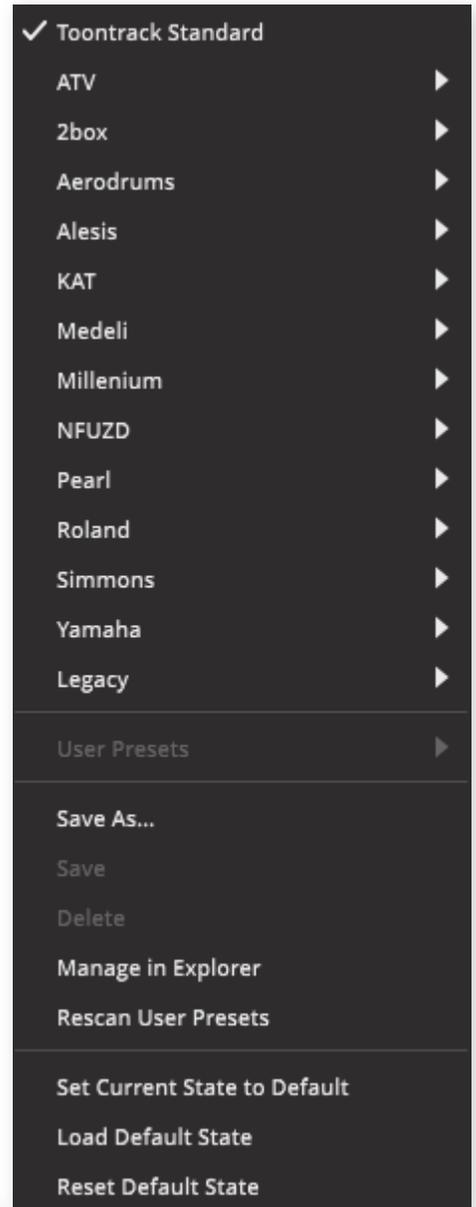
- **Transform Velocity:** This toggle switch allows you to enable and disable what the velocity curve below is doing to your selected instrument.

- **The Velocity Curve Editor:** This box lets you transform the incoming velocity value to a new value that will trigger sounds in EZdrummer 3. This feature would be used if you notice that the transition from soft hits to hard hits is not smooth enough, fast enough, or slow enough for your module and playing style. Again it should be mentioned that the first step to dialing in a good velocity response with EZD3 is to properly adjust the pad sensitivity on your MIDI module for your playing style. After this is done, creating a custom velocity curve will make the response perfect!
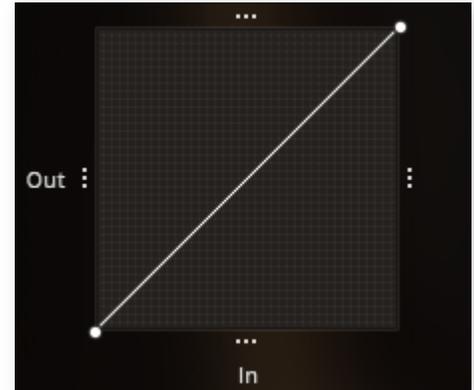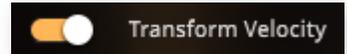
Double click on the velocity line in the graph to create a breakpoint and drag it to create a curve. When clicked a breakpoint will show you the incoming velocity number and its transformed outgoing velocity.
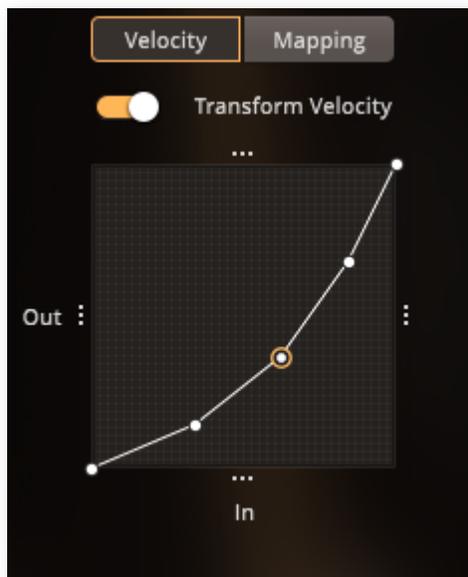
The three-dot icons at the borders of the Velocity Curve graph can also be dragged inwards to create hard limits at user-definable points.
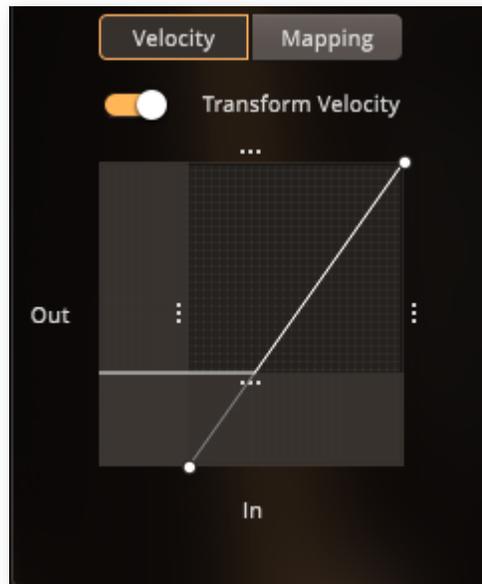
You may wonder what practical use these features have, so let's look at a few real-world cases which are relatively common in live applications involving electronic drums.

- Your drum pad may not be sensitive enough.
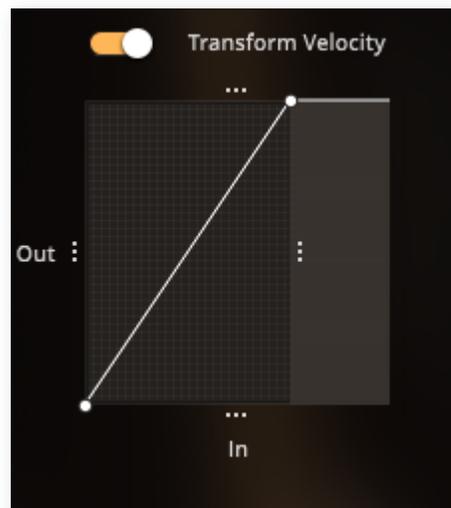
- No matter how hard you hit your pad, the velocity in MIDI is very low. Moving the Output Velocity Limit (3 dots) to the left would help in this scenario.
- Alternatively, if the lower velocity value that is triggered is far above what is considered normal (triggering the gradient hits with soft hits being skipped

altogether) moving the left Velocity Limit to the right would help in this instance.
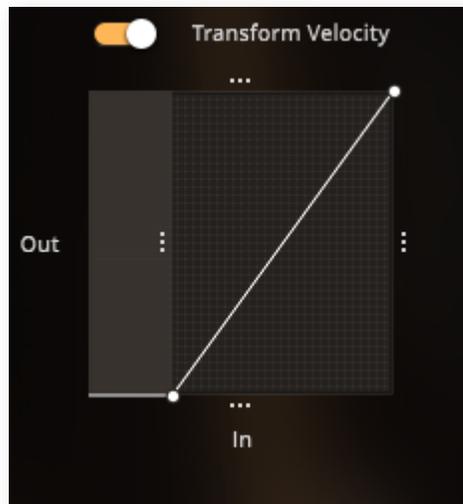
- **Mapping:** The mapping tab lets you re-direct the incoming MIDI from your E-Drums from the MIDI note value that is being sent to a specific instrument and articulation inside EZdrummer 3. At the bottom of this view, you can see the latest MIDI note that was sent from your MIDI device. In our case, it says MIDI In 38. That means that the last MIDI note that was sent was note 38.
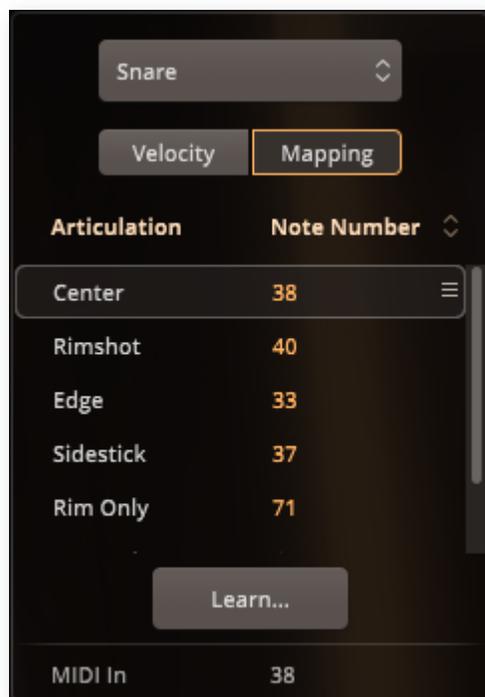
When a MIDI note is received, and it is mapped to an instrument in EZdrummer 3, it will automatically select that instrument at the top, and the corresponding articulation that the

note is mapped to in the list below. In our case, we sent a 38, and that selected the Snare Center articulation.

Now, what if we didn't hit our Snare in our E-kit? We hit the left Rack tom, not the Snare! Then we should first make sure that the correct E-Drum preset is chosen in the list that we described earlier, or we can make sure that our E-Drum module is reset to its default values, and we can also make sure that our MIDI cables at the back of the module are connected properly to their correct sockets.

If you have checked all of those parameters, and it still doesn't trigger the correct drum, we can start thinking about re-mapping. First, select Racktom 1 in the top drop-down menu.
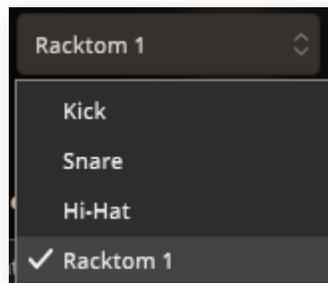
- **Changing the note value directly:** You can double click to edit the Note Number that is listed to the right of the articulation that you wanted to trigger. In our case, we would have wanted to enter 38 instead of 48, since we sent note 38 from our module.

- **Learn...:** You can use the Learn... button at the bottom to put EZD3 into standby, waiting for you to hit the pad that you wanted to trigger the selected articulation. Make sure that you select the correct articulation before entering MIDI learn. The articulation that the pad will trigger is shown in the orange message box that appears.
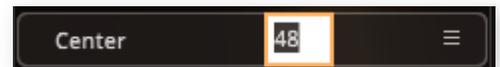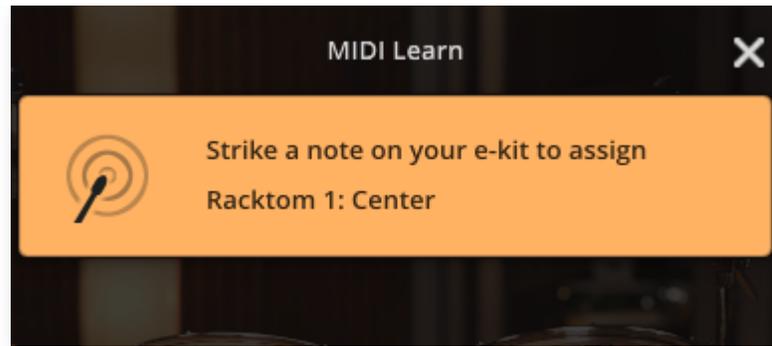
- **Adding an alias:** You can add another note that will trigger Racktom 1 Center, so that both note 48 and 38 triggers the tom. To do that, open the hamburger menu to the right of the note number in the list, and click Add Note.
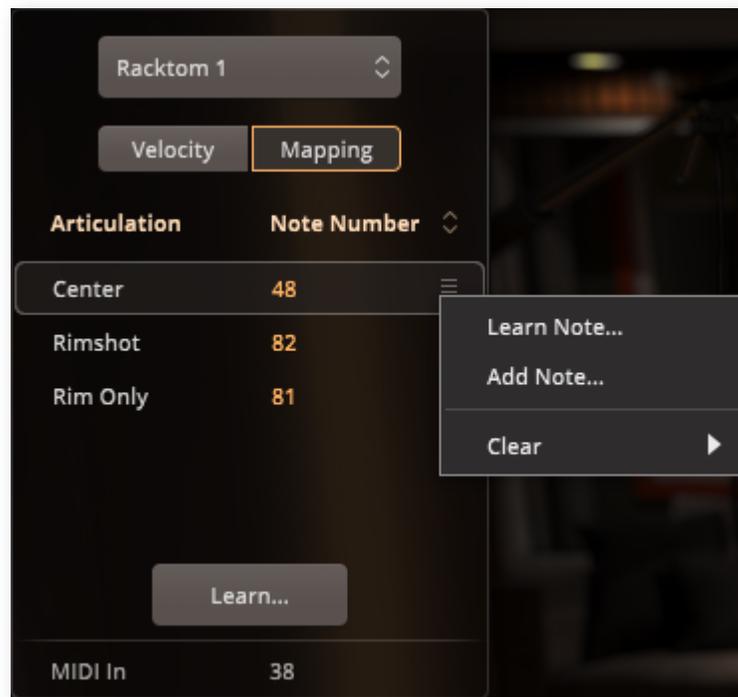
When any of the above methods have been used, your left Rack tom pad should trigger Racktom 1 in EZdrummer 3.

THE HI-HAT PEDAL SETTINGS
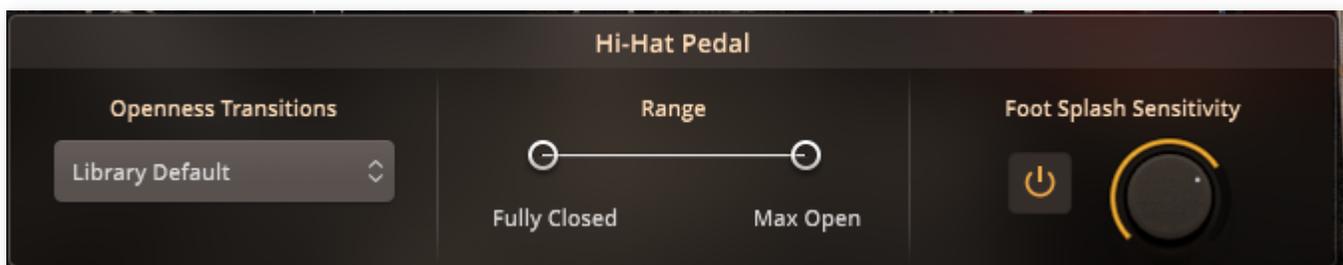
This window lets you calibrate your Hi-Hat pedal. The most important setting in this window is the Range slider that changes how the openness of your Hi-Hat pedal determines how open or closed the Hi-Hat will sound in EZdrummer 3. We will go through all of the options in this window from left to right.

- **Openness Transitions:** There are three different options in this drop-down menu. These options all affect how the Hi-Hat samples transition into each other when the pedal is in movement. They all have detailed descriptions, but the **E-Drum Optimized** option is recommended if you are using E-Drums.
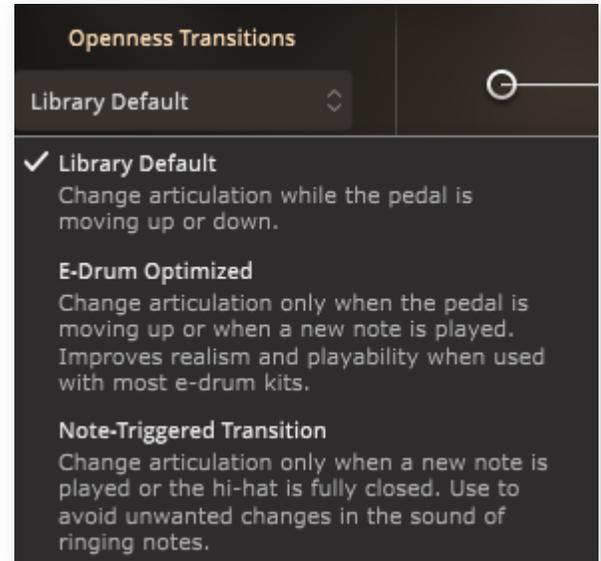
- **Range:** This slider helps you calibrate how open or closed the Hi-Hat should sound depending on how pressed down your Hi-Hat pedal is. Hi-Hat pedals can be differently calibrated, and we recommend that you play around with this slider until you find something that works for you.

For example, if your Hi-Hat pedal is completely pressed down, but it still sounds open and not tight enough, you can drag the left slider to the right.

- **Foot Splash Sensitivity:** This knob determines how easily the "Hats splash" effect will trigger when the pedal is raised after a closed Hi-Hat hit. A high value corresponds to fast triggering. Turn off with the power toggle button to the left.

9.4.8 AUDIO/MIDI SETUP (STANDALONE ONLY)

The Audio/MIDI Setup dialog can be opened from the Settings menu of EZdrummer 3 when launched in its standalone application.
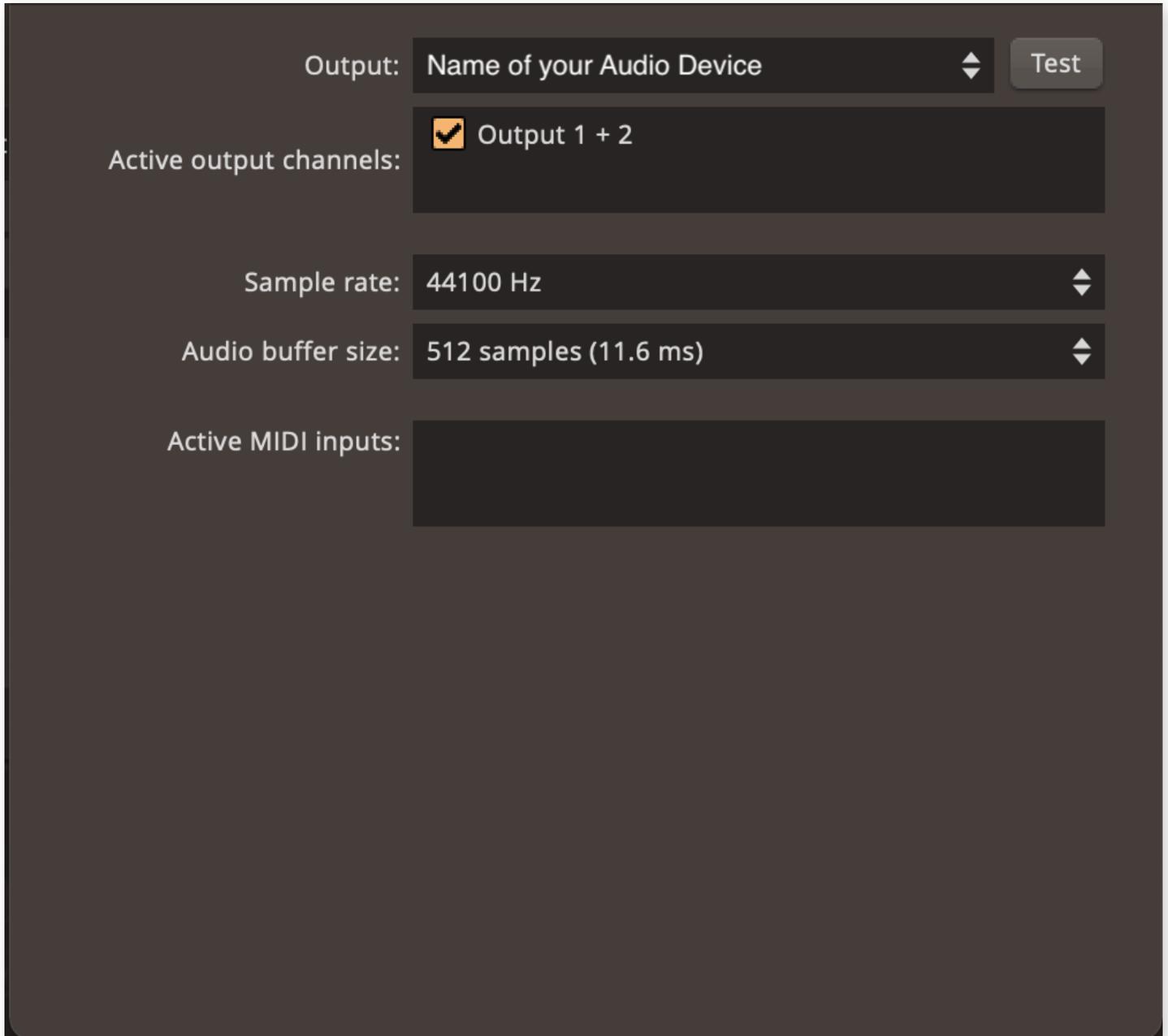
- **Output:** Select the proper output device from the drop-down menus. Windows users will also have access to the ASIO Control Panel to select the buffer size. If you are not using an ASIO device, you can select the buffer size in the drop-down menu below the device selection menu. Generally, the lower the buffer size, the lower the latency. However, a low buffer size also puts more demand on your computer. If set too low you

may experience audio stutters, glitches, or distortion. In such a case simply increase the buffer size. Note that only professional ASIO (Windows) and Core Audio (Mac) audio interfaces will guarantee optimal performance for low latency real-time triggering.

- **Test:** Send test audio to your audio device.
- **Active output channels:** Choose the physical hardware outputs for your audio interface when working in EZdrummer 3 standalone.
- **Sample rate:** This option lets you select the Sample rate that you want to use in EZdrummer 3.
- **Audio buffer size:** As described earlier, this option lets you change the buffer size that you want to use in EZD3.
- **Active MIDI inputs:** Select the MIDI devices that you want to use with EZdrummer 3.

9.5 THE VIEW MENU

The view menu provides menu options for showing, hiding, or changing the layout of EZdrummer 3.
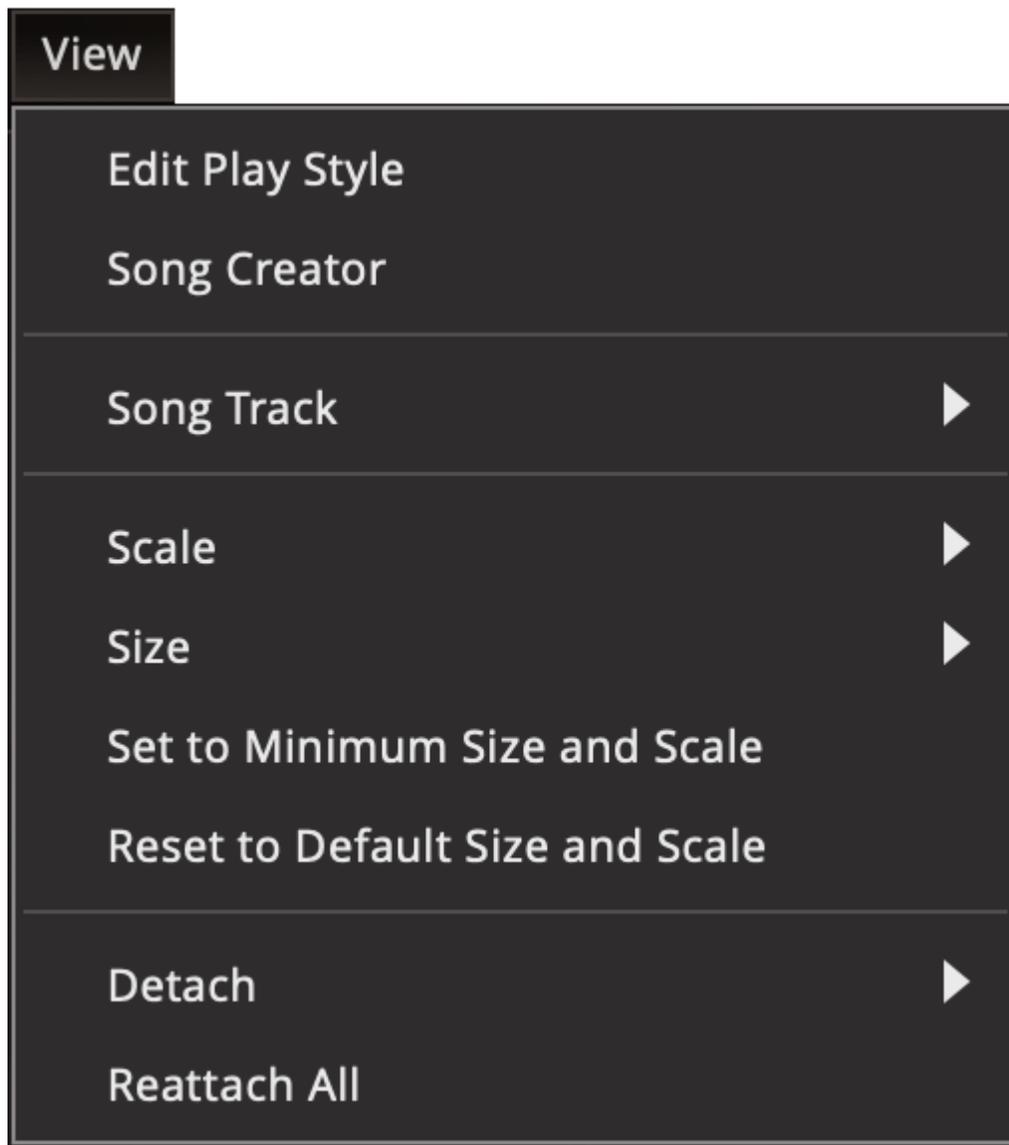
- **Edit Play Style:** Show or hide the Edit Play Style view.

- **Song Creator:** Show or hide the Song Creator.

- **Song Track:** Here a sub-menu will open that provides options to change the size of the Song Track.

- **Scale:** These options change the total size of the EZdrummer 3 interface. It's extremely useful if you have a very small laptop screen and need to make the entire interface smaller, or if you have a large screen(s) and would like to see a larger scaled interface.

- **Size:** Here you can choose one of the preset sizes for the EZdrummer 3 window. *Note: when creating videos with EZdrummer 3 the 1080p option is very convenient!*

- **Set to Minimum Size and Scale:** Choosing this option will change the size and scale of the EZD3 window to the smallest possible option.

- **Reset to Default Size and Scale:** Changes both the scale, size, and proportions of the window back to the default.

- **Detach:** A dedicated menu option for detaching the tabs in EZdrummer 3.

- **Reattach All:** All detached tabs will be reattached to the single interface window.

9.6 THE HELP MENU

The Help menu provides valuable information about EZdrummer 3 and all installed sound libraries.
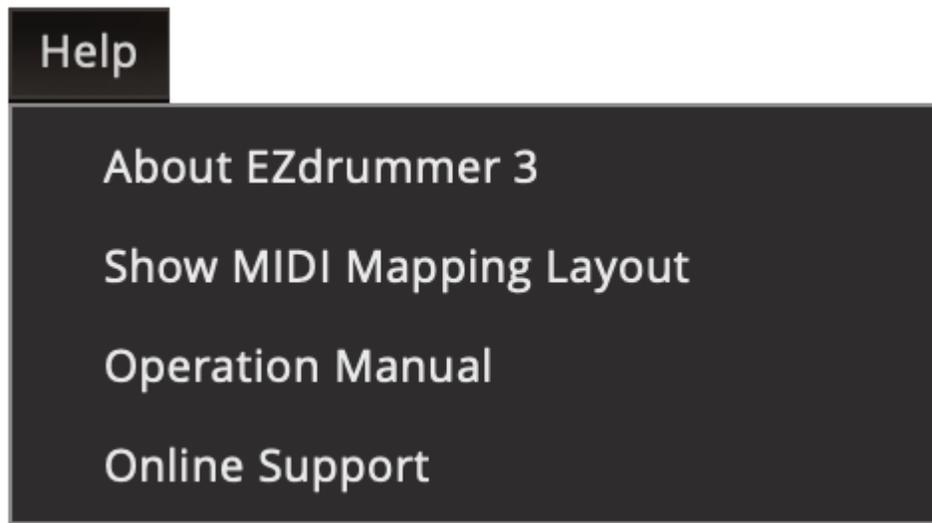
- **About EZdrummer 3:** This selection will display information about all of the installed Toontrack sound and MIDI libraries on your computer. There is a convenient "Copy Text" button so that you can easily copy and paste this information. This information would be used if you ever needed to contact support and information about your installed libraries was needed.

- **Show MIDI Mapping Layout:** This opens the MIDI mapping layout that can help you find the note number or key that is mapped and will trigger certain instruments and

articulations in EZdrummer 3. Read more about the mapping layout later in this chapter.

- **Operation Manual:** An instant link to the web version of the EZdrummer 3 manual.
- **Online Support:** An instant link to the support section of Toontrack.com, where you can browse the support forum or contact Toontrack support via email.

THE MIDI MAPPING LAYOUT

The new MIDI Mapping Layout view can be opened via the Help menu. It displays the external MIDI mapping that is used when you are controlling EZdrummer 3 with an E-Drum kit, if you are playing MIDI on your DAW timeline or any other MIDI controller.

The layout is visually represented with a keyboard and displays the note values that will trigger any articulation in the currently loaded sound library.

If you change anything in the E-Drums/MIDI In settings with the mapping, those changes will appear in the MIDI Mapping Layout.

HIGHLIGHT INSTRUMENT
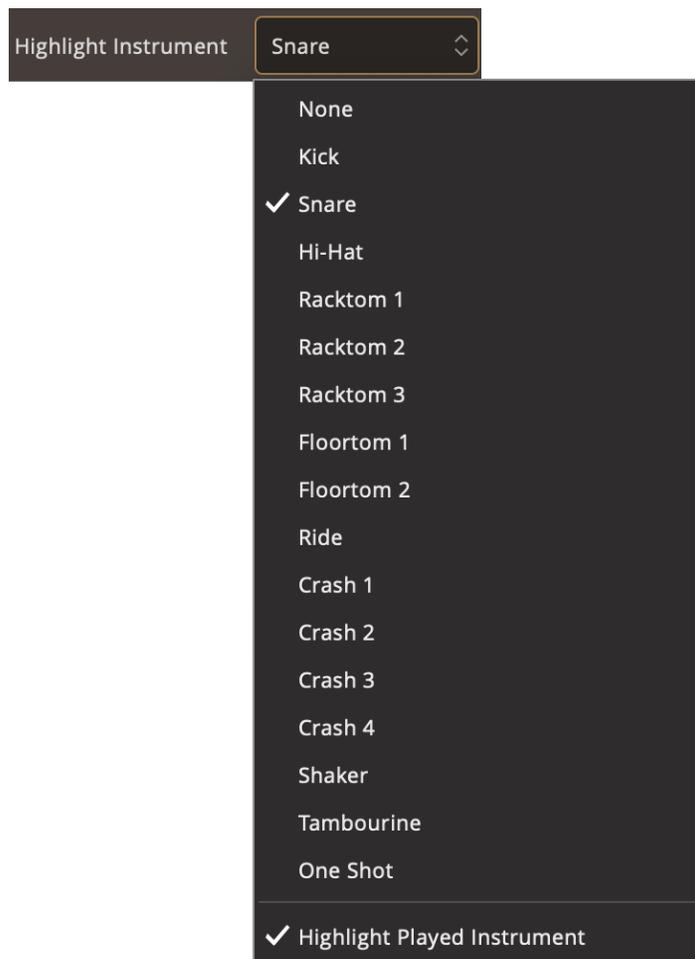
This menu lets you select all of the notes and articulations that are related to the instrument in the list. So if you select the Snare, the mapping for the Center, Rimshot, Sidestick, and all of the other recorded Snare samples in the current kit are highlighted.

- **Highlight Played Instrument:** Enable to automatically highlight the keys of the instrument that is played by incoming MIDI.

DIM EXTRA NOTES
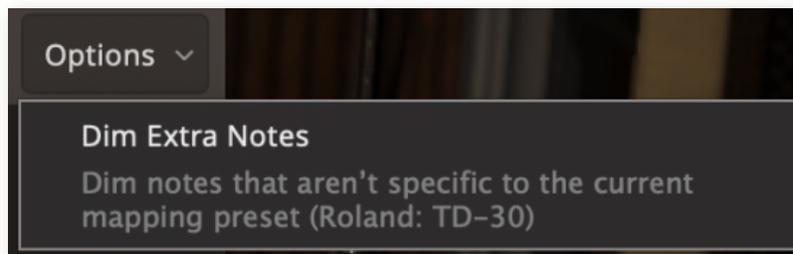
This option lets you fade out the notes that are not specifically mapped in the current preset that you are using so that you can focus on the changes that our presets are doing to the Toontrack Standard preset.

PRINT...

Click the Print... button to open the printer options, and to print the MIDI layout.