

Procedure for preparing cycles of complex waveforms and integrate them into PRO3

XFER SERUM

To prepare complex waveforms which will then be intended for the Pro3, you can use the plugin from Xfer <https://xferrecords.com/products/serum>

It is a plugin which has a wavetable editor

Here is a screenshot of the table editor.



1 - To start the procedure, you must launch your DAW and load the **vst serum** on a MIDI track.

The step of creating tables with the plugin will not be explained here, but only the procedure for adapting the creation to the required provisions imposed by Pro3.

2 - Reduction of the number of cycles of a wavetable.



Once your wavetable is created, you will have to adapt it

Looking at the screenshot above, we see that the created wavetable has 256 wave cycles. However, for the Pro 3, only 16 are required. It will therefore be necessary to reduce the number of cycles from 256 to 16.

To do this, open the plugin's table editor by clicking on the blue pencil to the right of the graphical representation of the wavetable. (When you hover over the icon it turns blue, click on it)



Then,

Use the Remove morph table option to remove "polarization" if there is one. Click on the Morph tab:

Morp> Remove morph table.

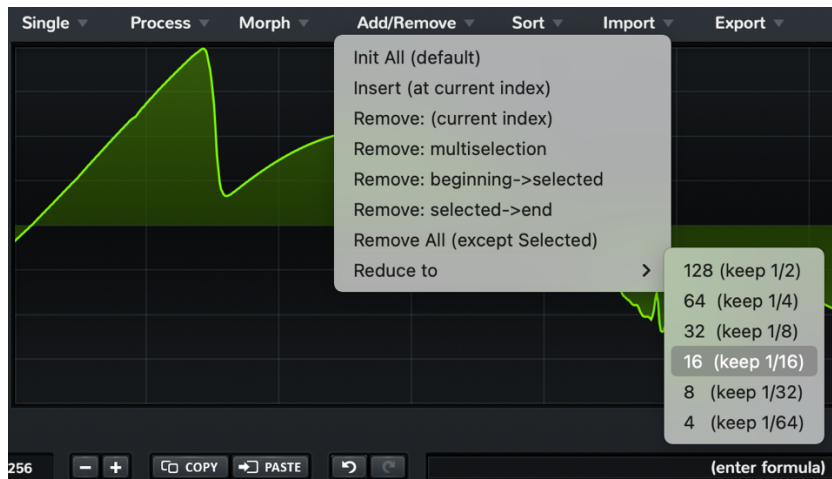
The purpose of this function is to separate the cycles from one another.

Now,

Click on Add / Remove:

Add / Remove> Reduc to> 16 (kepp 1/16)

The purpose of this function is to divide 256 wave cycles into 16 cycles.



You would get this:



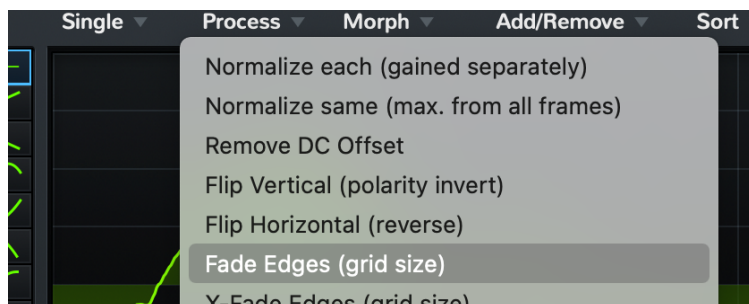
3 –Adjust the edges of the wavetable to point 0

Now, it is a question of adapting the left and right edges of the 16 cycles obtained to point 0 to avoid artifacts (click, pop, etc.) once the wavetable is in Pro 3.

Click on Process:

Process> fad edges (grid size)

The edges of the wavetables are now at point 0.



4 - Export the 16 cycles to a folder

This procedure consists of exporting the 16 created cycles in one go.

The plugin will therefore export the 16 cycles to the location of your choice. The format will be 44.1Khz 32bits.

Click on Export:

Export> Export all as a single cycle waves.

Your wavetables are now ready to be converted

AUDACITY

5 - Conversion to 48khz 16 bits

Audacity: <https://audacity.fr> allows you to easily convert audio files.

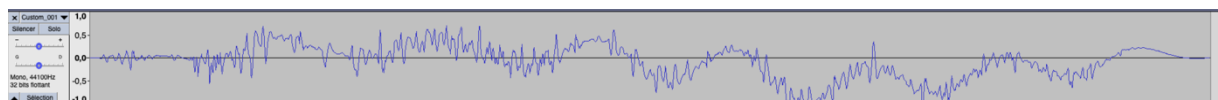
Import the audio into audacity: Click on
Open Audacity.

File> Import> Audio



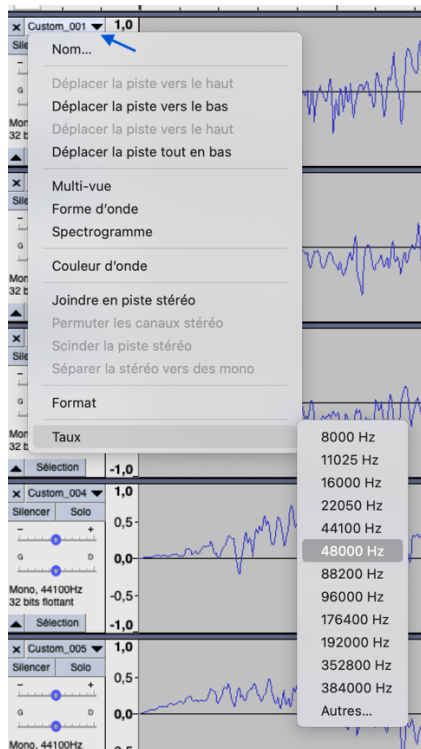
Select the 16 cycles previously created and open them.

You will thus obtain 16 audio files one after the other.



Convert audio to 48khz:

Click on the menu of 1^{er} audio file. Point the mouse towards: **Rate> 48000 Hz** Repeat this operation for the 15 other files that follow.

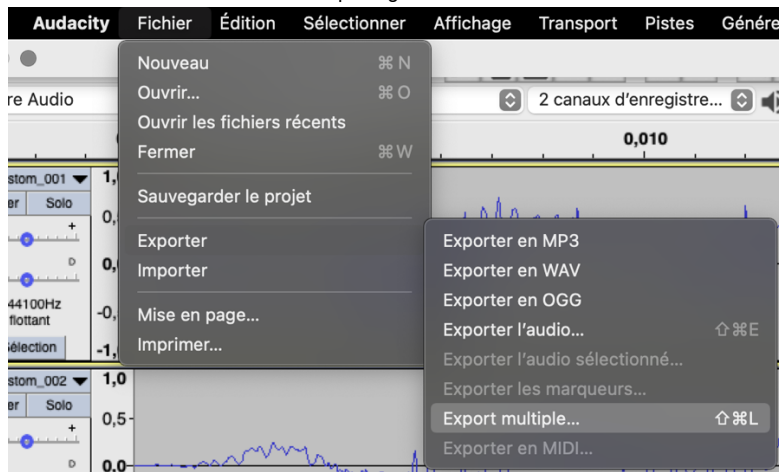


Export audio files: File> Export>

Once the files are converted, export them.

Multiple Export

This function will have the effect of exporting all the audio files of the session.



16-bit export:

Before exporting, select the necessary encoding. By default this is on Signed 16 bits PCM. Make sure you are on Signed 16 bit PCM. Click export.

The screenshot shows a dialog box titled "Export multiple". It has a section "Exporter les fichiers vers :" with a "Dossier :" field containing the path "/Users/geoffroyinceloup/Desktop/Wavetable/Monster/Convert", a "Format :" dropdown set to "WAV (Microsoft)", and buttons "Choisir..." and "Créer". Below this is an "Options :" section with an "Encodage :" dropdown set to "Signed 16-bit PCM". At the bottom, there are two sections: "Séparer en fichier selon :" with radio buttons for "Pistes" (selected) and "Marqueurs", and "Renommer le fichier :" with radio buttons for "Selon le marqueur ou le nom de piste" (selected), "Numérotation avant le nom de marqueur ou de piste", and "Numérotation après le préfixe de nom de fichier". There are also input fields for "Premier nom de fichier" and "Préfixe de nom de fichier", both containing "Custom_001". A checkbox "Écraser les fichiers existants" is at the bottom left. At the bottom right are "Annuler" and "Exporter" buttons.

PRO 3 WAVETABLE GENERATOR

Your audio files are ready to be imported into the Pro3 wavetable generator. To import them, open the following link

<https://www.sequentialwaves.com>

Then select your 16 audio files and drag and drop your files into the space prepared for.

The screenshot shows the Pro3 Wavetable Generator web interface. It has a sidebar with five steps: "1. IMPORT WAVES", "2. NAME THE WAVETABLE", "3. CHOOSE THE WAVECYCLE LENGTH", "4. CHOOSE THE WAVETABLE POSITION", and "5. CONVERT FILES AND SAVE". Step 1 is active and shows a "DROP FILES HERE" area with a download icon and an "UPLOAD FILES" button. Step 2 has an "Enter name (8 characters max)" input field. Step 3 has a "1024" dropdown menu and a note "* all waves must be identical length". Step 4 has a "33" dropdown menu. Step 5 has a "SAVE FILE" button.

Then follow the conversion procedure provided and save your file.

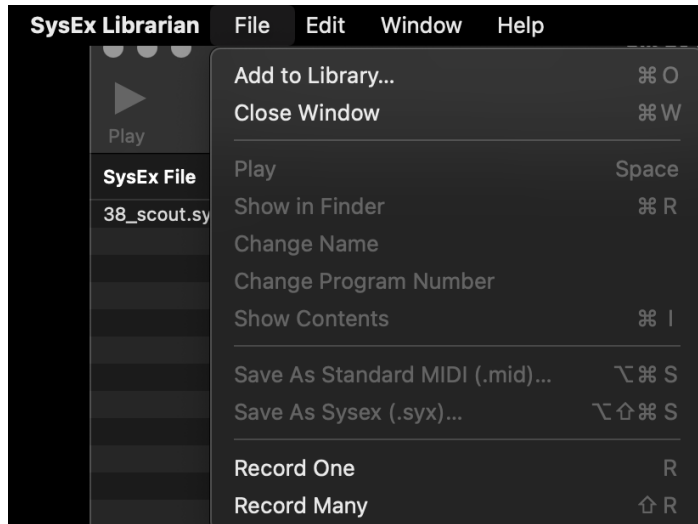
SYSEX LIBRARIAN

SysEx is a .syx file transfer program. It will allow you to store the wavetable created in the Pro 3.

SysEx Librarian: <https://www.snoize.com/SysExLibrarian/>

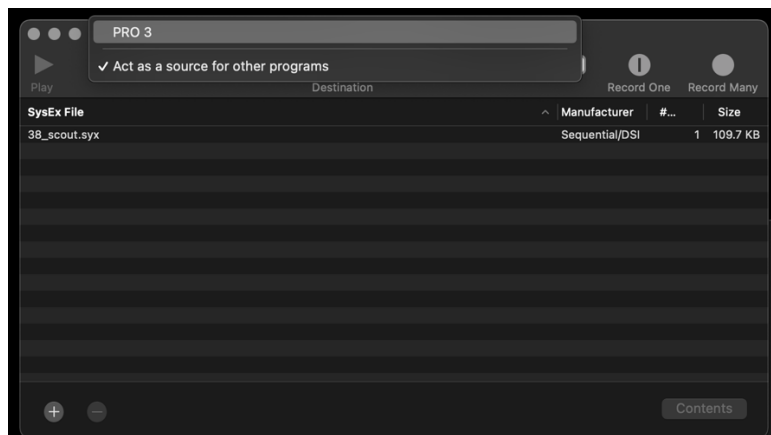
Open SysEX and load your wavetable into the program.

File> Add to Library



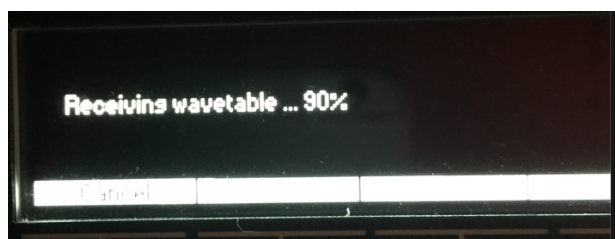
Connect the pro3 to USB and make sure it is turned on.

Then click on PRO 3



So the .syx file will be intended to go on the PRO3.

Then click on **Play**. The wavetable file will then be transferred to the Pro 3 at the chosen location. You will see on the front of the synthesizer the loading of the current file. Wait until it is fully loaded.



Your newly created and converted wavetable and now on the Pro3, ready for use.