

CUBASE

VST

The Arpeggiator



Steinberg

Documentation by Ernst Nathorst-Böös, Ludvig Carlson, Anders Nordmark, Roger Wiklander
Additional assistance: Cecilia Lilja
Quality Control: Cristina Bachmann, Sabine Pfeifer, Claudia Schomburg

The information in this document is subject to change without notice and does not represent a commitment on the part of Steinberg Soft- und Hardware GmbH. The software described by this document is subject to a License Agreement and may not be copied to other media except as specifically allowed in the License Agreement. No part of this publication may be copied, reproduced or otherwise transmitted or recorded, for any purpose, without prior written permission by Steinberg Soft- und Hardware GmbH.

All product and company names are TM or © trademarks of their respective owners. Apple, the Apple logo, Macintosh, and Power Macintosh are trademarks of Apple Computer, Inc.

© Steinberg Soft- und Hardware GmbH, 2000.
All rights reserved.

The Arpeggiator

The Arpeggiator allows you to create arpeggios from MIDI chords. Actually, there is not one, but four arpeggiators which run simultaneously. Each of the four arpeggiators can have its own settings for input/output, MIDI channel, type of arpeggio etc.

The arpeggiator can be played in real time and you can record its output to any MIDI track in Cubase. You can also use a recorded track as an input to the arpeggiator.

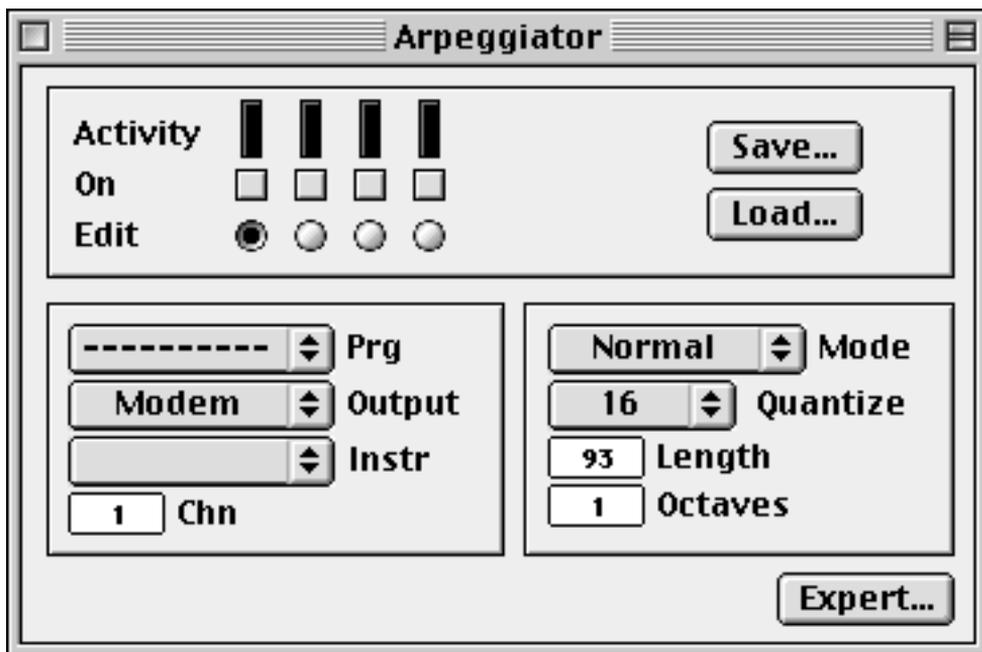
Selecting an Input Source

Before you can use the Arpeggiator, you need to select a Track and set its Output so that it is routed to the Arpeggiator's Input. This is done in the Output Track column:

1. Locate the Track you want to use as Input for the Arpeggiator.
2. Pull down the Output pop-up menu for the Track, either in the Track columns or in the Inspector.
3. Select "Arpeggio".
The selected Track is now routed to the Arpeggiator Input.

Opening the Arpeggiator

- To open the Arpeggiator, pull down the Panels menu and select "Arpeggiator".
The Arpeggiator panel appears.



Note that the panel doesn't have to be visible or even open for the Arpeggiator to work (once you have activated it).

About the Easy and Expert modes

There are two main modes for the Arpeggiator, Easy and Expert. You switch between them with a button at the bottom of the window. We suggest you start out in Easy mode while you first try out the Arpeggiator.



Switching to Expert mode.

On, Edit, Save and Load

In the top part of the Arpeggiator you will find a section that looks identical regardless of the Easy/Expert Mode switch:

To the left you will find four activity indicators with a checkbox and a radio button below each one.

- **When you put a check mark into a field in the “On” row, the corresponding Arpeggiator will be activated.**
- **The “Edit” radio buttons are used to select an Arpeggiator to view and make settings for.**

It is possible to have all four arpeggiators turned on at the same time (checked), but only one can be selected for editing.

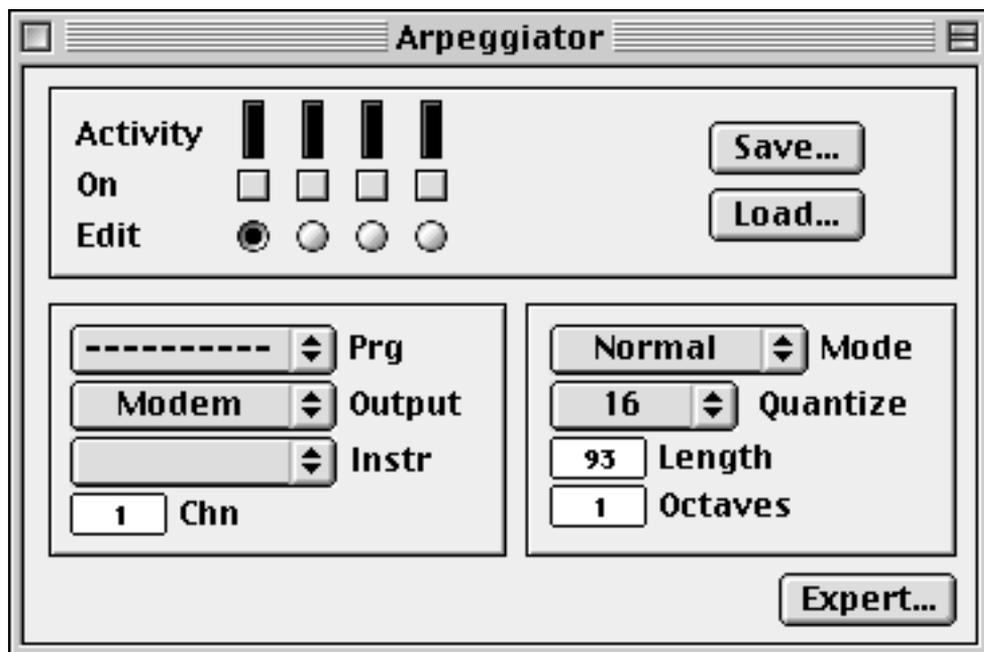


Arpeggiators 1 and 2 activated, Arpeggiator 2 selected for editing.

The two buttons to the right of the activity indicators are used for loading and saving Arpeggiator settings, see later in this chapter.

Easy Mode Settings

The following settings are made separately for each of the four arpeggiators in Easy Mode



Output section

Prg (Program)

Selects a program in your sound source. This is identical to the Patch Name field in the Track/Part-Inspector of the Arrangement window.

Output

The MIDI output for the selected arpeggiator. The MROS setting is used for recording the arpeggio onto a Track in Cubase (explained below).

Instr (Instrument)

If you have defined an Instrument in the Arrange window, you can direct your arpeggio output to this instrument. The Channel, Output and Patchname Source settings will then change accordingly.

Chn (Channel)

This is the output MIDI channel of the selected arpeggiator.

Arpeggio Settings Section

Mode

This pop-up menu sets the arpeggio mode.

Mode:	Description:
Normal	This is the normal up/down arpeggio.
Invert	This inverts the arpeggio when the top note is reached.
Down Only	A repeating arpeggio downwards.
Up Only	A repeating arpeggio upwards.
Random	The arpeggio plays the notes of the chord in random order.

Quantize

This parameter sets the “speed” of the arpeggio. Since it always plays at the same tempo as Cubase VST, this is specified as a note value.

Octaves

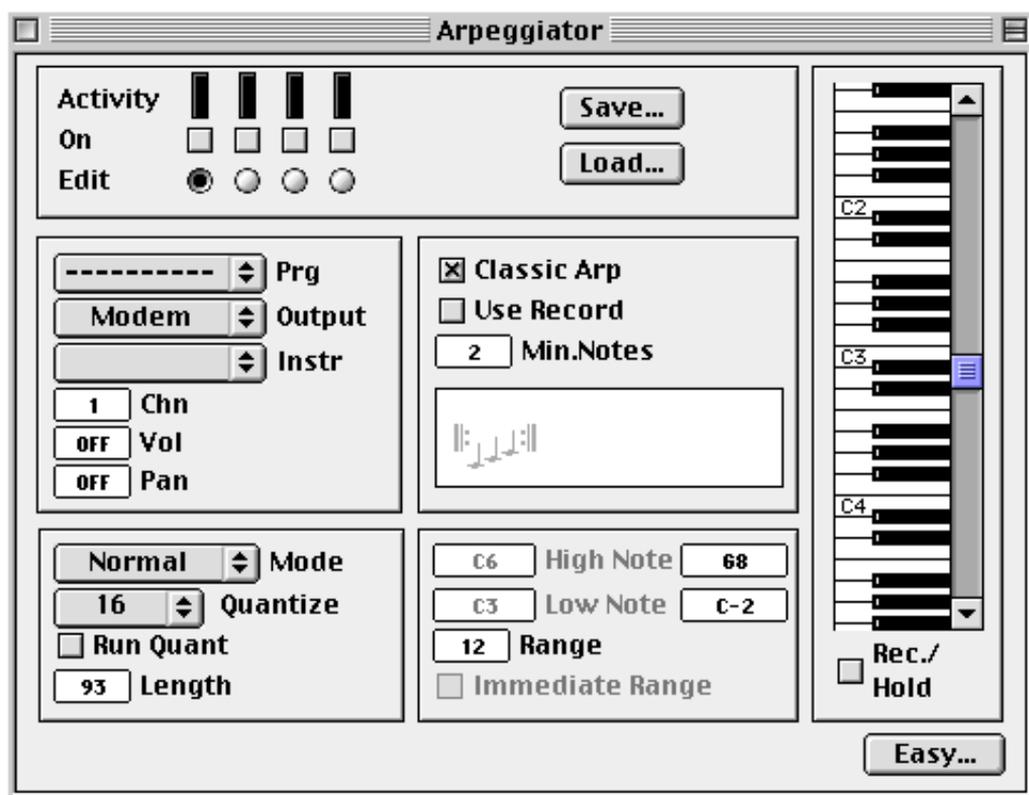
This sets the range of the Arpeggio to a number of octaves starting with the lowest note you press on your MIDI keyboard. A setting of 1 gives you a range of one octave, counted upwards from the lowest note you press.

Length

Sets the length (in ticks) of the output notes.

Expert Mode Settings

In this mode there are significantly more possibilities and options.



Output Modules

Program, Output, Instrument and Channel

See Easy mode, above.

Volume

This is the volume value that will be used by the sound playing from the selected arpeggiator. This is exactly the same as setting a Volume in the Inspector.

Pan

This panning value will be used by the sound playing from the selected arpeggiator.

Main Arpeggiator Settings

Classic Arp

- When this box is checked the arpeggiator behaves as in Easy mode, which means it performs a classic arpeggio that plays the notes you press up and down repeatedly through the range set in the Range or High/Low note boxes.
- When the box is unchecked you can set the arpeggio characteristics in the "Sort Box" below.

Use Record

With this function activated, the Arpeggiator uses the notes "recorded" in the Rec./Hold section (the keyboard) as input to the arpeggiator, instead of real-time input from a MIDI keyboard or a track. To use it, follow the steps below:

1. **Check the "Use Record" box.**
2. **Click the Rec./Hold button to put a check mark in it.**
3. **Press the keys you want to record on your MIDI keyboard.**
4. **Click the Rec./Hold button again to deactivate it.**
5. **Play a key on your MIDI keyboard.**

The arpeggiator will now play a transposed arpeggio based on the notes on the onscreen keyboard, beginning at the note you pressed on your MIDI keyboard.

If you want to change chords "on the fly", proceed like this:

1. **Click the Rec./Hold button while you're still holding down the key on the MIDI keyboard.**
2. **Release the key on the MIDI keyboard and play the new chord.**
3. **Release the chord and click the Rec./Hold button to deactivate it.**
4. **Press a key on the MIDI keyboard to trigger the new chord.**

Min Notes

When "Use Record" is unchecked, this parameter sets the minimum amount of keys that have to be pressed for the arpeggio to start.

The Sort Box

The Sort Box is a graphical description of the arpeggio. It becomes "greyed out" when Classic Arp is checked. The number of notes in the graph represent the number of different notes in the arpeggio. The pitches of the notes in the graph represent the relative pitch of each note in the arpeggio. The pitch range of the notes is C1 to A2 (treble clef), but please note that these are not absolute pitches, but relative ones. The actual pitches produced by the arpeggiator depends on which notes you play on your keyboard.

You can add, delete and move notes up/down with the mouse:

- **Using click and hold, dragging a note downwards to C1 (the lowest possible pitch) will delete that note and all following notes.**
- **Clicking a note with the mouse button while holding the [Option] key will produce an arrow that changes the pitch one half tone. Repeated clicks will switch between arrow up/down/off.**
- **Double clicking in the white field will call up a menu with preset series of notes.**

Mode

This pop-up menu sets the arpeggio mode.

Mode:	Description:
Normal	This is the normal up/down arpeggio.
Invert	If Classic Arp is unchecked this inverts the arpeggio when the top note is reached.
Down Only	A repeating arpeggio downwards.
Up Only	A repeating arpeggio upwards.
Random	The arpeggio plays the notes in random order.

Quantize

See Easy mode above.

Run quant

This function will quantize the arpeggio output to the song position, when Cubase is running. If you want the arpeggio to run "in sync" with Cubase, activate this.

Length

Sets the length (in ticks) of the output notes.

High/Low Note

This is only available when the Range switch is set to its lowest value – Off. It sets the maximum range of the arpeggio notes.

Range

When this is set to anything but Off, it determines the range to a number of notes starting with the lowest note you press on your MIDI keyboard. A setting of 12 gives you a range of one octave, counted upwards from the lowest note you press.

This corresponds to the Octave setting in Easy mode.

Immediate Range

This function only works when Classic Arp is unchecked. When Immediate Range is checked the arpeggio immediately jumps to the nearest note inside the set range when a chord is pressed. If unchecked, the arpeggio will start at the pressed key and work itself into the set range and then stay there.

Recording An Arpeggio Into A Cubase Track

Recording the arpeggiator output into a Cubase Track is done in two steps:

- **By first recording a Track that is routed to the arpeggiator Input.**
- **Then switching the arpeggiator Output to “MROS” and recording into a new Track.**
Proceed as follows:

1. **Open the MIDI Setup dialog box and make sure that “MROS” is active in the “Input From” pop-up.**
2. **Select a Track and set the Track Output to Arpeggio.**
3. **Make the Arrange window active and activate recording.**
4. **Play the desired chords on the keyboard.**
The chords you play will arpeggiate according to the settings you have made.
5. **Stop recording.**
6. **Set the Arpeggiator Output(s) to “MROS”.**
7. **Select a new empty Track.**
8. **Activate recording.**
The new Track will record the arpeggiator Output.

-
- ❑ **If the arpeggio outputs are set to different MIDI channels, be sure to set the MIDI channel for the recorded track to “Any” if you want to keep the channel assignments when playing back.**
-

Using A Cubase Track As Input To The Arpeggiator

1. **Set the desired Track’s Output to “Arpeggio”.**
2. **Start Playback.**

Loading and Saving Arpeggiator settings

The Load and Save buttons allow you to save Arpeggiator settings to disk, as individual files. When you load an Arpeggio file, the settings in the file replace the settings you have now.