LiSa X v1.0 ß0307

manual addendum

---------------------- *New features* ----------------------------

The Window Toolbar

In the 'Options' menu, a new menu item has been added, the 'Show Window Toolbar' option. This menu toggles between 'Show...' and 'Hide...'. When the user selects 'Show Window Toolbar' a small Toolbar strip opens with icon buttons of LiSa's windows. When clicking on one of the icon buttons, the corresponding window opens or is brought to front, with its button highlighted. The arrangment of the buttons is as follows: top one: Assignment, next 9 for Zones, Patterns, Envelopes, Tables, Controllers, Samples, Midi Processors, Midi Snapshots and Parameters. All these open the corresponding editor windows, command-clicking opens the library window. The exception is only the Parameter library since there is no editor.

The next four icon buttons represent: Presets, Status, Mouse Control and Midi Snapshot Control.
Last, but not least are nine text buttons representing the nine Environments that can be used. Only the Environments that exist has its corresponding button enabled. The position and open/close info is stored in the Preferences / Setups.

The Mouse Control window

In the top left corner there is a numerical named 'Voice Layer'. This allows you to fix the view to a Voice Layer that you want to look at in the Mouse Control window, thus also generating midi events corresponding to that channel. When set to '--' it will follow the current View channel in the Assignment window (this is how it used to be)

The Table Editor

If the Caps lock is on, drawing in the Table Editor's graphics view draws line segments. Click anywhere in the drawing area and drag the mouse to where you want. You will see that a straight line segment follows your mouse. Whenever you change horizontal direction, LiSa will mark the turning point as a new value and start a new line segment from there.

The Assignment window

Now always shows Midi feedback.
The notes being played and the parameter control values. If the Option 'Display last Midi events' is flagged, the parameter control values will be shown by numbers (in the midi range from 0-127), if not these values will be shown by coloured bars. Each created Controller uses its own colour as shown in the Controller Editor. You can change the color by clicking on the color button.

Higher resolution for Scale Retuning.
In the Assignment window, when using the Scale Retuning feature to individually set the tuning in Cents for each key, the tuning can now be set with two decimals behind the comma, so you can create a pure harmonic 5th which is 701.96 cents higher than the root.

The Midi Process Editor

Delayed auto repeat function for processed midi note events.
When using a Midi Processor to process a midi note event into for example a continuous controller, when holding down either the incrementor or decrementor key, after a certain 'Delay' time LiSa will step thru the selected Event Data Table automatically. Example: Use note 60 as the incrementor and note 59 as the decrementor note events, translate this into Ctr 1 using a lineair Event Data Table and a Delay of 10. Now whenever you play note 60 and hold it down, a continuous rise of Ctr 1 data will be the effect until it reaches value 127. With note 59 you can scroll down to value zero. This means that with just 2 note events you can effectively steer a continuous controller.

Two extra parameters in the 'Other' pane.
The first one, 'Trigger Mode' is a popup menu where you can select either 'Normal' or 'Activity'. The second one shows the 'Gate Time' that is used when the trigger mode is 'Activity'. When the Trigger Mode is 'Normal' the Midi Processor works as before, when it is in 'Activity' mode it works as follows: Whenever an incoming controller event is processed into a Note Event, the amount of activity determines when the Note On should be generated and also when the corresponding Note Off should be generated. With the 'Threshold' parameter you determine the minimum changes of the incoming controller which should happen WITHIN THE 'GATE TIME'. This parameter can be set from 0.005 to 10 seconds. Let's say the incoming midi controller is Modulation Wheel data (ctr 1), the out event is Note 60 (middle C), the Trigger Mode is 'Activity', the Threshold is 3 and the Gate Time is 1.5 seconds. This means that as soon as LiSa receives midi Mod.Wheel data it will translate this into a Note On for middle C and as long as you keep changing the Mod. Wheel data with more than 3 values every 1,5 seconds, the note will stay on. At the moment your activity drops below these limits, LiSa will generate the note off event for middle C. If the 'Thru' option is marked, the incoming Mod.Wheel data can also be used for direct parameter control such as volume or spiralness. Make sure to mark the Processor 'Active' when you try this new feature.

If the incoming controller event is translated into another controller event such as Breath Control (ctr 7) or Pitch Bend and the Trigger Mode is 'Activity', the incoming data is used to 'pump up' the outgoing controller. The 'Gate Time' determines how quickly the outgoing data decrements.

By creating two Midi Processors in 'Activity' trigger mode to process let's say midi Modulation Wheel data, one which translates into a note event and another which translates into a controller event, you can have a lot of control by just moving your Mod. Wheel. Try it out!

The Controller Editor

Controllable Modulation Depth.
The Controller Editor has been redesigned slightly. The BPM indicator has moved to the Modulator part. This part now also contains two new

popup menus to the right of 'Modulation Depth'. A Controller can be selected from the 'Controller' popup menu to control the Modulator's output depth. When no controller is selected the depth will always be maximum. The Depth Controller Type can be either a Midi controller or another Modulator. A CTab may be selected to convert the Depth Controller's data, same as with the Speed Controller.

One shot mode for Modulators.
The One Shot Toggle button allows you to step thru the Modulator's cycle just once, instead of having it loop all the time. This way you can create complicated audio, filter, tuning, etc. envelopes.

The Zone Editor

'Ignore' option in Ctabs.
The Table popup select menu for Ctabs now has a new menu item: 'Ignore'. Whenever this is selected any realtime control of the corresponding parameter, either by midi or modulators, will be ignored. This allows you to isolate one or more Zone's parameters from being controlled while other parameters are still controllable. If you want all the Zone's parameters to be untouched by realtime control you can still use the popup menu 'Zone Parameter Control' and set it to 'Disabled'.

With this new feature you don't have to create 'Fixed' tables anymore for parameters that shouldn't change under realtime control.

Dynamic length recording.
How it works: When a Zone is Record mode, the 'length' CTab popup-menu has an extra menu, called **Dynamic**. When this is selected, the length numerical is shown in an italic typeface, showing you the Zone is in 'Dynamic' recording mode. When the Zone is activated it will start recording in the Sample Buffer at the 'Start' location and continue to the end of the buffer as long as the Zone is active, no matter what the length setting is. However, when you stop the Zone by sending its corresponding midi note-off event the time between note-on and note-off is taken as the new Zone length. This means you can capture the phrase you want without having to pre-think the length of the phrase. In other words: the length of the recording Zone is dynamically adjusted

every time you activate/de-activate it. This is great together with the other new feature for Playback Zones:

Region Link.
How Region Link works: The idea is that the 'Start' (S), 'Lenght' (L) and 'Mvr' (M) parameters can be taken over from another Zone (for example a Dynamic recording Zone), so that when this Zone has its S, L and M changed, the Playback Zone that is 'linked' to it will use these settings as well.

Every Playback Zone now shows a popup menu named 'Region Link'. When you open the menu, it shows all the Zones in your Library and you may select one of them. When selecting the Zone you are currently looking at, the 'Region Link' shows 'None', meaning there is no linking. In any other case it shows the name of the Zone you want to link the Region S, L and M parameters to. At the same time the corresponding numericals will be shown in *Italic*, including their CTabs, meaning that you won't be able to edit them.

When opening a Setup made with an older version of LiSa, each Zone's Region Link will be set to 'None'.
When removing a Zone from the Library (using the 'Cut' menu), all the other Zone's that where linked to this Zone will have their Region Link set to 'None' again.

When a Zone's function is 'Record', now you are able to choose out of 5 different recording options. Hold down the shift key and click on the 'Input' numerical (which initially shows you 'Both'). The first three menu options are the same as they where, 'Both', "Left' and 'Right' (see manual). Two options have been added: 'Left only' and 'Right only'. When selecting either one, the OTHER channel in the Sample Buffer will remain unaffected when recording, thus allowing you to record a channel completely independantly.

--------------------------- **Changes** ----------------------------

LiSa Settings
• The 'LiSa Settings' dialog window has moved from the 'Global' menu to the 'LiSa X' menu under 'Preferences'.

Key Map
• Key Map extended. The numeric keys '0' to '9' are now also available for Key Map midi events.

Sample Editor
• Zooming is now done with the Up/Down arrow button in the Tools pane. Clicking on the Up arrow zooms in, Down arrow zooms out.
• Option-'space bar' starts recording directly in the Sample Editor instead of Command-'space bar'.

Control Editor
• When using a midi controller to change a Controller's modulation depth and/or modulation speed parameter, you don't need to send this event on the System channel anymore. If for example you are using the midi Mod. Wheel for controlling the mod. depth of a modulator that is used for filter sweeps on Zones assigned to a midi channel 2 voice layer, you send the midi event to midi channel 2 and it will only effect the modulation of voices assigned to midi channel 2.
• The Controller Editor has an extra parameter on the bottom of the Modulator pane: 'Delay'. With this parameter you can set a delay time before the modulator starts running. The range is from 0.00 to 10.00 seconds.

Status window
• The Status window shows the content of the Sample Buffer using a logarithmic scale. This corresponds better to the loudness perception of the human ear. The Sample Editor still uses the lineair display, because this works better for visual feedback of data when editing.

• Output buffer grabbing is always on. Instead of activating this by pressing the 's' key, LiSa grabs its audio output as soon as there is a voice playing and keeps on doing that untill there is about 5 seconds of silence. This is shown in the Progress bar and very handy indeed, because isn't it great to know that if you have played/rehearsed some great stuff but forgot to record it, it is still there for you to be saved? When output buffer grabbing is happening, the progress bar is blueish, when it has stopped, it will turn greenish. The Output buffer for this reason is now a circular buffer, meaning that when it reaches the end it will wrap to the beginning, thus starting to overwrite whatever was there. Whenever you select 'Save Output buffer...' from the File menu, you will save the whole Output buffer. When using the midi event to

auto save the Output buffer (see menu Global: LiSa Settings), the file will be named 'date' Output 'time' and it will be saved in your 'Documents' folder. Whenever the Output buffer is saved, the whole buffer will be cleared and start recording at the beginning again.

Setups
• When opening an old Setup and LiSa X asks you to locate a sample file, it will use the selected directory for all the other needed samples. When all your sample files reside in one directory this means that you only have to 'learn' LiSa X once where to find the samples.
• Session files as created by the 'Auto Save Session' option are stored in your 'Documents' folder.

Audio / Midi configuration
• LiSa X uses OSX's CoreMidi and CoreAudio features. This means that for the Midi interfaces you need OSX drivers from the respective companies.

• One of the powerful features of OSX is CoreAudio, meaning that you don't need ASIO drivers anymore for multichannel audio devices. Of course you need the device drivers for OSX, but most audio device making companies have native OSX drivers now. LiSa X 1.0ß has been tested with the following devices: the Edirol UA-3(D), Edirol UA-1A, the M-Audio Quattro, the Emagic EMI 2I6, the MOTU 828 and the Tascam US-428.

• LiSa X always uses CoreAudio, so no switching between Sound Manager and ASIO anymore.

• The 'Audio Setup' dialog window has been renewed. You can independantly select the Input and Output device.

• The Audio Setup info is also stored in the Setup. When re-opening a Setup LiSa X tries to setup the Audio as was saved in this setup. If it fails, you will be notified.

• When for some reason the selected Audio Device's connection is lost, LiSa X tries to switch to the default built-in audio device.

• The Audio Setup dialog window is completely functional now. In CoreAudio you work basically with stereo channels, so instead of having independant left and right in- and outputs, LiSa X has now four input menus (for A-D) and four output menus. The physical in- and outputs of the device are numbered like 'Input 1 + 2' for the first two input channels, 'Input 3 + 4' for the next two, etc. Same for the outputs.

• When using the 'Built-in audio controller' device, LiSa X uses the input that has been selected in the 'Sound' preference pane in the 'System Preferences'. If you want to change it, open the System Preferences, go the 'Sound' pane and select the Input you want to use. You can do this while LiSa X is still open, the change will have effect immediately.

• The Audio Setup settings are being stored in the Preferences, so next time you open LiSa X it will use these settings. If a particular In- or Output Device is not found you will be notified.

• When the audio processing time overloads the duration of the sample vector, the user will be notified in the Status window and automatically the last voice will be stopped.

• When a Setup was created for an ASIO device, these settings will be ignored when opening in LiSa X.

• The Presets window has changed a bit, the Option to Enable/Disable recording has been removed even as the Good/Best playback option.

Environment Menu
• Delete Current Environment added, so that you can shorten the menu list.

Zone Editor
• Dynamic Load Zone function: Immediate Load mode now also allows you to use the Options 'Offset' and 'Only One', like in Dynamic Load. Its functionality is exactly the same.

• Command-click instead of click on the colour bar in the ZE now opens the Colour Picker

Important Notice:

• When opening an old v2.56 Setup LiSa X will mark the Setup as a 'Save As' setup,because it is strongly advised to save an old Setup under a new name. These newly saved Setups cannot be opened in the old v2.56 anymore, because important info about the used Audio hardware is different. You will probably also have to re-open the Audio Setup window and click OK to activate the sound.
• If you make a copy of the application, you can start them up both, meaning you have two copies of LiSa X running! You could for example use two Audio Devices and two Midi inputs to have two completely independant music machines, all in one computer!

Last but not least:

This is a ß version, please report any problems to frank@steim.nl