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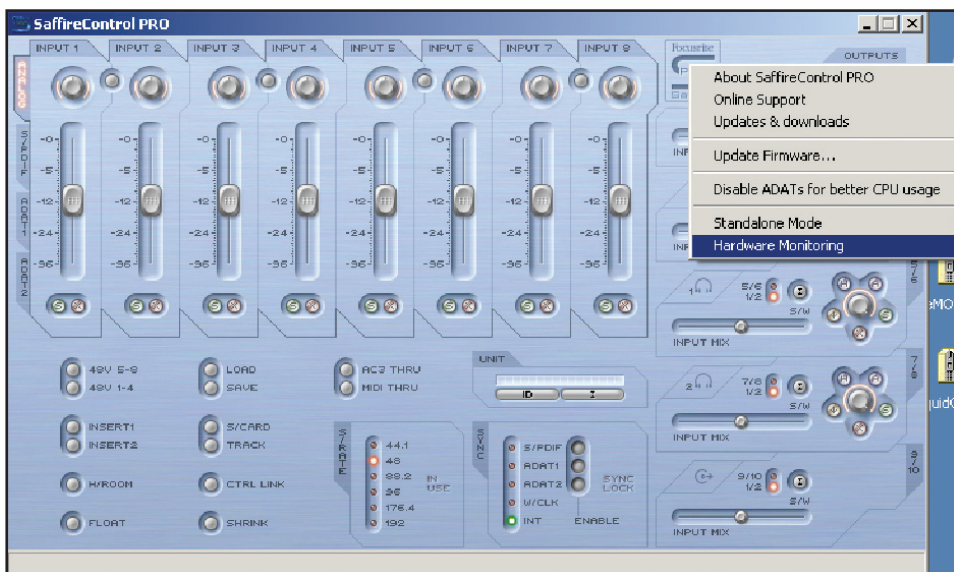
# New Features

## Hardware Monitoring

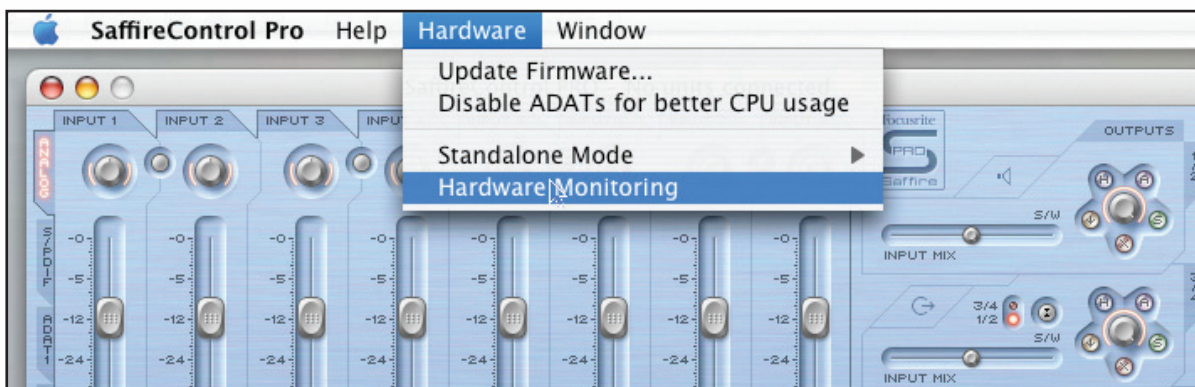
The hardware monitoring feature allows the 8 analogue inputs to be routed directly to the 8 analogue outputs for zero latency 8-channel monitoring. In this mode, the levels of each input sent to the analogue outputs are defined by the recorded gain set by the knobs on the front panel. If wanting to use SaffireControl PRO to create a monitor mix with specific levels of each input, the digital outputs can still be used for this purpose (see the next section).

Whilst in Hardware Monitoring mode, the 8 analogue inputs can simultaneously be recorded direct to disk. This feature is useful if you want to use the Saffire PRO preamps with zero latency while still tracking to the DAW.

Hardware Monitoring is activated on a PC by clicking the Saffire logo in the SaffireControl PRO software window and then selecting Hardware Monitoring, as follows:



Alternatively, on a Mac, simply select Hardware Monitoring from the Hardware Menu option, as shown:



## Digital Output Monitoring

When hardware monitoring is enabled, the analogue outputs are unavailable for monitor mixing. This is because the input signals are not converted to digital and simply pass directly from the preamp to the analogue output. However, any digital output can still be used as a monitor mix. This allows you to hear a monitor mix created with SaffireControl PRO, whilst still routing all 8 analogue inputs directly to the analogue outputs with zero latency; a perfect solution for live recording situations.

The S/PDIF Output is probably the most suitable for this application as this output has a 'I/P Mix - S/W' crossfader (allowing the blending of Inputs, created using the faders in the top left of the window, with a stereo backing track from the sequencer).

## Digital Inputs and Sync Source Selection

As of Saffire PRO 2.0, S/PDIF and ADAT digital inputs are always 'ON' (unless you have disabled the ADATs for better CPU performance). This means that you no longer have to turn the digital inputs 'ON' or 'OFF'.

The functionality of the sync source status LEDs has also changed. 'Desired' sync source and 'active' sync source are now indicated as follows:

**GREEN LED: 'Active' sync source**

**RED LED: 'Desired' sync source**

For example, when you select a digital input as the Saffire PRO sync source, this digital input becomes the 'desired' sync source until a different sync source is selected. If the digital input for the 'desired' sync source is physically connected and valid, the 'desired' sync source becomes 'active' (indicated by a GREEN LED).

If a sync source is selected while the digital cable is disconnected or invalid, the sync source will be set as the 'desired' source (indicated by a RED LED). If the 'desired' digital input is then physically connected, the 'desired' sync source will then become 'active' and the LED will turn GREEN. Similarly, if the digital cable of the 'active' sync source is disconnected (or if the source becomes invalid), the 'active' source will be reset to 'desired' (turning from GREEN to RED), and the 'active' sync source will be reset to internal.

Please note that the 'desired' sync source functionality works differently for word clock sync. If word clock is selected as the sync source and no digital word clock cable is connected, Saffire PRO detects this and automatically switches back to internal sync (as with other sources). However, the 'desired' state is not remembered and when a valid word clock is connected again, word clock must be manually selected as the source once again to sync to it.

# Changes to Version 1

## Using Multiple Units on a PC

In the Saffire PRO version 1 User Guide, it is stated that the Saffire PRO installer must be run individually for every unit being used in a multiple device setup. For example, the first unit must be connected and the installer run, then the unit disconnected and the next one connected then the installer run again, and so on for each unit. This is not the case for Saffire PRO version 2.

The Windows installer for Saffire PRO version 2 uses a coininstaller that automatically detects when an additional unit is connected and updates accordingly. So, the installer only needs to be run once, not multiple times.



# ■ Additional Info

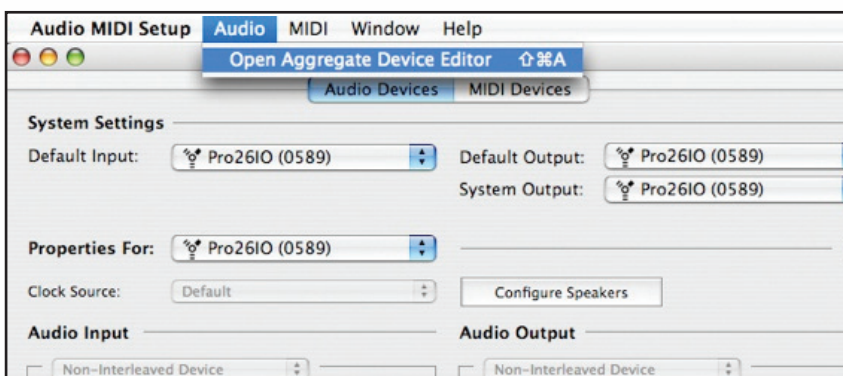
## Setting up Multiple Units on a Mac

Please Note: Before attempting to use multiple Saffire PROs, you must ensure that both units have the same up to date firmware, and are running at the same sample rate. You may also want to disable ADATs to save CPU, as running 2 units will use more CPU than running 1. In this example, the ADATs have been disabled (providing 2 x 8 analogue ins and outs + 2 x S/PDIF ins and outs)

In order to use multiple Saffire PROs within Mac OS X, it is necessary to create what's known as an "Aggregate Device" within Apple's "Audio MIDI Setup". The "Aggregate Device Editor" is available within the Audio MIDI Setup utility. This allows you to combine multiple sound cards into one "aggregate" sound card, where the inputs and outputs of each device are included in the aggregate device.

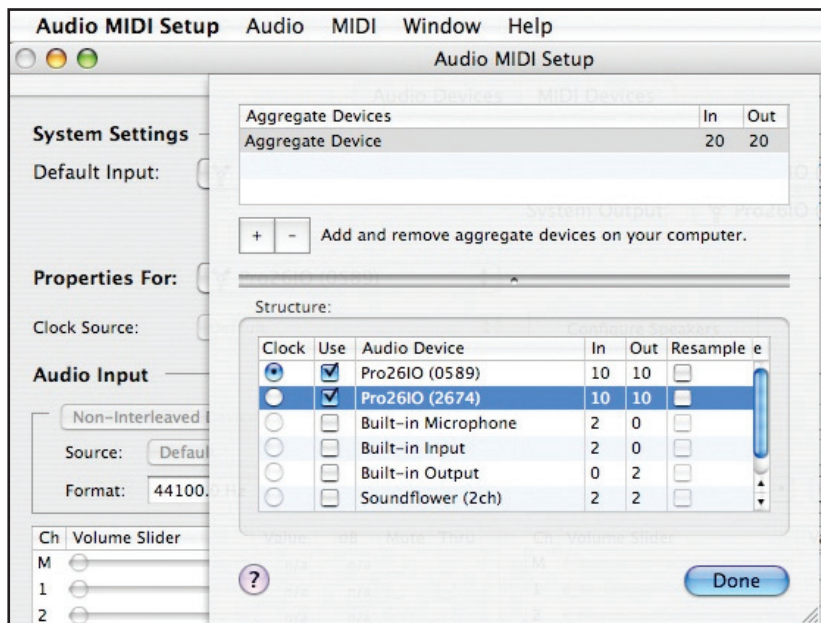
Here are the steps to configure the Saffire PRO as an aggregate device:

1. Open Audio MIDI setup (located in /Macintosh HD/Applications/Utilities/)
2. Select "Open Aggregate Device Editor" from the "Audio" menu as shown below



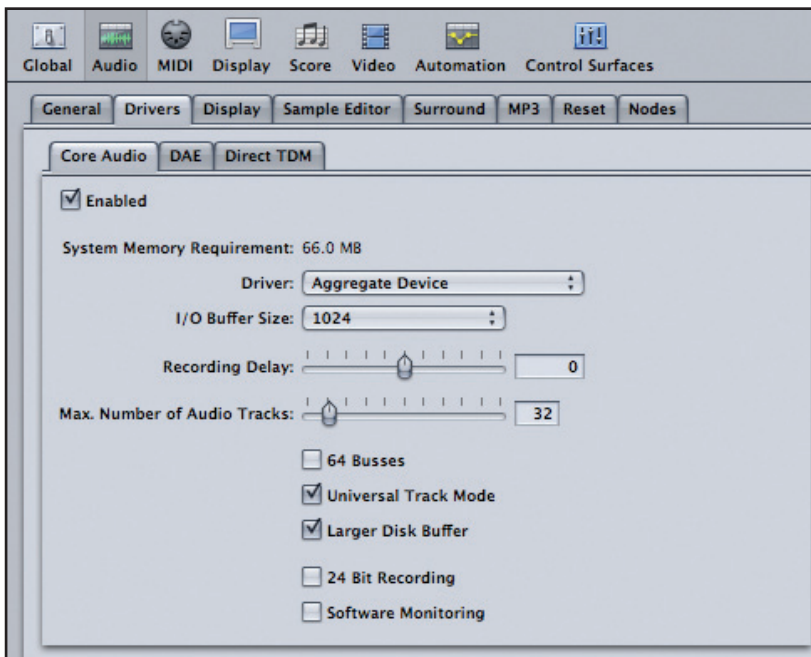
3. You will now see a list of attached sound cards. Press the "+" button to create a new aggregate device

4. Select the connected Saffire PRO devices from the list below and press "Done"





Example setups for Ableton Live and Logic PRO are shown below. The setup in the DAW may vary slightly depending on the DAW you are using. Normally, these configuration options can be accessed from the preferences menu, where you select your DAW audio driver and device. You simply need to select the "Aggregate device" as your new sound card.

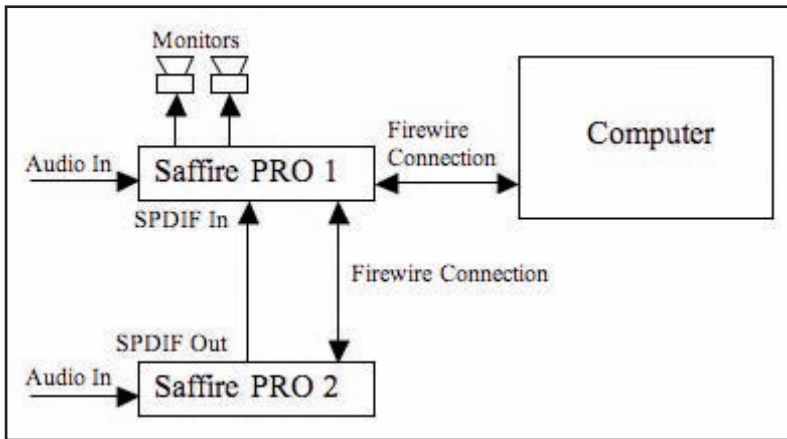


You will now have access to all your inputs and outputs for both Saffire PRO units in your DAW software.



## Latency-free Monitoring with Multiple Units

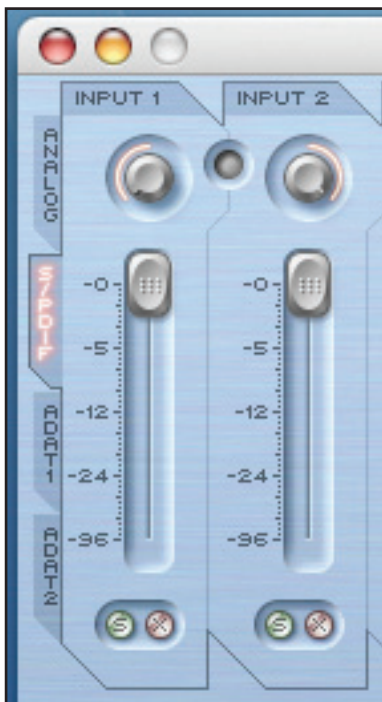
Although it is not possible to create a single monitor mix from multiple Saffire PROs solely using the Firewire connections (as the Saffire range's latency-free monitoring is achieved by internal routing), there are other ways to create the same effect. One possible solution is detailed below:



If you create the desired monitor mix for the channels on the Saffire PRO not connected to your speakers (which shall be referred to as Saffire PRO 2), you can route this mix to the S/PDIF outputs (9/10), making sure that outputs 9/10 are only monitoring the input mix, as shown below:



You can then connect the S/PDIF output on Saffire PRO 2 to the S/PDIF input on the Saffire PRO connected to your speakers (referred to as Saffire PRO 1), and monitor the signal using the S/PDIF tab and first two faders in the Input Mix section of SaffireControl PRO (whilst Saffire PRO 1 is selected for control):



Having created half of your monitor mix on Saffire PRO 2 and sent it to Saffire PRO 1, you can then create the second half of your monitor mix on Saffire PRO 1 and route the whole thing to your monitors. As it is possible to switch between units easily in SaffireControl PRO, it is simple to make adjustments to both halves of the monitor mix, as shown below:



The only downside is that you must use 2 channels of S/PDIF to achieve this. However, if you need all 4 channels of S/PDIF, you can always achieve this using analogue or ADAT inputs/outputs instead. It is only described in this way as the S/PDIF inputs/outputs are more likely to be available than the analogue and ADAT inputs/outputs.

PC Users: Before using multiple Saffire PROs simultaneously, please download and read the Saffire PRO 26 User Guide Addendum, with particular reference to the section entitled 'How to use multiple units with a PC'.

