Subject: Paris tips with latency / adat / digital connections etc
Posted by Dimitrios on Tue, 15 Jul 2008 08:20:24 GMT
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Hi,
As some of you (including me) are using except for the Paris ins extra outboard AD connected to Paris adat card or spdif I would like to share the following...

There is a time difference by using analog Paris ins and digital input at the same time.

I measured some devices I have agains Paris inputs.

ISA 220 connected to Scope creamware using adat connectionand then back to Paris ADAT gives me a 22 samples latency (Paris input considered as 0 )

DBX 376 gives me 29 samples
DBX 386 gives 30 samples.

ADA8000 behringer connected directly to Paris adat card (no creamware in beetween) gives 24 samples latency.

Now the whole point for any of you is the following.

If you are using such devices and you want a time alligned recording (Very essential when recording multi microphone setups like drums) then you ought yourself to get Faderworks.
Well faderworks is needed by any means for all Paris users.

Now you can measure your outboard device for latency as follows:
take two outputs from your external preamp.
One analog output and connect it to Paris analog in and the digital output (spdif or ADAT) and connect this to the same eds card's submix as your analog input.
Record something like one,two,three,four and loop this.
While looping make sure the two audio tracks can cancel (well not at all but the closest that can be done) by using the sample latency delay from Voxengo or Faderworks or other latency plugin and slowly move the knob to like over 10 samples and so.
Around 20-30 samples I am sure you will find the "almost" cancellation occuring (don't forget to flip phase on one track !).
You will need to change volume on one track also to match for volume recording differences.

Then you keep data like this.

If you have Behringer ADA8000 then by using adat card there is a 24 sample latency already measured for you !

Now when you record a multiple mic setup you can compensate by using faderworks for this latencies to have a time alligned recording !!
Believe me the recording which is time alligned will sound exceptional when done so.

ALSO important when using faderworks make a preset with your cards ( I have a 5 card preset ) where you put the eds cards time differences already alligned in beetween the cards just by using faderworks and have the latency on on all paris audio tracks.

So first submix needs no faderworks latency input.
Second submix tracks need a 14 samples being put.
Third 16 samples, fourth 18, fifyh 20 etc...
You can check that by using same methoid as above only easier.
Just put the same recorded audio tracks on separate submixes, flip the phsae of one and put a latency plugin to check on FIRST submix (this comes earlier than all other submixes ) 14 samples or maybe 15 or 16 , depends on your system !
Then every after submix it will be two samples added.
My system has 0,16,18,20,22 (cards 1-5).

You need to allign all your submixes because all other DAWS have this by default ! and because this way you can insure that you can record to multiple eds cards and spread across time snsitive tracks.

Even when mixing and you wanna use more eds resources especially with Mike's great new additiions (Thanks Mike !!) then you can move your overheads to submix 2 or 3 and don't care about the latency difference in beetween these cards because you have taken care of it already !

I can send my default preset ( 5 cards ) and if this works for you then you will gain all the time needed to load on all paris tracks faderworks ( OK this is for faderworks users only !) and allign for the latency differences.

Thats for now...
Regards,
Dimitrios