How to Sync Transport Between DAWs in a SoundGrid Studio System

One of the advantages of the SoundGrid Studio System is the ability to run multiple host computers with different DAWs on the same network, and to route audio between them using as little as one SoundGrid I/O.

This guide explains how to sync the transport between two different DAWs running on two computers connected to the same SoundGrid I/O. We will focus on a few popular scenarios involving Pro Tools, Logic and Ableton Live. The instructions below are specific to Mac, but similar steps apply to PC.

1. Create a SoundGrid network by connecting to your SoundGrid interface.

In this example, DiGiGrid IOS is the audio interface.



2. Set up a SoundGrid network on the master computer:

(a) Open the SoundGrid Studio application on the computer you want to designate as master. On the Setup page, under RACK B – SOFTWARE I/O DEVICES, click ADD DEVICE, and assign the SoundGrid driver of the other (slave) computer. To learn more about assigning drivers, consult the <u>SoundGrid Studio user guide</u>.



(b) Open Audio MIDI Setup in HD > Applications > Utilities.

(c) View the MIDI Studio by going to the Window menu and selecting Show MIDI Studio:

Window	Help	
Show A	udio Devices	業1
Show N	IIDI Studio	Ж2
Show N	letwork Device Browser	Ж3
Close		жW
Minimiz Zoom	8	ЖM
Bring A	II to Front	

(d) Double-click on the Waves SoundGrid Network Driver:



(e) Do the following on the MIDI Network Setup page:

- Top Left: Create a new session by pressing + (plus) and selecting the new session in the checkbox.
- Top Right: Check "Enabled" to enable the session.
- Bottom Left: Under "Who may connect to me," choose "Anyone."

My Sessions	Session				
Session 1	?	C Enabled	Port:	5004	
	Local name:	Session 1 rafaelg-yos			
	Bonjour name:				
+ -		Name		Latency adj.	
Directory	Participants:				
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	Live -				
Who may connect to me:	routings			_ ← 🧐	
Anyone					

3. Open your DAW of choice on the master computer:

Pro Tools (a) Go to Setup > Session. In the upper right corner, change Session Start to 01:00:00:00. Verify the Time Code Rate you want to use (30 for audio only, 29.97 for NTSC video, etc.).

Format				
Sample Rate:	88.2 kHz	Audio Format: BWF (.WAV)	Session Start:	01:00:00:00
Bit Depth:	24 Bit	Interleaved:	Session Length:	24:00:00:00
Clock Source:	HD OMNI #1 -> Internal	¥	Incoming Time:	
System Delay:	0 samples		Timecode Rate:	30 👻
Pan Depth:	-3.0 dB		Feet+Frames Rate:	24 *
			Timecode 2 Rate:	30 🔻

- (b) Go to Setup > Peripherals.
 - Change the MTC Reader port to ANY. Set the MTC Generator port to "Network, Session 1" (or to whatever name you gave the session).



- Logic (a) Go to Project Settings > Synchronization > General tab. (b) Set Sync Mode to "Internal." (c) Uncheck "Auto Enable External Sync." (d) In the Frame Rate drop-down menu, verify the Time Code Rate you want to
- use (30 for audio only, 29.97 for NTSC video, etc.). (e) Set bar position (1 1 1 1) to SMPTE
- 01:00:00:00. This ensures that Bar 1 is synced in both DAWs.

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3eneral	Synchronizatio	Metronom	e Recording	L Tuning	Audio	MIDI	Score	Movie	Assets				
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	Sync Mode:	Internal											
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Ableton Live

- (a) Go to the Preferences > MIDI Sync tab.
- (b) Set Remote to On.
- (c) In the Frame Rate drop-down menu,
- verify the Time Code Rate you want to use (30 for audio only, 29.97 for NTSC video, etc.).
- (d) Set bar position (1 1 1 1) to SMPTE 01:00:00:00. This ensures that Bar 1 is synced in both DAWs.

	Control Surface	Input	Output
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R.	4 None	▼ None ▼	None Dump
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or	Takeover Mode	None	
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nses	MTC Start Offset		01:00:00:00
tenance	▷ Input: Command	8 (Port 1)	On Off Off
	▷ Input: Command	8 (Port 2)	On Off Off
	▷ Input: Waves So	undGrid (SG Device I/O)	On Off Off
	▷ Input: Waves So	undGrid (StudioRack)	On Off Off
	D Output: Network (S	Session 1)	
	Output: Command	8 (Port 1)	
	> Output: Command	8 (Port 2)	
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	D Output: waves So	unagina (SG Device I/O)	
	Output: Waves So	undGrid (StudioRack)	

Pro Tools	Logic	Ableton Live
(c) Select Gen MTC in the transport bar.	(f) In the MIDI tab:	
	Check "Transmit MTC."	
	Select "Network Session1" from the	
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Pre-roll 1 0 000 Start 1 1 000 Post-roll 1 0 000 End 1 1 000 Fade-in 0:00.250 Length 0 0 000		
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Other Displays Clip Waveforms	Transmit MTC All	
Automation	MIDI Machine Control (MMC) Transmit MMC	
Track Number	Listen to MMC Input MIDI Sync Preferences	
Main Counter		
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	iab, make sure that Audio Sync Mode	
	Set to External of Free next to	
	Core Audio.	
	General Audio MIDI Unitor	
	Current Syne Status -10% 30.00 +10%	
	MIC: 1p6 -10% 44100 +10% Sample Rate Hz	
	-40 0 +40 Deviation: ms	
	Audio Sync Mode	
	· ·	

4. Set up a SoundGrid network on the slave computer:

(a) In the computer you want to designate as slave, open Audio MIDI Setup in HD > Applications > Utilities.
(b) View the MIDI Studio by going to the Window menu and selecting Show MIDI Studio.
(c) Double-click on the Waves SoundGrid Network Driver.



(d) On the MIDI Network Setup page, in the Directory window, choose the master computer and press Connect.



5. Open your DAW of choice on the slave computer:

Pro Tools (a) Go to Setup > Session. In the upper right corner, change Session Start to 01:00:00:00, or the same time set in the master computer.

Sample Rate:	88.2 kHz	Audio Format:	BWF (.WAV)	Session Start:	01:00:00:00
Bit Depth:	24 Bit	Interleaved:		Session Length:	24:00:00:00
Clock Source:	HD OMNI #1 -> Int	ternal	-	Incoming Time:	()
system Delay:	0 samples			Timecode Rate:	30 -
Pan Depth:	-3.0 dB	*		Feet+Frames Rate:	24 -
				Timecode 2 Rate:	30 -
YNC Setup &	Timecode Offsets	0			

- (b) Go to Setup > Peripherals.
 - Change the MTC Reader port to "Network, Session 1" (or to whatever name you gave the session). Set the MTC Generator port to "None."

	C Reader And Generator MTC Re MTC Gene d Synchronization Device	ader Port: Network, S rator Port: none	ession 1	* *		
Avi	MTC Re MTC Gene d Synchronization Device	ader Port: Network, S rator Port: none	ession 1	*		
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Avi	d Synchronization Device					
C						
	Enable SYNC HD					
	VITC Insertion Enabled	LTC Output	t Level:		-	
	Pitch Memory Enabled	VITC Rea	d Lines:		¥.	
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		Bi-Phase/Tach	Wiring:		The second se	
	Bi-Phas	e/Tach Pulses/Frame	2-254):			
				Reset BI-Phase		
	Enable Dub Window					
	Vertical Position:	*	Size:		¥	
	Horizontal Position:	*	Color:			

LOYIC	
a) Go to Project Settings >	(a) E
Synchronization > General tab.	S
b) Set Sync Mode to MTC.	(b) S
c) Check "Auto Enable External Sync."	(c) S
d) In the Frame Rate drop-down menu,	(d) lı
choose the same frame rate you set in	n
the master DAW.	t

(e) Set bar position (1 1 1 1) to SMPTE 01:00:00:00. This ensures that Bar 1 is synced in both DAWs.



a) Expand the Network you are using to sync.

Ableton Live

- (b) Select "Sync On."
- (c) Select MTC as Sync type.
- (d) In the MTC Frame Rate drop-down menu, choose the same frame rate that you set in the master DAW.
- (e) In MTC Start Offset, select the same option as in the master DAW.
- (f) Set bar position (1 1 1 1) to SMPTE 01:00:00:00. This ensures that Bar 1 is synced in both DAWs.

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2	None		None	None		G
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5	None	•	None	None	19	D
6	None	•	None	None		
	Take	over Mode	None			
١.		MIDI	Ports	Track	Sync	Ren
	Input	Network (Se	ssion 1)	Off	On	0
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	MIC S	an Onser			1:001:00	1
Þ	Input:	Command8	(Port 1)	On	Off	0
D	Input:	Command8	(Port 2)	On	Off	0
⊳	Input:	Waves Sour	ndGrid (SG Device I/O)	On	Off	C
Þ	Input:	Waves Sour	ndGrid (StudioRack)	On	Off	C
D	Output	Network (Se	ssion 1)	Off	Off	0
D	Output	Command8	(Port 1)	Off	Off	0
Þ	Output	Command8	(Port 2)	Off	Off	0
Þ	Output	Command8	(Port 3)	Off	Off	0
P	Output	Waves Sour	dGrid (SG Device I/O)	Off	Off	0
	Output	Waves Sour	dGrid (StudioRack)	Off	Off	0

Waveforms Automation **Expanded Sends** Track Number

Transpor Main Counter Counters

► ✓ MIDI Controls

✓ Expanded

Synchronization Output Meters



(g) Older versions of Logic: In the Audio tab, make sure that Audio Sync Mode is set to "External/Free" next to Core Audio.

Ceneral Synchronization	some Recording Tuning Audio	MIDI Score Movie Assets	
Current Sync Status	General	Audio MIDI Unitor	
		30.00	+10% fps
-10% Sample Rate:			+10% Hz
-40 Deviation:			
Audio Sync Mode			
Core Audio: External	or Free		

	Non-second second se	1 MIDI	2 MIDI	3 A.
CATEGORIES	Name			-
Sounds	D WaveShell-VST 9.6	-	-	-
Drums	D WaveShell-VST 9.7			-
/ Instruments	ЕМрТу250			
Audio Effects	Kontakt 5			
MIDI Effects	Hentakt 5 8out		-	-
Max for Live	Kontakt 5 16out		-	-
Plug-ins	VC 2A		-	
Clips	2 VC 76			-
Samples	🕮 VC 160			
ACES Packs User Library Current Project ref waves Add Folder				

In all slave DAWs: Make sure that the slave DAW has the same sample rate as the master DAW. In Pro Tools, set this when you create the session. In Logic, set this in File > Project Settings > Audio. In Ableton Live, set this in the Preferences window.

You should now be able to press play in the master DAW and have the slave DAW in sync.

Please note: To allow proper sync, it is always a good idea to allow for a bar or two before your audio/sequence actually starts. If your audio starts immediately, you may experience some glitches/hiccups at the beginning.