

0. REVISION HISTORY

16.10.2015	V.1.0	– First release
29.10.2015	V.2.0	– Second release, added diagramms & blitz equipment

1. AUDIO REQUIREMENTS

PA	Main theatre PA 2 subwoofers per side Surround system 2 NEXO PS-15 or equivelant for use as back speakers (see diagram) 4 NEXO PS-10 or equivelant on stage for actors (exact position to be specified)
Main console	Venue's mixer
Microphones	8 x wireless headsets (7 wireless headsets are used, one for each actor, plus 1 spare)

2. ROUTING

The 6 audio channels needed are:

- 2 channels for the stereo main speakers
- 2 channels for the stereo back (on-stage) speakers
- 2 channels for the stereo surround speakers

- The stereo main speakers should be at the front left and right of the stage.
- The back (on-stage) speakers should be placed at the back left and right of the stage and as high as possible (but without losing eye contact with the back rows of seats).
- Surround speakers should be at the left and right sides and back of the audience seats.

(see diagramm section for speaker placement)

Sound card connections:

Input:

- The 7 channels from the headsets must be grouped on 1 mono bus and sent to sound card line input 1 for processing (gain on sound card input should be set at 12 o'clock)

Outputs:

- Sound card outputs 1-2 should be routed to the main (front) left-right speakers.
 - Sound card outputs 3-4 should be routed to the back (on-stage) left-right speakers.
 - Sound card output 5 is the combined processed microphone out and should be routed to the main (front) left-right speakers (it is given as a separate out so real-time gain riding of the voices can be performed if needed during the performance).
 - Sound card outputs 7-8 should be routed to the surround left-right speakers
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- All sound card outs should be plugged into the house mixer at equal gain and levels before being sent to the amps/speakers.
 - All speakers (main, back and surround) should play at equal levels.
 - the subwoofers should be driven equally from sound card outputs 1-2, 3-4 and 7-8.
 - All microphones should be mixed to have equal volume for each actor's voice before being sent to the sound card input.

[a good way to set the correct level of the combined mic signal sent to the sound card is is this:

first set the levels of sound card outputs 1-2, 3-4 and 7-8 to a good level for the theatre.

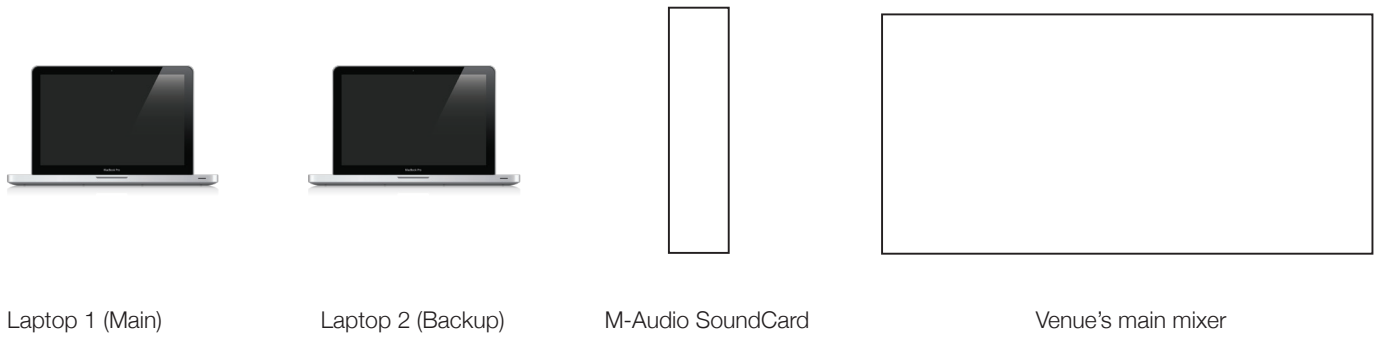
Then, with the bus sending to sound card input 1 all the way down, set the mic return from the sound card (channel 5) at equal gain/level as the other sound card outputs, then gradually raise the level of the group sending to the sound card input until a good voice level is achieved]

in case the theatre has no surround speakers installation, sound card outputs 7-8 should be routed to the the main (front) left-right speakers.

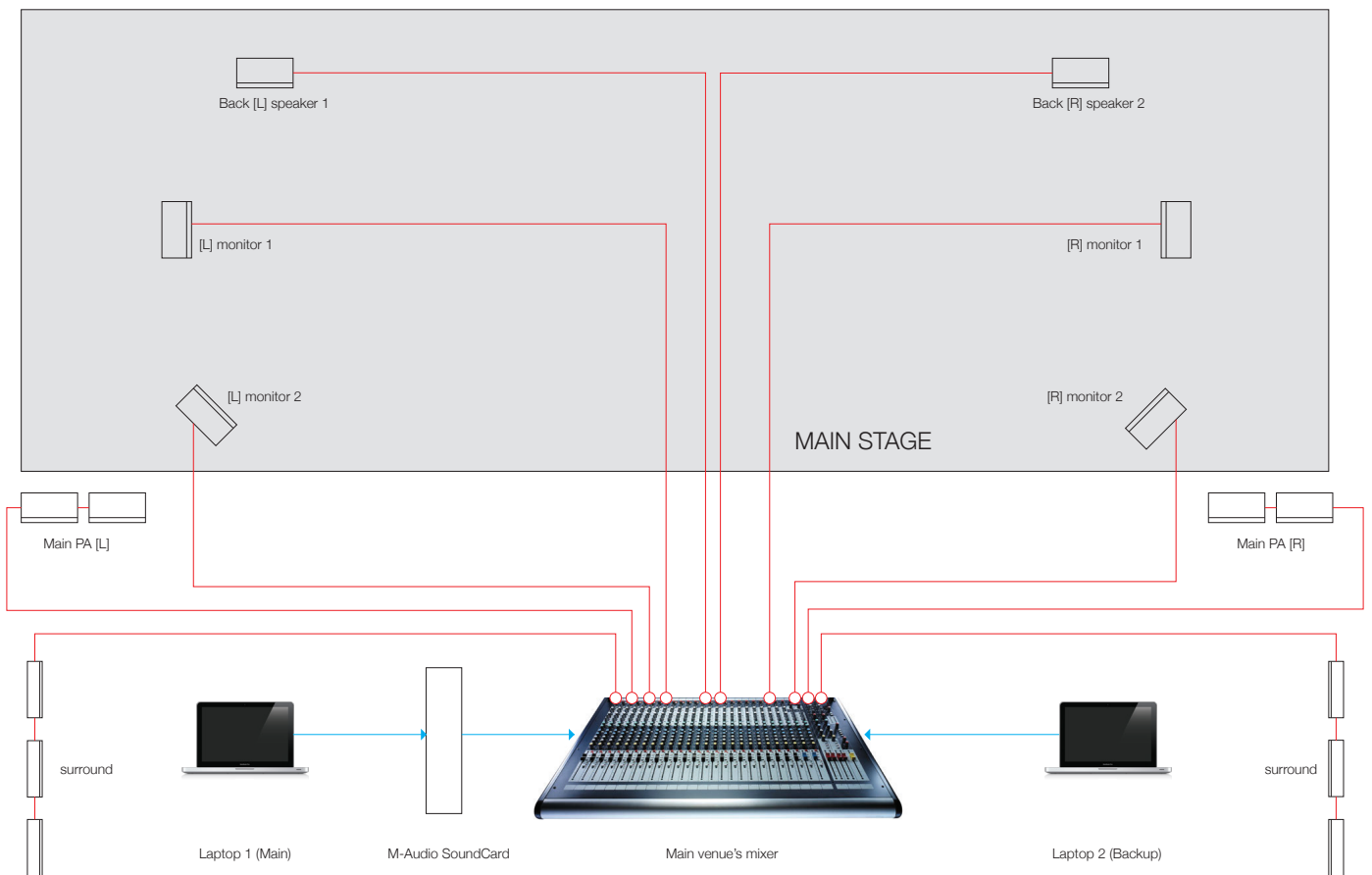
3. BACKUP:

A second computer is also connected and running that will play in case of main computer/sound card failure. It plays through its built-in sound card and routed to the main speakers. In this situation, the mono microphone group (that is routed to sound card input 1) should also be routed directly to the main speakers.

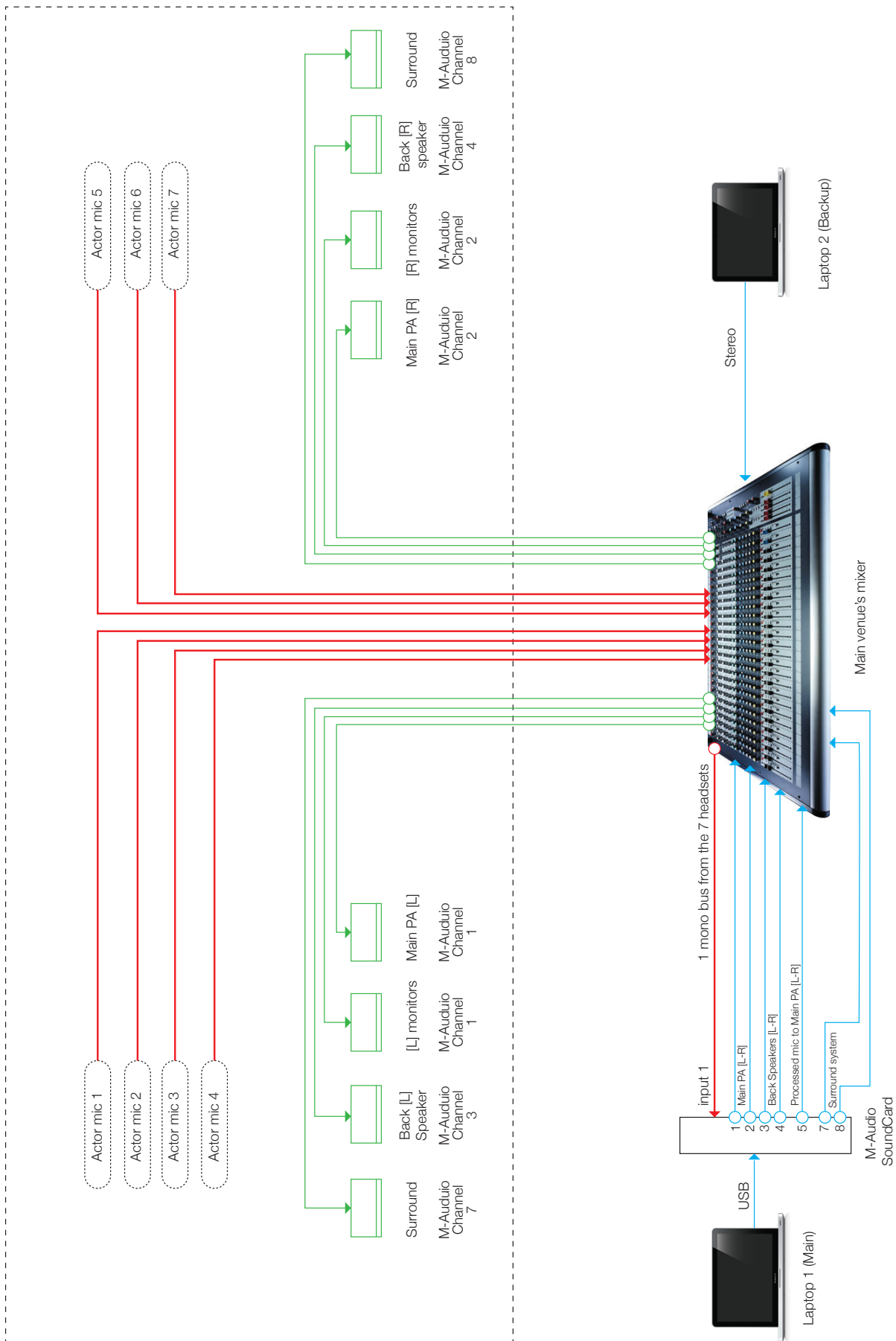
4. DIAGRAMMS:

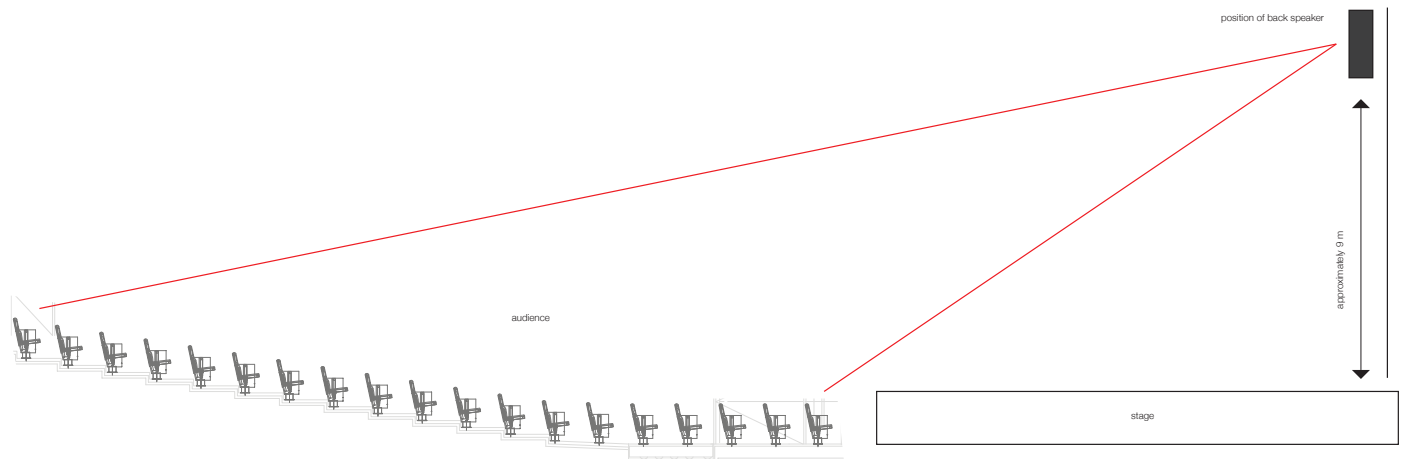


FoH set up



Speakers setup





Back speakers setup & height adjustment

5. BLITZ THEATRE GROUP'S EQUIPMENT:

2 x macbook pro laptops running ableton live 8
1 x M-Audio 8 channel sound card