

Margaret H'Doubler Performance Space
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Turning On and Off the Sound/Video System

Turning On the System:

Step One: Turn on the power strip at the bottom of the rack under the counter.
The switch is marked with orange tape.

Step Two: Turn on the amplifiers, the lowest unit in the rack under the counter.
The switch is marked with orange tape.

IMPORTANT: The power to the amplifiers should be turned ON LAST.

Turning Off the System:

Step One: Turn off the amplifiers, the lowest unit in the rack under the counter.
The switch is marked with orange tape.

Step Two: Turn off the power strip at the bottom of the rack under the counter.
The switch is marked with orange tape.

DO NOT turn off the power to individual devices in the racks.
DO NOT turn off the mixer or phantom power.

IMPORTANT: The power to the amplifiers should be turned OFF FIRST.

Notes About the Powering Up the System

When operational, six green LEDs will be lit on the amplifier.
If no sound, 1st thing, check for green LEDs.

The auxiliary equipment and the mixer are powered from the strip at the bottom of the rack. However, some of the devices in the upper rack like the CD player need to be turned on separately. (They do not automatically come on when the power is turned on.) The mixer, intercom system and devices in the lower rack, except the amplifiers are on when the power is on.

Power for the Computer and Video Projector

The power to the Macintosh G3 is separate from the other parts of the system.

Press the *Power On* button to start up the Macintosh.
Choose the *Shut Down* command from the *Special* menu to turn off the Mac.
The monitor power comes from the rack and goes off when the rack is turned off.

The Video Projector and TV are turned on individually.

Press the Pink power button once to turn the projector on.
(located under the clear cover at the top of the projector)

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Using the Computer and Video Projector continued...

The video projector also has a red main power switch located on its right side. This is often left on, but may be turned off. If nothing happens when you press the pink button, check and turn on the main power. Wait a second or two and then press the pink button.

The Video projector takes a minute to warm up. However, its fan should start to run immediately if you have turned it on correctly.

Press the Pink power button twice to turn the projector off.

The first time you press the power button, the projector will project a "Power Off?" message. The second time the lamp will turn off. The fan will continue to run until the projector is cool. (you should be able to see that the lamp is no longer on by looking through the grille in the back of the projector or into the lens in the front.)

The TV is connected to the VCR and can be used to preview tapes when the projector is covered.

The TV has its own power switch. When it is first turned on, you'll need to set the channel to 04 to match the output of the VCR. A small pencil is useful as the 0 button is broken.

The TV power comes from the rack. So, turning off the rack will turn off the TV as well.

Checking the Power

- You should see lights on all the devices in the rack under the counter.
 - Six green LEDs will be lit on the amplifier.
 - Occasionally the amp will overheat and shut down some channels.
 - If this happens, turn it off, let it cool and try again.
 - There are Indicator lights on the 355 EQs, 422 AGC and the Midiverb.
 - Make Sure that all units are on and if not, turn them on.

- Pushing one of the mute or solo buttons on the mixer should show a red indicator light.
 - If not, turn on the mixer. The switch is in the back by the inputs.
 - Phantom power should be on too.

- The CD Player has a red standby light that is on when it is standing by.
 - The light will be off when the unit is on and the display will light up.

CD Playback

Step By Step Instructions

Step One: Turn On Power (see Turning On the System)

Step Two: Turn on the CD Player. (The red Standby light means that it is standing by, not on.)

Step Three: Use the Open/Close button to insert the CD.

Step Four: Push the Play/Pause Button (probably twice quickly at first)
to put the player in PAUSE || mode.

Step Five: Select the track desired using either the number or track advance buttons.

Step Six: Set the volume on the CD Player faders on the mixer to U.
You can adjust the volume up or down as needed.

Step Seven: Press the Play/Pause button to start/stop the CD Track.

No Sound??

- Check that the power is on. (see Checking the Power)
- Check the main volume slider in the lower right corner of the mixer.
It should be set at U.
- Check that the CD player is playing. The counter should be moving.
If not you have an unreadable CD, either badly burned or severely scratched.
- Check that the CD faders are not muted. A red LED means the channel is muted (off).
Also be sure that the faders are up to U.

IMPORTANT: Follow the instructions for turning off the system when you are finished.

CD Player Operating Notes

The CD player takes a few seconds to acquire a track. That is why it is important to set it to pause mode before selecting a track. You can tell pause mode by the double bar || indicator on the display. When a track is cued this way, it will play immediately when you hit the Play/Pause button.

Cassette Playback

Step By Step Instructions

Step One: Turn On Power (see Turning On the System)

Step Two: Turn on the Cassette Deck.

Step Three: Put your tape in the deck with the side you wish to play facing towards you.

Step Six: Set the volume on the Cassette Deck faders on the mixer to U.

You can adjust the volume up or down as needed as your tape plays.

Step Seven: Press the Play >> button.

No Sound??

- Check that the power is on. (see Checking the Power)
- Check the main volume slider in the lower right corner of the mixer.
It should be set at U.
- Check that the tape is moving.
- Check that the Cassette faders are not muted. A red LED means the channel is muted (off).
Also be sure that the faders are up to U.

IMPORTANT: Follow the instructions for turning off the system when you are finished.

Cassette Deck Operating Notes

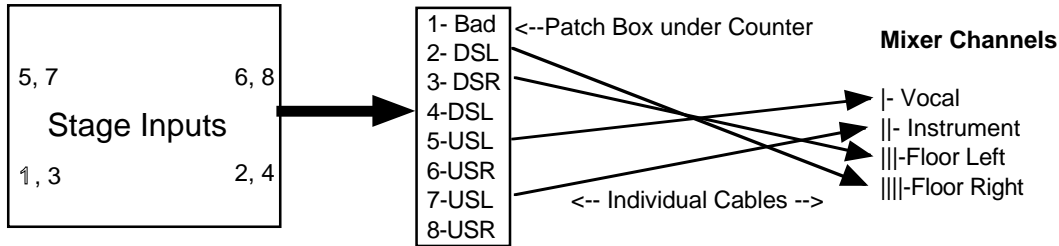
Cassette tapes should be recorded so that the volume is full but not clipping. Most decks have meters that allow you to do this. (Commercial tapes are properly recorded.) When a tape is recorded with the volume set too low, it may not play back loud enough on this system. You can increase the volume of the faders on the mixer to the highest setting. If this is not loud enough, then the best solution is to get a properly recorded tape. DO NOT make other adjustments to volume settings in the system to try to compensate for a poorly recorded tape. If you absolutely must, you can increase the trim control on the Cassette Deck channels. This will mostly result in more noise being added to the sound but is a possible temporary solution. If you increase the trim control, be sure to restore it to slightly above the U position when you are finished with the bad tape.

The Cassette deck is bi-directional. This means you can play either side of the tape depending on which play button you push. To play the side that faces forward, use the button that points to the right.

Using a Microphone

General Information About Using a Microphone

Microphones are plugged in at the stage and are patched to the board in the Sound Booth. There are 7 working lines running from the stage to the booth. These end under the counter in the sound booth. There are four mic cables, marked with bands of tape, that run from this patch box into the mixer. The board has pre-labeled channels assigned to these lines.



Step By Step Instructions

Step One: Turn On Power (see Turning On the System)

Step Two: Plug the Microphone in at the stage and remember the outlet number.

Step Three: Locate the number corresponding to the mic at the patch bay under the counter.

Step Four: Decide which fader on the mixer you will use to control the microphone.

Step Five: Plug the cable leading to that fader into the appropriate outlet in the patch box.

Step Six: Test the microphone by carefully increasing the volume of the fader.

Step Seven: Adjust the input trim for the sound source.

If you're not sure about this, start with the trim in the 12 o'clock position.

You want the highest trim without feedback or clipping.

To prevent feedback, adjust the trim so that the mic just starts to feedback when the fader is all the way up.

Then, back the trim off just a little.

To check for clipping, push the solo button for the fader.

As long as the meter stays out of the red, you're OK.

IMPORTANT: Follow the instructions for turning off the system when you are finished.

No Sound??

-- Check that the power is on. (see Checking the Power)

-- Check the main volume slider in the lower right corner of the mixer.

It should be set at U.

-- Check that the fader is not muted. A red LED means the channel is muted (off).

Video Projection

General Information About the Video System

The video system is used in different configurations. Unlike the CD player, the video system is not always set up to walk in, turn it on and show a video. There are two main projection surfaces in the theatre, the high quality roll down glass bead screen and the cyclorama at the rear of the stage. There are several possible image sources, a regular VHS VCR, DVD player, a DV camera and a computer. There are also two projectors which may be focused for different surfaces. However, in general, is often possible to project a VHS tape on the back wall using the large Sanyo projector with little difficulty.

Step By Step Instructions

Step One: Turn On Power (see Turning On the System)

Step Two: Turn on the Video Projector by pushing the Pink button under the clear cover at the top rear of the projector. (see Power for the Computer and Video Projector for more complete information.)

Step Three: Turn on the VCR.

Step Four: Check the video switch box and be sure that the VHS VCR is selected.

Step Five: Set the VCR fader of the sound mixer to U. You can adjust the volume using this fader as your tape plays.

Step Six: Insert your tape and press Play on the VCR.

DO NOT adjust the projector without informing the theatre director. It may be configured for a show and doing so could cause problems unless it is checked and reset properly before the performance.

IMPORTANT: Follow the instructions for turning off the system, especially the video projector, when you are finished.

Notes About Projecting Video

Most often, the Panasonic (upper, smaller) projector is configured for the roll down screen and the Sanyo (larger, lower) projector is set up for the back of the stage. **Never alter the setup of any projector without informing the technical director and receiving permission.**

Extreme care needs to be exercised in lowering the roll down screen. There is a danger of severe injury if this is not done properly. Persons wishing to operate the screen should receive instruction and permission prior to attempting to lower it.

Both projectors have two lenses, either of which may be installed at a given time. It takes a skilled technician some time to switch the lenses. These lenses are changed for specific uses when a show is set up. **Never alter the setup of any projector without informing the technical director and receiving permission.**

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Notes About Projecting Video continued...

The Sanyo 9000 is adjusted by using the controls under the clear plastic cover at the rear of the projector or by using its remote. The Panasonic projector may be adjusted by using its remote. **DO NOT** adjust the projector without informing the theatre director. It may be configured for a show and doing so could cause problems unless it is checked and reset properly before the performance.

Common Adjustments

To change the size of the image: (It is useful to use a blue screen to see the size of the image)

Press the Menu button on the projector (under the clear cover at the top rear).

Use the Right Arrow button to move to the Setting menu.

When the Setting menu is highlighted, press the Select button.

Use the Down Arrow to highlight Blue Background.

Press the Select Button. (this should toggle the background on and off)

Use the zoom +/- buttons to resize the image.

You may also need to use the lens shift buttons to move the image up and down.

When you are finished, repeat the above to turn off the blue background.

Pressing the Menu button again makes the menu disappear.

Focusing the Projector.

It is best to have a sharp image to use to focus the projector.

If you don't have a sharp image to use to focus, you can turn on the display to project the word "Focus" as you are making the adjustment.

Press the Menu button on the projector (under the clear cover at the top rear).

Use the Right Arrow button to move to the Setting menu.

When the Setting menu is highlighted, press the Select button.

Use the Down Arrow to highlight Display.

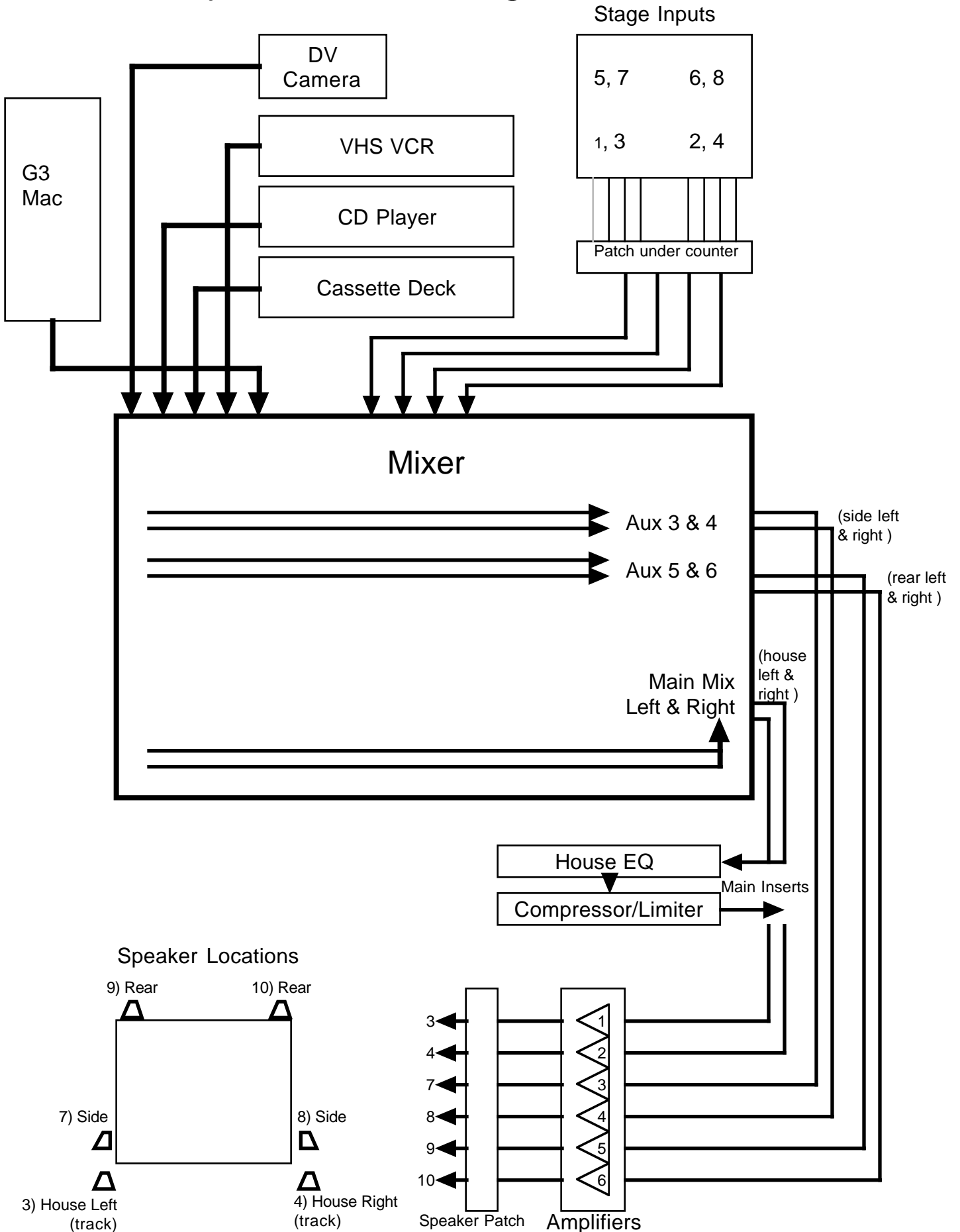
Press the Select Button. (this should toggle the display on and off)

Use the Focus +/- buttons to adjust the image.

When you are finished, repeat the above to turn off the display.

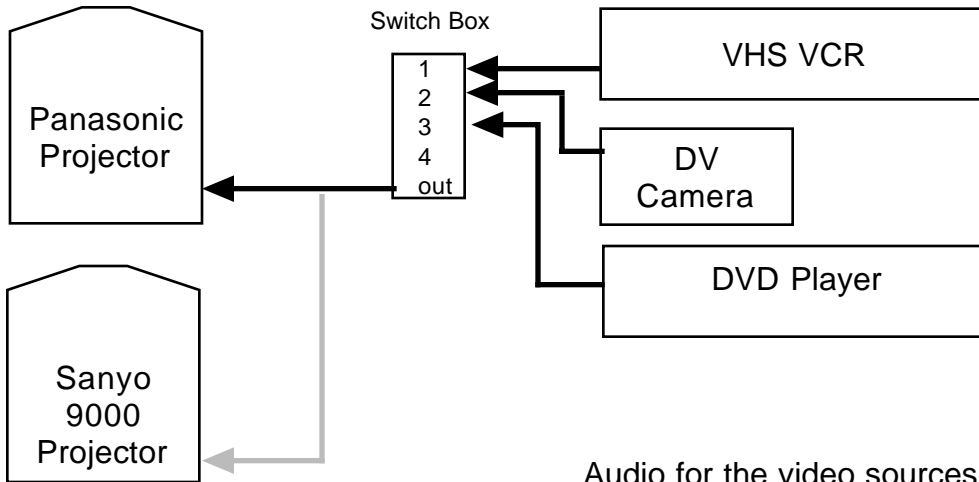
Pressing the Menu button again makes the menu disappear.

Sound System Block Diagram



Video System Diagram

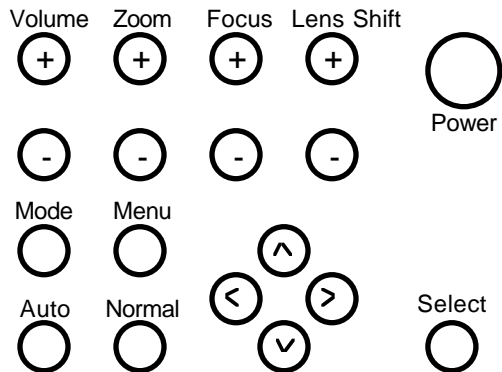
Normal Switched Input Configuration



Either projector may be connected depending on current use

Audio for the video sources runs directly to the sound board:
 DV camera=channels 1 & 2
 VHS VCR = channel 7
 DVD Player = channels 16 & 17

Sanyo 9000 Controls



EQ Settings

Rack Settings: EQ, Amps, Insert Hookup

EQ 1 Left (floor mic anti-feedback)

20	25	31.5	40	50	63	80	100	125	160	200	250	315	400	500	630	800	1k	1.25	1.6	2k	2.5	3.15	4k	5k	6.3	8k	10	12.5	16	20	
0	0	0	0	0	-0.5	-1	-0.5	0	0	0	-2	-4	-3.5	-2	-0.5	-1.5	-2	-3	0	0	0	-4	0	0	0	0	0	0	0	0	0

EQ 1 Right (floor mic anti-feedback)

20	25	31.5	40	50	63	80	100	125	160	200	250	315	400	500	630	800	1k	1.25	1.6	2k	2.5	3.15	4k	5k	6.3	8k	10	12.5	16	20	
0	0	0	0	0	-0.5	-1	-0.5	0	0	0	-2	-4	-3.5	-2	-0.5	-1.5	-2	-3	0	0	0	-4	0	0	0	0	0	0	0	0	0

EQ 2 Left

20	25	31.5	40	50	63	80	100	125	160	200	250	315	400	500	630	800	1k	1.25	1.6	2k	2.5	3.15	4k	5k	6.3	8k	10	12.5	16	20	

EQ 2 Right

20	25	31.5	40	50	63	80	100	125	160	200	250	315	400	500	630	800	1k	1.25	1.6	2k	2.5	3.15	4k	5k	6.3	8k	10	12.5	16	20	

EQ 3 House Left

20	25	31.5	40	50	63	80	100	125	160	200	250	315	400	500	630	800	1k	1.25	1.6	2k	2.5	3.15	4k	5k	6.3	8k	10	12.5	16	20
-4	-3.5	-3	-2.5	-2	-2	-1.5	-1	-1	-0.5	0	0	-2.5	-2	0	0	-1	-1.5	-2	0	0	0	-2.5	0	0	0	0	-1.5	-2.5	-3.5	-4

EQ 3 House Right

20	25	31.5	40	50	63	80	100	125	160	200	250	315	400	500	630	800	1k	1.25	1.6	2k	2.5	3.15	4k	5k	6.3	8k	10	12.5	16	20
-4	-3.5	-3	-2.5	-2	-2	-1.5	-1	-1	-0.5	0	0	-2.5	-2	0	0	-1	-1.5	-2	0	0	0	-2.5	0	0	0	0	-1.5	-2.5	-3.5	-4

EQ 1 Left	Range +12	HP 40	LP 20k	Level +4
EQ 1 Right	Range +12	HP 40	LP 20k	Level +4
EQ 2 Left	Range +12	HP 40	LP 20k	Level 0
EQ 2 Right	Range +12	HP 40	LP 20k	Level 0
EQ 3 Left	Range +12	HP 40	LP 20k	Level 0
EQ 3 Right	Range +12	HP 40	LP 20k	Level 0

AGC/Leveler	
Threshold	1 tick past 12pm
Ratio	12pm
Target	12pm
Peak Limit	-5

Amplifier Gain Settings	
1 ----	6
2 ----	6
3 ----	4
4 ----	4
5 ----	7
6 ----	7

Insert Snake #1 (orange stripe)				
	out	in	rack	mixer
White	wh	bk	EQ 1 Left	channel
Red	rd	gy	EQ 1 Left	channel
Blue	bl	gr	Midiverb left	sub mix 1
Orange	or	yl	Midiverb Right	sub mix 2
Insert Snake #2 (plain)				
	out	in		
White	wh	bk	EQ/422 Left	main left
Red	rd	gy	EQ/422 Left	main right
Blue	bl	gr	EQ 2 Left	sub mix 3
Orange	or	yl	EQ 2 Right	sub mix 4