

Pro Audio FAQs

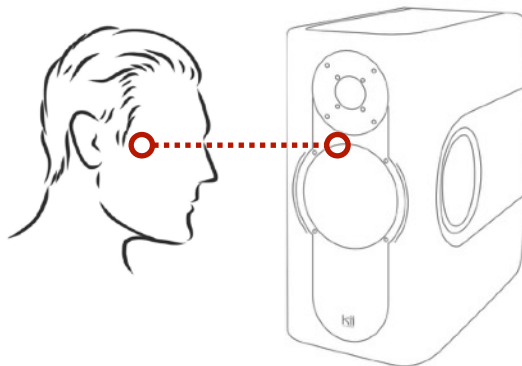
A few tips & tricks to set up the Kii THREEs in the studio

1. Place the Kii THREEs on solid and sturdy stands

Acoustically solid speaker stands are denitely preferable to placing them on a meterbridge or desk platforms.
If the surface they are resting on isn't extremely solid, try to use decoupling devices like IsoAcoustics feet, Iso-Stands, DMSD or even EVP.

2. Speaker height (acoustical centre)

The center point between tweeter and midrange should be at ear height.



3. Do not place a speaker directly next to the Kiis.

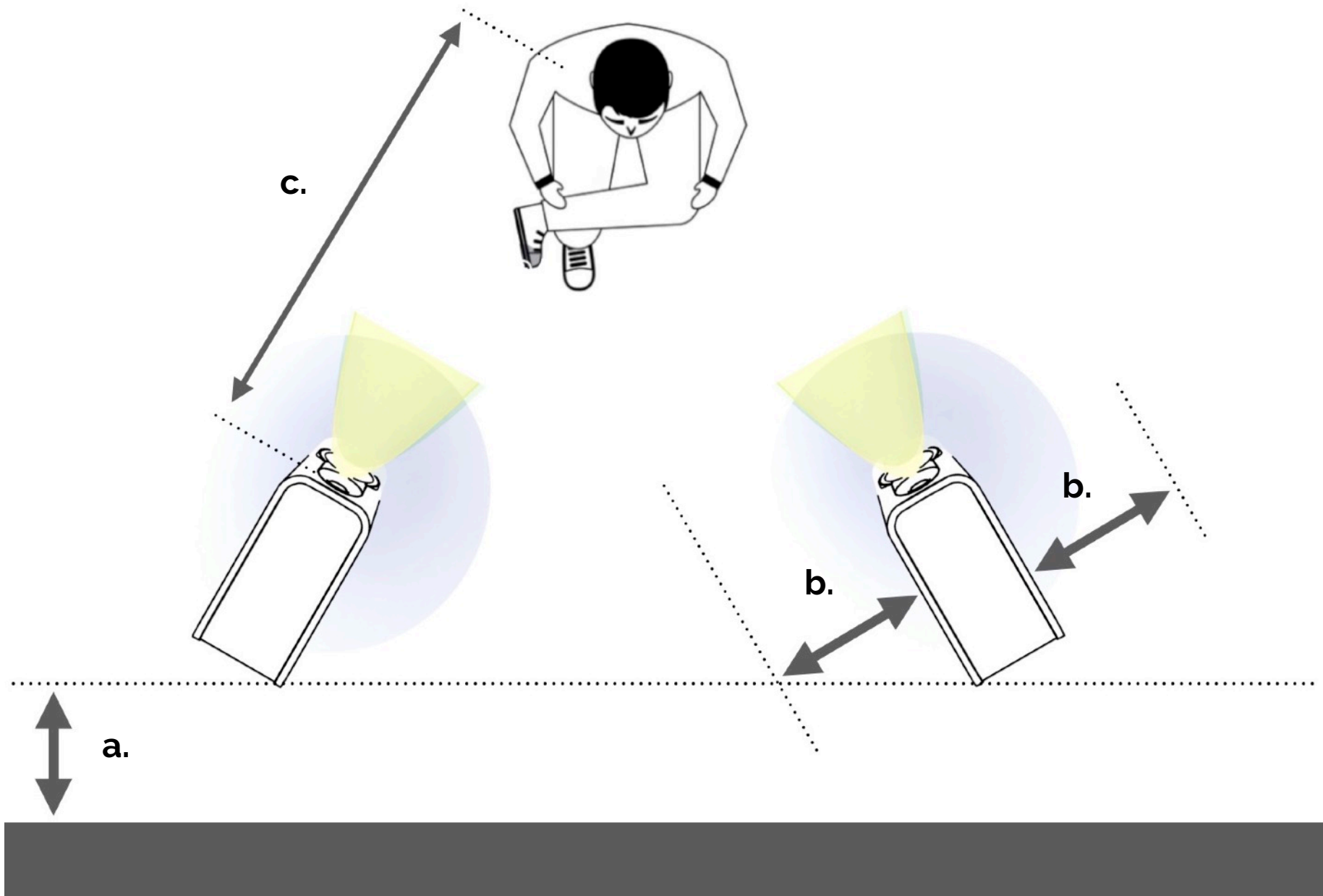
The airflow around the speakers has to be unobtrused for the cardioid dispersion to work correctly.



4. Speaker distances

- a. The minimum clearance between the rear woofers and the front wall is approx. **10cm (3,5 inches)**.
- b. The minimum clearance from the side woofers to any massive object nearby should be at least **30cm (12 inches)** or more.
- c. It is preferred to have a listening distance of at least **120cm (48 inches)** or more to the Kii THREEs.

There is not really a maximum listening distance or room size, the center image is still stable even above 5m distance in an equilateral triangle.



- IMPORTANT NOTE -

As soon as the Kii Control is connected, the settings on the backpanel of the speakers will be overruled.

All settings can be controlled from within the menu on the Kii Control, the backpanel can be left in its default position.

NEVER connect a Kii THREE to a home network and NEVER connect a Kii THREE to the Ethernet port of a computer!

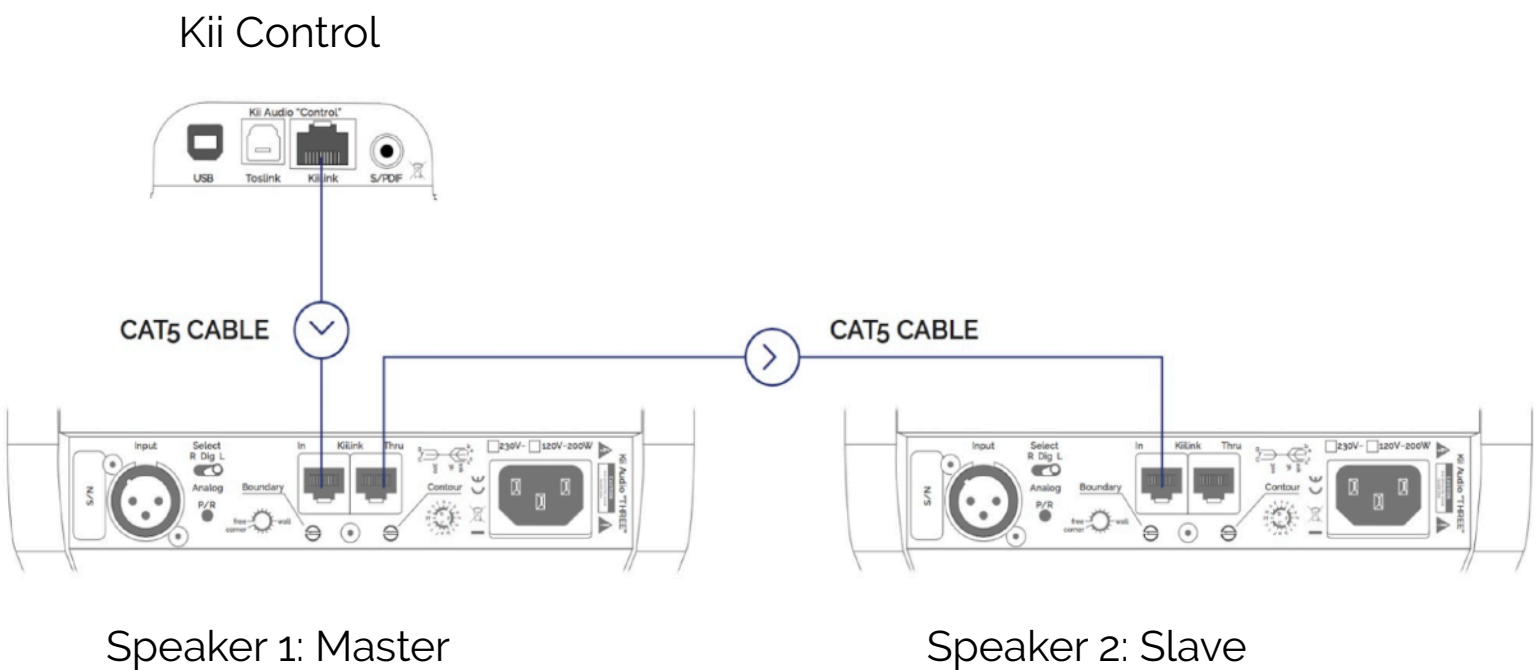
KiiLink is NOT a standard network connection !!

5. KiiLink CAT cable connections:

Step 1: MAINS: Connect the supplied mains cable to the IEC connector on the backpanel of the Kii THREE and to your mains socket

Step 2: KiiLink cable (CAT5 or CAT6) between **Kii Control** and the **KiiLink In** port of your master speaker.

Step 3: KiiLink cable (CAT5 or CAT6) between **KiiLink Thru** port of your master speaker and the **KiiLink In** port of your slave speaker.



6. Where to put them in the room?

Regular speakers of the cabinet size of a Kii THREE are usually used in a nearfield setup, but DO NOT let their size fool you!

With the Kii THREE you are free to position the speakers closer to your room corners / front wall.
And set them further apart in more of a classic **midfield setup** as often used in bigger studios or mastering rooms.

The highly reduced acoustic interaction with the room because of the cardioid dispersion allows for far more flexibility in terms of speaker positioning.

Please try out different setups, nearfield to midfield in your room for yourself and you will be surprised.

It's especially worthwhile to test how they sound with minimum distance of the rear woofers against your front wall

In this case the impulse response will be extremely tight and approach that of a flush (soffit) mount system.
(Again: Minimum distance 10cm (3,5 inch) => Boundary EQ should be set to -6)

What is a "DSP speaker system" ?

The Kii THREE is a DSP based speaker system with a high resolution internal volume control and integrated input switching. Next to volume and source switching, all menu settings can also be operated from the Kii Control.

The Kii THREE System is both: a high end speaker and monitor controller in one

The digital inputs (AES, SPDIF, Toslink, USB Audio) are fed directly into the DSP.

The analog inputs (XLR on the speaker) employ a high-end A/D converter and then are also fed into the DSP.

The DSP controls the volume and calculates all necessary lter coecients (crossover, cardioid dispersion control, calibrated frequency response, coherent phase response in exact mode, etc). From there the DSP utilises 6 DACs to feed every individual driver it's unique signal.

Analog or digital inputs?

Short answer: Use the DIGITAL INPUTS (USB/SPDIF/Toslink/AES) whenever possible. This is the most direct signal path and avoids an unnecessary extra D/A -> A/D conversion step.

Slightly longer answer: If you are using no other audio interface, the USB input on the Kii Control will perfectly work as your audio interface + monitor controller!

However most people will use a **third party audio interface** for all the I/O in your studio (*such as e.g. MetricHalo, RME, UA Apollo, Apogee, Lynx etc.*) - so the best option is to use a **digital output** from this **audio interface** as your monitoring source.

This can be a S/PDIF or Toslink (not ADAT!) output, connected to the Kii Control, or an AES/EBU output connected to the master speaker's XLR. (*Don't forget to switch the XLR input to "digital" in the setup menu*)

A QUICK STORY: "You always want to monitor exactly what you capture!"

In today's world of DAW based audio production the work you deliver to your clients will be a digital file.

This is your end product in its nal state by which your work will judged. It doesn't matter if you work fully ITB with plugins only, if you use outboard on analog inserts, if you use analog summing, an analog mixbus chain or even a vintage console going back into the computer through your A/D.

In 98% of all cases the final result will be a digital downmix, recorded onto a print track or rendered via an offline bounce.

This is true even for the people who are still able to work on analog tape, the final print delivered to the label will most likely be again a digital file.

You want to be able to hear and evaluate your final results as exact as possible with your monitoring system.

You want to avoid any uncessary extra D/A <-> A/D conversion steps in your monitoring chain.

Therefore = USE THE DIGITAL INPUTS ! - "You always want to monitor exactly what you capture!"

Why do you have analog inputs then?

The analog inputs utilise high end, clean A/D conversion. You can absolutely use these when an analog monitor output is your ONLY option. Also if you are working on an analog console with a tape machine, the analog inputs will work perfectly as the A/D conversion is super transparent.

When fast workflow on an analog console is the most important thing, yes ...use the analog inputs!

Adjust the volume level on the Kii Control in tandem with the volume knob of your monitor section for usable gain staging in practice.

Should I use my analog monitor controller?

Even when you already own an analog monitor controller in the top league (*e.g. Grace mg05, Cranesong Avocet II, Funk MTX, Dangerous Monitor St, etc*) the **full integration** of the monitor control features into the speaker DSP will be **more transparent**.

Especially because you can fully stay in the digital domain avoiding any extra D/A - A/D conversion.

Can I use my analog monitor controller?

Yes you absolutely can, but once you hear the difference you will want to use the Kii Control, no doubt.

Using both digital and analog inputs to A/B:

When combining ITB mixing with either analog summing or even just using an analog D/A - A/D loop to insert analog compressors and EQ on your master bus the analog inputs can also be used to monitor your 2-bus processing before your A/D converter.

This enables you to A/B compare the end of your analog proceSSION chain and the final signal you capture in your DAW (*post limiting for example*) simply by switching inputs on the Kii Control.

This feature is usually only available from high end mastering consoles and can be a great help for mixing/mastering setups.