

hardware review

Isoslice cuts vibration and enhances the sound

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Isoslice The Block & Turntable isolation platforms

I met Isoslice owner Paul Mallyon at the UK Audio show in London last year, where he was exhibiting his Isoslice platforms. He had small pads for loudspeakers and a larger one for turntables. He explained that, as a professional musician and composer, and recording engineer of some 25 years he started building and fine-tuning turntables, finding that the surface they were placed on had a profound effect on sound quality.

After experimenting with layers of different materials, he built speaker supports which he found cleaned up the sound, revealing more details in records and tracks that he had produced. The development process to find the ideal construction was carried out by ear and trial and error. His first product was the turntable support, followed by the smaller speaker support known as the Block.

I mentioned that I had worked on improving speaker stands while working for Epos, when owned by Mike Creek years back, and gained measurable and audible improvements by damping the stand. Speakers by their very nature generate a lot of vibration and this is transmitted to any surface or structure with which they are in contact.

This would be OK, apart from resonances, which magnify some frequencies more than others. The modified and coloured vibrations are bounced back into the speaker cabinet, which re-radiate them as a layer of background clutter, which blurs and mars the sound. It was quite easy to hear the harmful effects of a stand, simply by placing one's ear on the top of a speaker (blocking the other ear) and listening to the ringing coming back up from the stand into the speakers when subjected to the highly (un) scientific 'knuckle test'. An accelerometer and test equipment can tell you what the frequencies and intensities are, but only the ear can reveal how nasty they can sound.

Of course, the stand (or floorstanding speaker) can also push vibrations into the floor. Depending on its construction, the floor can modify, bounce back and re-radiate vibrations itself. If you could stop vibrations being transferred from the speaker into the stand in the first place, you could prevent them becoming coloured by resonances and being transmitted back upwards into the speakers, or downwards into the floor.

Most users rely on Blu-tack to mount their speakers. This couples them to the stands quite effectively, having little or no decoupling value in thin layers. Blu-tack does not provide much, if any, vibration isolation benefit but has greater damping abilities than spikes.



The Isoslice platforms comprise multiple layers of different wood-based materials, including a central layer of plywood, with stiff foam in between. The turntable platform has four adjustable corner feet which screw into threaded fixings and soft under pads. The turntable platform also has a large spirit level at centre front, which is a handy feature. The speaker pads need no such feet of course. They are all very nicely finished, black painted top and bottom, with Isoslice engraved in the top and the plywood centre standing out in natural finish. They looked rather smart in use.

As he had done all his development work subjectively, I wondered what objective benefits there might be, particularly as they were quite light and stiff, with no sprung or obvious compliant decoupling, (apart from the soft under-pads of the turntable platform). So, I placed one of the Block speaker pads, (measuring 23x10x6.5cm), on the top of a similarly-sized speaker. I measured the vibrations on the top of the speaker using an accelerometer and Clio analyser, then repeated this with the pad between the speaker and the accelerometer. This showed a dramatic reduction in vibration transmitted from speaker to accelerometer of around 25dB in the midrange – which is a lot. The reduction is much lower towards lower frequencies. So in other words mid-frequency vibrations were transmitted much less effectively than lows, which are attenuated less strongly.





Of course measurements are one thing. They don't necessarily relate directly to sound quality. So I conducted listening sessions with a couple of compact loudspeakers on some old Epos stands. One pair of stands had been designed with constrained - layer damping, plus internal foam to damp and control ringing, the other pair had no damping and so rang quite notably when struck.

Sound quality

The Blocks were just the right size for the top of the damped stands and so were the Proac DB2 speakers so I started with these, comparing the sound with and without the pads. Streaming Lang Lang in Paris from the Silent Angel Munich via Qobuz, it was immediately obvious that his piano sounded clearer, richer in tone and was more clearly placed in the acoustics of the hall. Arpeggios were more fluid and the individual notes better differentiated. Indeed it sounded just that bit more like a real piano. I tried this on the un-damped stand as well, with the very similar comparative results.

Lang Lang's piano seemed more alive, dynamic and real. Indeed, it was the track which most obviously benefited from the Isoslice pads. This was not a tonal effect (due to extra energy or added coloration, but actually the reverse, more detail due to less clutter, and a qualitative musical effect). His playing became more delightfully expressive, in sensitivity and drama. Changing the musical genre somewhat to Pink Floyd's High Hopes from *The Division Bell*, the sound was more open, bass lines better defined and treble cleaner. Reverting to mounting the speakers directly on the stands without the Isoslice, the bass seemed to lack some drive, becoming sluggish, and overall the music was less vital.

Likewise, playing *The Romance of the Telescope* (live) by OMD the sound of the audience became more convincing, vocals clearer and sense of space more real. Bass was firmer with the Isoslice pads. I repeated these tracks on both stands with a pair of Kudos Cardea Super 10A loudspeakers, with essentially the same comparative results. These Isoslice Block pads really do make a difference. Of course, in practice, any differences in sound quality will depend on the stands and speakers used. However, there did not seem to be any downsides to their effect. I also tried the pads with and without Blu-tack, and got essentially the same results.

The sonic improvements must have been due to a reduction in vibration transmitted from the speaker into the stand and back again, reducing background clutter, thus allowing the speakers to perform closer to their full capabilities. In other words, listeners should hear more of the speakers and less of the stands. The better the speakers and the less good the stands, the more likely there is to be a benefit. So, my simple acceleration measurements really did seem to tally with the subjective outcome, which was nice/

As a matter of note, although these pads were not blocking low frequencies, bass sounded equally powerful with or without the pads. So far as I could tell, bass delivery was improved in

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clarity and definition with the pads in situ and the benefits were virtually the same when I added Blu-tack to locate the pads and speakers.

Are there any drawbacks?

I don't think there's any circumstance, where the sound would likely be worse with the pads, although if the stands are exceptionally good, the benefit might be smaller, or, on flimsier



shelves or cabinets, larger. Each situation will be different of course but in my experience, they worked very well.

Turntable platform

Moving onto the larger platform, designed for turntables, I was intrigued to discover whether this would have the same sorts of benefits. Initially I held off trying this platform with my Avid Sequel SP turntable because it is designed to absorb vibration from the record, and sprung to isolate it from external disturbance. So how could it benefit such a turntable? Well there was only one way to find out and I was in for a shock. There were obvious improvements gained by placing the Sequel SP on the platform – and they were similar to the benefits found for the speaker pads.

First on the platter was Wilhelm Kempff with the Berlin Philharmonic Orchestra playing Beethoven's *Piano Concerto No. 2*. In this recording the piano is set quite distantly, but with the Isoslice platform the piano was brought forward just touch and the surrounding acoustic setting was more clearly presented. Also, Wilhelm's playing seemed that little bit more expressive and musically satisfying. Strings were sweeter, and the overall sound fuller. Removing the platform, the piano sounded slightly recessed by comparison. These were not massive differences, but enough to find me preferring to listen with the Isoslice.

Playing Budo from Miles Davis' *Birth of the Cool* with the Isoslice was just that touch more realistic compared to without. With it, Miles's trumpet sounded more natural with its harmonic overtones – likewise the saxophone with its richer, reedy tonality. This mono track seemed more alive, with rhythms more apparent and the performance more whole. As with the Kempff piece, it was also subtly more satisfying on a musical level with the Isoslice.

Playing Paul McCartney's title track and Jet from his iconic album *Band on the Run*, with and without the Isoslice, revealed similar kinds of differences. With it, his vocals were a touch more forward in the mix, with clearer reverb around it. For instance, on Jet, I could more readily hear the flutter layered into the reverb behind his voice. Bass delivery was just as powerful, but

firmer and better paced. Guitars sounded lovely and cymbals clearer. The rich, fat, multi-tracked horn intro to Jet was even more earthy and powerful. There's no loss of bass with the Isoslice – indeed, it seemed just as powerful and, if anything, brisker, with rhythms better defined, mirroring my findings with other tracks. Without the Isoslice, the sound was more languid, less propulsive. Paul's vocals shifted slightly further back in the mix, which some people might prefer. These differences were not so dramatic as with the Block speaker pads, but, I felt that the improved detail, drive and clarity were worthwhile and welcome benefits.

With turntables, it's easy to assume it's all about filtering out external vibration, but, just as with speakers vibrating stands, there are vibrations traveling downwards, into the turntable structure, in this case, from the record. So, in reality, the paths of vibration are complex.

I repeated these musical excerpts with a standard Linn Majik turntable, fitted with a Linn Adikt moving magnet cartridge, revealing rather less dramatic benefits. However, matters improved once I fitted my Ortofon Cadenza Red, when its extra resolution revealed more of the benefits of the turntable support.

My usual turntable position, as used for this review, is on a relatively ordinary piece of furniture – not an audiophile rack, as this would simply not suit the domestic layout. Likewise, not everybody has a special rack for their turntable, so this is quite relevant. There are various turntable design philosophies, from high to low mass; some with sprung suspension, others with hard, firm, or soft absorbent feet. Many have very little in the way of vibration isolation, which might benefit more. In practice, the benefits of the Isoslice support are likely to depend on the design and resolving power of the turntable, arm and cartridge and where they are placed. It's worth bearing in mind that all components benefit from isolation and it's very likely that the turntable platform will bring improvements to electronics. Components with quartz crystal clocks in them, eg DACs and streamers, are known to perform better when given a degree of freedom from external vibration and the Isoslice certainly provides that.

Isoslice verdict

My conclusion is that both these Isoslice platforms really do work and are well worth trying under almost any component, results will vary from one situation to another but most equipment benefits from a reduction in vibration. Considering that both designs can help bring out the best intrinsic qualities in supported equipment, the prices seem very reasonable and makes them good value for money in my book.

