

### hardware review

# Acoustic alchemy with Pearl Sibelius

Friday, April 28, 2023 Jason Kennedy



# **Pearl Acoustics Sibelius Ioudspeaker**

The Pearl Sibelius is a rather different loudspeaker to the run of the mill, and in more ways than one. What you notice is that there's only one drive unit, what's less obvious is that the cabinet is made of solid oak and that it has quarter wave loading. The latter is uncommon in itself in a world where most manufacturers use reflex loading, a few stick with sealed boxes and a handful employ transmission line cabinets. Another even less obvious difference is that Pearl make just the one model and don't intend to upgrade or replace it with a MkII or an SE, at any point. They call the Sibelius an endgame loudspeaker.

There are variants on the Pearl Sibelius but these are only cosmetic, the drive unit comes in two anodised finishes and the cabinet can be stained to produce a range of colour options. It's a mercifully straightforward approach in a world where we are overwhelmed by choice. The single drive unit is a Mark Audio full range design with an aluminium cone that Pearl's founder and designer Harley Lovegrove has custom made. There aren't many drive units like this around, the most famous on these shores was created by Ted Jordan way back in the day but its descendants can be seen on a smattering of today's loudspeakers. Mark Audio drivers are made in Hong Kong under the auspices of brand founder Mark Fenlon, they make a range of full range drivers that vary in size from 50mm to 120mm.

The driver on the Pearl Sibelius has an chassis diameter of 160mm and cone that's close to 100mm but the main point here is that frequency range is claimed to be 38Hz to 20kHz -6dB. That's very wide range for a single driver even given that the extremes can be 6dB quieter (half as loud) than output at its highest. Given that no loudspeaker produces a flat response that's pretty impressive. More important is that as Kii Audio point out the majority of instrumental and vocal output is between 200 Hz and 700 Hz, an area where a driver like this is more than capable of delivering the goods.

### **Pearl Acoustics Sibelius**

A multi driver design will give more extension and power at frequency extremes but if it's passive, as most are, it will be compromised by the presence of a crossover that's required to split the signal. The great advantage of a single driver is that there is no crossover and thus it's possible to produce a signal that is truly in phase, which is why full range designs are generally better at timing than their multi-way cousins.

The Pearl Sibelius is made in Belgium out of 30mm thick European oak, you can see as much by looking at the sides of the vent, this is heavy and dense stuff the like of which I haven't



seen in several decades of of lugging speakers around. Not many brands use solid wood, Sonus faber and few other Italian brands alongside Coppice Audio come to mind but only Pearl and the latter use actual slabs of the stuff. This is because MDF is cheaper, much easier to machine and can be finished in veneer to give a real wood look. It is also more stable, solid wood needs to be a certain age before it stops expanding and contracting with temperature and humidity (Pearl make the point that they need to be "kept in suitable conditions, where temperature levels are relatively stable, and humidity does not fall below 40% or exceed 60%".

The advantage of a 30mm thick oak cabinet is that it's tremendously rigid and unlikely to be excited by the energy coming from a single drive unit. Wood has a self damping quality and solid wood isn't uniform in like MDF so it will break up vibration more effectively. Finally of course solid wood looks fantastic and oak in particular has a very attractive grain, and naturally no two will look exactly the same.



## **Pearl Acoustics Sibelius**





Although Lovegrove's name is not one I had come across before he has clearly been immersed in audio lore for many years, you can tell as much from the videos he posts under the company name on Youtube. These include interviews with audio luminaries as well as roundups of product types, I was heartened to see him selecting the Rega Planar 10 as the best turntable in his selection of record players. He also makes classical recordings for the Naxos label among others so clearly knows his onions.

The Pearl Sibelius sits on a metal base with spike feet on small outriggers, apparently the speaker used to be bolted to this base but now it stands on thin rubber feet that stop it sliding. The cable terminals are almost as high as the drivers on the back of the box and the base includes an upstand that helps keep cables tidy.

#### **Matching the Pearl Sibelius**

The Pearl Sibelius has a fairly average 87dB sensitivity allied to an unusually specific 7.2 Ohm impedance, critically however the impedance doesn't dip below 5 Ohms which makes this loudspeaker relatively easy to drive and more valve friendly than it might otherwise appear. I didn't get a particularly good result with my usual 150W power amplifier so asked the company what amps they had found to be well suited. They mentioned Pass Labs and Rega Aethos then said that they are developing valve and solid state amplifiers of their own. This encouraged me to try the Tom Evans Linear A 25W valve power amp that I enjoyed so much but which struggled to drive the impedance dips of my usual speakers.

The Pearl Sibelius worked a treat with the Linear A, the transparency of the amplifier came through loud and clear and allowed the loudspeaker to deliver a challenging piece of piano music in an unusually approachable way. The Pearl Sibelius is very good at untangling complexities that multi-driver speakers struggle with, its phase coherence allowing each and every note to be expressed and resolved to highly musical effect. Even though this is not a powerful amplifier the pairing delivered plenty of energy with Rymden's Pitter Patter, where drums, bass and keyboard play at high tempo and the musicians bounce off one another to raise the dynamic roof. The Pearl Sibelius delivered this along with the body and weight of the instruments whilst placing them in a large scale image.

The bass was surprisingly strong and extended with the Linear A, that quarter wave loading clearly provides some assistance in this department but doesn't slow the timing as can be the case with large bass drivers. But it's the mid and top that sweep you away, here there is a rightness that doesn't necessarily sound like a flat response but does make the music gel in such a fashion that you just want to keep listening. I love the way that it can deliver hard sounding instruments like saxophone and trumpet without getting aggressive, if you listen to a lot of jazz this will be a major bonus as it's an area where so many traditional speakers struggle.

In fact acoustic music is very much the Pearl Sibelius's forte, it doesn't surprise me that Harley Lovegrove makes classical recordings, he has voiced this loudspeaker so that they give

# **Pearl Acoustics Sibelius**

an accurate rendition of such material. Electronic sounds work well too but the Pearl Sibelius lacks the emphasis that ported designs bring to the bass, this is not strictly accurate but does add some juice to the bottom end and makes synth and other instruments sound nicer. The Pearl Sibelius has been designed for more linear low end which means that acoustic bass sounds more natural and even. There is always a compromise in loudspeaker design and Pearl have chosen one that will suit listeners who find the average ported design a bit too colourful, and/or those that need to place speakers closer to a wall. The solidity of the cabinet and front vent combine to make this suitable for near wall siting, in my room at least.

#### **Pearl Sibelius verdict**

If you love acoustic music then the Pearl Sibelius will be very much your cup of tea, it is capable of extremely natural sounding and fluid results that time so well that you will be pinned to your seat. It works well with decently recorded non acoustic music as well but put it with a Class A amplifier and drop Keith Jarrett improvising in Cologne in 1976 and you have a recipe for spiritual enlightenment that is very hard to achieve with many loudspeakers of this size and price.



#### **Specifications**

Type: quarter wave loaded 1-way floorstanding loudspeaker

Crossover frequency: N/A

Drive unit: custom Mark Audio 100mm metal cone full range

Nominal frequency response: -6dB 36 - 20,000 Hz

Nominal impedance: 7.2 Ohm Connectors: binding posts Sensitivity: 87dB @ 1W/1m

Dimensions HxWxD: 1095 x 225 x 295mm

Weight: 23kg

Finishes: medium oak, light oak, weathered oak, wenge, natural oak, dark cherry

Warranty: 10 years

