

# Perlisten A4t

The new A series is the 'entry level' gateway into the world of Perlisten, led by the visually imposing A4t floorstander  
 Review: **Mark Craven** Lab: **Paul Miller**

**A**fter arriving in 2021 with its premium S series [*HFN* Apr '22], US speaker manufacturer Perlisten has subsequently trickled its technology down into more affordable lines, including the comprehensive R series [*HFN* Aug '22]. But perhaps these speakers weren't affordable enough, because the company has returned with a new A series intended to give audiophiles 'a little taste of what Perlisten has to offer'.

The range is currently limited to four options. The A4t reviewed here, at £6000, is joined by a smaller A3t floorstander (£4600), the A3m monitor (£2700) and A2s on-wall/surround speaker (£1950), but there are no partnering A series subwoofers or in-wall variants in the catalogue.

First launched into the Far East market, the decision to bring the A4t to UK dealers is good news for hi-fi enthusiasts seeking a 'value for money' proposition. This floorstander may come from Perlisten's entry-level lineup, but it has the imposing form of the brand's far costlier models. Its cabinet stands nearly 1.3m tall and stretches some 450mm deep, making it essentially as large as the flagship S7t LE [*HFN* May '25]. Additionally, the A4t claims to follow its siblings in delivering high SPLs, a high sensitivity and deep, clean bass, although this model carries none of the THX certifications of its S and R series siblings.

## HOLY TRINITY

Helping to achieve its rated 'typical in-room' low-frequency extension of 28Hz [see PM's Lab Report, p53] is the A4t's trio of 215mm bass drivers. These form part of a two-and-a-half-way configuration, which is a first for Perlisten as its previous floorstanders have been either two-way, three-way or four-way designs. The two uppermost (bass/mid) drivers operate below 1.2kHz, while the lower driver only covers the range below 250Hz. All three of these drivers are reflex-tuned via a

grille-covered front-facing vent in a fashion designed to reduce low frequency phase distortion [see PM's boxout, p51].

## MATERIAL MATTERS

The A4t's two-and-a-half-way strategy helps deliver a speaker at an accessible price point, as does the choice of driver materials. The trio of bass units are carbon fibre types, a less 'exotic' option than the bespoke HPF (Hybrid Pulp Formulation) material of the R series or the TPCD (Thin-Ply Carbon Diaphragm) cones of the S series. Perlisten also uses a new tweeter. All A series models feature domes made from Teteron, a polyester fibre, instead of silk (R series) or beryllium (S series).

This HF unit measures a full 35mm across, sufficient for the unit to work down to the low mid/treble crossover and also to sport a voice coil large enough, and with sufficient power handling, to match the output of those three big cones. The dome's large waveguide also boosts

the treble while controlling its off-axis output. In practice, the A4t's dispersion pattern is similar to that of the DPC (Directivity Pattern Control) arrays of the company's more expensive models.

Unusually, this horn/waveguide overlaps the bass/mid drivers above and below it, although its acoustic centre is in closer alignment with that of the cones than perhaps it looks. That said, the A4t will surely stand out in a lineup of its floorstanding contemporaries. It could never be called svelte, but the same might be levelled against fellow American tower speakers from Klipsch, SVS [*HFN* Jul '24] ⇨

**RIGHT:** Mounted into Perlisten's machined HDF baffle are three 215mm reflex-loaded bass and bass/mid drivers with carbon fibre cones and, standing proud, a 35mm 'Teteron' dome tweeter set into a large alloy waveguide. Cabinet has two alloy outriggers with rubber/spiked feet

'Joan Baez's whistling vocal soared high, free of sibilance'





'The dome's large waveguide boosts treble while controlling its off-axis output'





## DELAY TACTICS

A founding Perlisten principle, though not one it shouts from the rooftops, is its management of low frequency group delay and, by inference, bass phase distortion. There's a body of (subjective) opinion that cites group delay – the frequency-dependent time delay associated with all filters – as a blot on the sound quality landscape, influencing everything from perceived transient attack, musical 'smoothness' and listener fatigue. Linear-phase filters introduce a time delay that is constant with frequency but minimum-phase filters, including a loudspeaker's bass roll-off, have a non-constant time delay – a phase distortion – that modifies the *shape* of complex (multi-frequency) signal waveforms.

Sealed-box designs have low frequency group delay, but this distortion is exacerbated by the higher 4th-order roll-off of reflex-loaded cabinets. Without resorting to active drive, and complex DSP, Perlisten's 'passive' approach means pushing its low frequency tuning, and associated group delay, down to as low a frequency as possible. In the A4t this is achieved with a trio of 215mm bass drivers, mounted very closely to minimise combing, that are 'tuned' to a sub-20Hz [see Lab Report, p53] via a deep, grille-covered channel in the base of the enclosure [see pic, left]. **PM**

HDF enclosure – the baffle leans back slightly while its 50mm thickness provides a firm footing for those four drive units. Outrigger feet, with optional spikes, are easily adjusted for height, and the speaker binding posts (a single set here) are reassuringly chunky.

### **WEIGHT WATCH**

Hitting its brief of giving a taste of the 'Perlisten sound', the A4t couples superb bass weight with a controlled demeanour, never once coming across flustered or ragged at high volumes. Compared to the company's top-line S series speakers, however, this is a softer, more forgiving performer, not only in the treble but in the low bass. Setup in the *HFN* Listening Room [p41 & Yearbook '25] and used with Constellation Revelation 2 and Unico pre/power amps [*HFN* Jan '25 & May '26], the A4t crafted soundscapes that were relaxed and very listenable.


Indeed, those used to a bright-sounding system will notice a lack of top-end brilliance – some reconfiguration of expectations might be required, and on-axis listening is recommended. But it

certainly doesn't take long to become adjusted to this speaker's sound profile, or to notice areas where it still accentuates crisp detail, such as the filigree percussive aspects that punctuate Ozric Tentacles' eerie, bass-rich *Pteranodon* instrumental [Dovetail Records DOVE CD 6].

To make them amenable to everyday listening spaces, not to mention the complex, multichannel demands of home cinemas, the A4t's controlled directivity resulted in a somewhat curtailed soundstage when playing the title track from David Essex's *Rock On* [Columbia; CD res] in the large *HFN* room. However, though this album's wide mix was gently squeezed, the precision and clarity of the stereo picture between the cabinets remained excellent. The tom-tom drums that roll from right to left were resonant and tonally distinct, while the thin wisps of violin and bursts of brass that followed were free of glare. As for the bottom end, this was big, almost lush.

### **RICH REWARDS**

Isaac Hayes' 'Do Your Thing', the lengthy jam from his *Shaft* soundtrack [Concord Music; 192kHz/24-bit], sounded richer still, mellifluous even, and there was plenty of dimensional detail on display, from the depth of the stage that pushed guitar chords and trumpets forward, to the lightly tapped bongos that patrol the right channel. The main drumkit, meanwhile, was locked in the centre, every strike of the snare drum being firm and attacking.

This track is 19 minutes long and heavily improvised, much of it devoted to a wah-wah guitar solo from Michael Toles with 

and Martin Logan [*HFN* Jul '23], so maybe I need to check my European sensibilities.

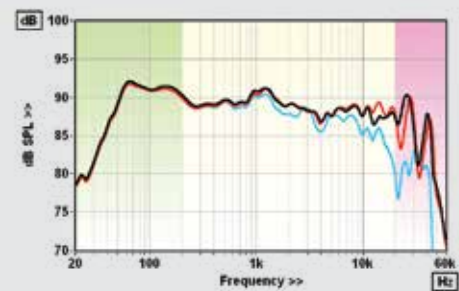
Even if you do raise an eyebrow at that distinctive waveguide arrangement, the fit and finish of the Perlisten A4t should win you over. There's a well-made and robust feel to the internally braced MDF/

## PERLISTEN AUDIO A4T

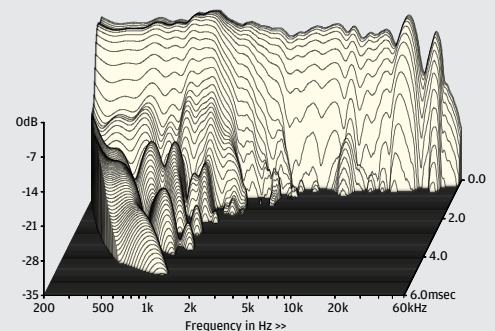
The A4t's high 90.8dB sensitivity is boosted by the generalised 1.5dB uplift from 800-1.5kHz, but this falls to 89.1dB (500Hz-8kHz) – still higher than Perlisten's own 88.6dB specification – as a result of the speakers gently declining mid/treble trend [see Graph 1]. From 1-20kHz the axial output falls by ~3.5dB but the response is largely free of irregularities, as evidenced by the short decay of any modes seen on the CSD waterfall [Graph 2], and the errors of just ±2.3dB. Two 35mm treble dome resonances are visible at 28kHz and 42kHz [pink shaded area, Graph 1]. Pair matching is a very tight 0.4dB up to 10kHz but slackens off thereafter to 2.0dB, but this will not have any significant effect.

More importantly, listen slightly off-axis [blue trace] and the declining mid/treble trend becomes more obvious – a drop of 10dB from 1-20kHz. Even if you are listening bang-on axis, the reflected sound lacks treble, suggesting this big box may still sound a little 'lost' in big rooms or if used too far from side walls. This, of course, may be a deliberate play by Perlisten to improve its 'big box compatibility' in small rooms...

The slot port, meanwhile, is tuned to a very low 15Hz albeit with significant output to 120Hz (-6dB) followed by a series of modes up to 200Hz. The top and middle woofers have an extended bandwidth to 1.3kHz, the lower working below 250Hz, the diffraction-corrected total yielding a 34Hz bass extension (-6dB re. 200Hz). Perlisten rates the A4t as a 4ohm load, and the 3ohm impedance from 100-300Hz certainly reflects this. There's a dip in EPDR to 1.6ohm/77Hz, near a dip in impedance phase, but the toughest 1.2ohm appears at a higher 420Hz. **PM**



ABOVE: Response inc. nearfield summed drivers/port [green], freefield corrected to 1m at 2.83V [yellow], ultrasonic [pink]. L, black; R, red; ±15°, blue



ABOVE: Cabinet and cone resonances are very mild, leaving the tweeter mode exposed but short-lived

**LEFT: Unlike Perlisten's S series speakers the A4t does not have a split crossover – hence the single set of bright plated 4mm cable terminals**

without sounding skewed too much toward the low-end.

The languid, sultry jazz of José James' cover of 'Ain't No Sunshine' from his 2018 album *Lean On Me* [Blue Note; 44.1kHz/24-bit] was right in the speaker's wheelhouse. The fine central imaging framed James' soulful vocals, while delicate brushed drums came through above well-defined bass. Similarly, Joan Baez's stripped-to-the-bone version of 'House Of The Rising Sun', in mono for her eponymous debut [Vanguard Records; 192kHz/24-bit], was a captivating listen via the A4t, her whistling vocal soaring high without sibilance, and acoustic guitar ringing out cleanly.

### LIGHT BITE

You don't, then, need to feed this floorstander a hard-driving, bass-rich diet to appreciate its talents. Shostakovich's Symphony No.1 in F Minor, from the Boston SO for Deutsche Grammophon [96kHz/24-bit], showed the A4t can sound sprightly and light on its feet despite the visual evidence to the contrary. It easily conveyed the fizz of pizzicato strings and the work's staccato melodies, while shifts in both tone and weight were well handled. This was a performance of subtlety and precision... until the thrusting first crescendo of the 'Allegretto' saw orchestral drums conjured with real depth and dynamics. In a word? Tasty. ☺

### HI-FI NEWS VERDICT

While aiming for a lower price point, Perlisten clearly has no desire to change the way it goes about designing its floorstanding loudspeakers – the A4t is once again a weighty yet controlled performer, with a focus on imaging precision and nuance. With the push to affordability, however, comes a softer and arguably more 'crowd-pleasing' sound. Put this on your list if you like to listen long... and loud.

Sound Quality: 87%



an overdriven, fuzzy tone. A more rambunctious loudspeaker would have pushed this through a little more, but such criticism is very much content dependent. The A4t didn't sound anything other than lively and dynamic with the twangy, propulsive country-and-western of Margo Price's 'Don't Let The Bastards Get You Down' [*Hard Headed Woman*, Loma Vista; 96kHz/24-bit].

Ramp up the volume and the A4t maintains its smooth tonal balance. Perlisten says the speaker is 'equally at home' in a cinema setting, and it's easy to imagine it coping well with the often brash and aggressive soundmixes of a Hollywood action flick. It also manages to impress with its bass extension and output

### HI-FI NEWS SPECIFICATIONS

<b>Sensitivity</b> (SPL/1m/2.83V – 1kHz/Mean/IEC)	90.8dB / 89.1dB / 87.1dB
<b>Impedance modulus: minimum &amp; maximum</b> (20Hz–20kHz)	2.91ohm @ 210Hz 29.3ohm @ 1.95kHz
<b>Impedance phase: minimum &amp; maximum</b> (20Hz–20kHz)	-35° @ 65Hz +63° @ 1.09kHz
<b>Pair matching/Resp. error</b> (200Hz–20kHz)	2.0dB/ ±2.3dB/±2.3dB
<b>LF/HF extension</b> (-6dB ref 200Hz/10kHz)	34Hz / 32.2kHz/32.5kHz
<b>THD 100Hz/1kHz/10kHz</b> (for 90dB SPL/1m)	0.06% / 0.09% / 0.45%
<b>Dimensions (HWD) / Weight</b>	1285x280x450mm / 34kg