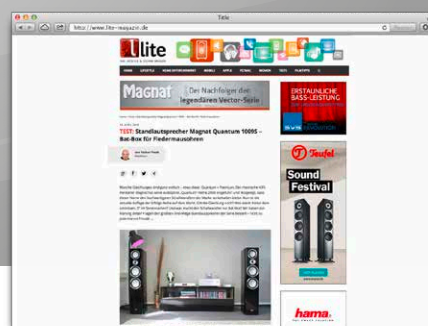


"Yes, the bass is big; but it's precise and very defined."

## Magnat QUANTUM 1009 S



OVERALL RATING: 1.0  
CLASS: REFERENCE CLASS  
PRICE/PERFORMANCE: REASONABLE



# Magnat

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04 | 2016

## Magnat Quantum 1009S floor-standing loudspeaker – BAT box for bat ears

Some equations are very easy - like this one: Quantum = Premium. The Rhineland-based hi-fi manufacturer, Magnat, introduced its audiophile "Quantum" range in 2004 and specified that this name was reserved for the brand's highest quality speakers. The current edition of the success range has now hit the market. Does the equation still ring true? What's behind the ominous "S" in the name of the range? And what turns the sound transducer into a BAT speaker? To clear up these matters, we ordered the largest 3-way floor-standing loudspeaker in the range - not to everyone's delight, though ....

The transport company was cursing! The boxes were not only big, they were also heavy. Very heavy. Each 1009S weighs over 50 kg, so unloading isn't that much fun. A curse or two could be heard from the colleagues who were in the editorial office that day and had to drag the speakers into the listening room. No question: If the sound produced by these speakers matches the pounds they put on the scales, we're really going to enjoy the listening test! But first they have to be "unboxed". This would certainly have been worth filming - it's not every day something that huge has to be hauled out of a box. To make a long story short: Each box contains a speaker that is well padded for transportation, plus a pair of gloves to lift the sound columns upright and into the correct position without covering them with fingerprints; further accessories include a user manual, magnetically fastening protective covers for the speakers and high-quality, height-adjustable spikes. These are provided as an alternative to the somewhat delicate rubber feet fitted ex works. Advantage should also be taken of this alternative if possible. The spikes raise the speakers further above the floor, causing the vibration of the speaker, i.e. the unwanted acoustic energy, to be directed towards the substrate and stopping it from being fed back to the speaker via the vibrating floor. In many cases, the use of spikes pays off in the form of a more defined sound, especially in the bass ranges. On hard floors, however, the metal tips can also lead to a somewhat sharp sound. So you just have to try it out and see what produces a better result. The use of spikes proved to be a good choice for us on account of the carpet in the listening room. (...)

### Top-model driver

The current Quantum range has added something new: There is now an "S" emblazoned at the end of the range name. This letter is a bit of a red herring, however. Although the "S" stands for "signature", it actually means "T" as in technology transfer. The 1009S benefits from the know-how Magnat originally invested in the development of the chassis for the absolute top model of the range, the "Quantum Signature". The further development of the Quantum range is essentially based on this. Like the old 1009, the current S class is fitted with 2 x 200 mm subwoofers and a 170 mm midrange driver, though models with inverse dustcaps are now used throughout. The curved dome is the central area of the membrane and has two crucial functions: It is the dirt protector and the heat sink for the voice coil located behind it, serving to stabilise the entire membrane mechanically, and it is also influential in acoustic terms, playing a particularly important role in the dispersion characteristics of higher frequencies. Whereas the dome is normally curved outwards, the curvature on the three (sub)woofers is concave for the current S model of the 1009. Although this so-called inverse dome is not better per se, it did lead to more positive results in the test phase in overall terms for the current Magnat membranes. The dome is intended to control the resonances and partial oscillations of the membrane, which is made of an aluminium-ceramic composite.

Both materials guarantee good rigidity and, therefore, uniform oscillation of the radiating surface as well as displaying pronounced self-resonances on account of the hardness of their material. Now it's the mix that does it on the 1009S: The composite materials and the inverse dome are designed to expel all acoustic inconsistencies from the membrane. This is the visible part of the technology transfer, with the further chassis know-how adopted by the "Signature" concealed behind the membrane, such as the smart voice coil ventilation, which guarantees particularly high load capacity, or the well ventilated die-cast aluminium basket, which prevented air turbulence and compression effects from occurring in the first place. These concern first and foremost the bass drivers as they move the most air. Working in the 1009S is a duo that together converts sounds up to 17 hertz - meaning that these woofers sound out the lower human hearing threshold.

### Super tweeter

The tweeter in the 1009S also comes from the "Signature". And has a 30 mm dome. It is made from a very lightweight, semi-crystalline polymer. This fluorine-carbon compound is known by the brand name "Teflon". So Magnat pulls out all the stops in the in the treble range, with the material that gained fame through space and frying pan research being designed to optimise efficiency and pulse fidelity, as is the strikingly wide bead. All of this turns the tweeter into a fast and snazzy dome. Magnat is likely also thinking here of suitability for the increasingly popular high-resolution files, whose frequency range extends distinctly beyond the human auditory threshold of around 20 kilohertz. The Quantum is ideally equipped for this, with the tweeter designed to play up to 75 kilohertz. That is ultrasound, i.e. a frequency region for bat ears; after all, there is hardly any other creature on Earth that has such sensitive hearing. The 1009S is therefore a "BAT box", so to speak. But humans also benefit from the merits of the highest treble range reproduction: The sound image of high-resolution recordings appears clearer, richer in detail, more spatial - though only if the music file has not been artificially inflated, of course, i.e. not merely extrapolated. (...)

### Muscles and music: The Quantum 1009S in terms of setup and sound

(...) The 1009S could then demonstrate its musical muscles, starting with Dave Weckl. The jazz fusion drummer is one of the best percussionists on the planet, displaying his phenomenal ability straightaway with the opener from his "Master Plan" CD: In the funky-groovy title "Tower Of Inspiration", Weckl handles a seemingly endless battery of drums with incredible finesse and ease, but he also really lets things rip. And the Magnat presents this percussion with super clear and hyper crisp sound, with fantastic dynamics and punch as well as a lot of subtleties in the treble ranges. It is not only the drummer's phenomenal cymbal playing that is reproduced so precisely, so is the spatial nature: You can almost see where Weckl has been performing his work - or, better still: you experience the echo chamber which technology has provided to back up the drummer's performance. The recording is from the last millennium and Magnat mercilessly reveals the state of the art at that time; the type of production is clearly audible, making it possible to deduce the age of the recording.

The progressive metal band, Threshold, is a lot more up to date: A modern, bold production also elevates the musically very successful "Dead Reckoning" disc to an acoustic listening pleasure. Ethereal vocal choruses, richly distorted but very transparent guitars, extensive keyboards and, in addition, a rhythm section driven on by a rather dry bass and rich percussion with a great bass drum.

This percussion - and especially the bass drum - simply sounds fantastic via the Magnat. The sound of the drum kit is rich and powerful - we never quite noticed the quality of the drumming and the percussion performance before on this recording - a real added value, which makes the mega song "Slipstream", which has always been the catchy melody on the record, even a bit more enjoyable. Up to now, the main things that stuck in our minds was the vocal arrangement focused on in the production. And rightly so, as Andrew McDermott is, after all, the master of his craft at the microphone. The 1009S give his pleasant voice the right space, with the solo and joint vocals developing an ethereal epic. (...)

### Meticulous elaboration

We take a short break from listening and then change the genre: Classical music. And we take a very distinctive recording: The exceptional guitarist John Williams plays the First Guitar Concerto by Mauro Giuliani - and this on a rare contemporary instrument from 1814, produced by the legendary instrument maker, the Guadagnini Family. An instrument with a lot of character: It has an intimate, fine, almost eloquent sound. This makes it ideally suitable for the Giuliani Concerto, and the Magnat presents this guitar to us with all its special qualities in a detailed and vivid manner. You can hear from the impact on the strings and the musical sound characteristics and from the direct but slightly reserved tone that this cannot be a present-day concert guitar. So, with the Magnat, we experience an impressive acoustic journey through time to the ideal guitar sound of the Romantic era. However, the Magnat does not forget the orchestra seated behind Williams. The Australian Chamber Orchestra has the right balance, the individual sections are wonderfully defined, and the 1009S beautifully reproduces the special details written into the score by Giuliani. Really magnificent at selected points, for example, is the accentuated, sonorous solo use of the double bass - a very successful orchestral effect which the Magnat presents in a skilful way. And here again: What a great bass!

The great clarity of the soundscape is striking even with large orchestras like the Royal Concertgebouw Orchestra, with the Magnat providing us not only with music in "A Hero's Life" by Richard Strauss, but also with a lot of acoustic information about the space in which the music is produced.

As at the beginning with Weckl, the Magnat takes us to the scene of the music, this time the Laiszhalle in Hamburg - this power or presentation is a part of successful reproduction, and the Quantum knows how to do it. The speaker can also display its strengths with high-resolution files: The Dunedin Consort recorded Johann Sebastian Bach's Brandenburg Concerto no. 2 in F major, and what we have already experienced in CD quality (44.1 kHz) is continued by the Baroque musicians in the form of a 192 kHz music file: The physicality of the ensemble and the soundstage come across as virtually live. (...)

### Conclusion

Quantum = Premium - this Magnat equation also applies to the current S class - something the 1009S has demonstrated in an impressive way. It has amazing bass strength and level stability, something that should almost be expected given its stature and weight; however, it also displays extremely fine resolution and very detailed reproduction - this makes it interesting for all audiophiles who also appreciate clarity in addition to power. With its very high-reaching treble range, this loudspeaker is a "BAT box" for very sensitive ears - those who pass the listening test being rewarded with acoustic added value.