

Magnat

Quantum 757

"Regardless whether it's for stereo use or a home cinema setup, Magnat's Quantum 757 is a mature speaker that is suitable for both music and film audio thanks to its potent acoustic performance."



Magnat Quantum 757: Three ways, one goal

"A floorstanding speaker is the flagship product of any speaker series. This is also the case for the Quantum 757 model, which is part of Magnat's brand new 750 series. The speaker, which was presented at the IFA 2012, promises to satisfy the highest demands of both stereo and home cinema enthusiasts alike. Whether or not this has been achieved will be revealed by the AV-Magazin test.

Models and application

Magnat's Quantum 750 series currently consists of five different types of speaker. This means there is something suitable for every application. For classic stereo operation there are the two floorstanding speaker models. While the larger Quantum 757 features two bass drivers and one midrange unit, the Quantum 755 has two combined bass-midrange drivers. The chassis themselves, however, are not any different. The Quantum 753 compact speakers are suitable for use as monitor speakers and home cinema effect speakers for smaller living spaces. Magnat once again opts for its tried and tested cone and dome tweeter configuration here, which is used by the floorstanding speakers.

The Quantum Center 73 speaker provides optimum transmission of dialogue in a home cinema setup. With its horizontal and symmetrically designed chassis arrangement, the centre speaker can be optimally positioned underneath a TV. The Quantum 731A active subwoofer generates the sound foundation for the home cinema. Its large 30 cm driver enables it to reproduce a particularly impressive low frequency bass range

Housing and design

All of the speakers in Magnat's Quantum 750 series are available in a black, black/brown and white finish. The mocha version of our Quantum 757 test unit features a deep black baffle and a base plate of the same colour. The rear housing is covered with a dark brown, textured wooden veneer, to which the mocha designation does not necessarily allude. The Quantum 757 is 106 cm tall but only 19 cm wide. In order to produce a sufficient housing volume for powerful bass reproduction, Magnat's developers have increased the depth of the housing to 37 cm.

The 45 mm thick, dual-layered high gloss baffle is attached to the housing, which visually sets it apart from the silk matt rear. This represents a tasteful differentiation to the rear housing of the speaker. The three cones are embedded flush in the front panel and are equipped with a silver chassis basket ring. The front plate of the tweeter is also silver. At the rear of the housing are the terminal area and the bass reflex tube. Underneath is a 35 mm thick, glossy base plate, under which four large resonance absorbers are attached. Depending on the surface on which the speakers are to be mounted, the Quantum 757 and 755 models can either be provided with the aforementioned base or the supplied metal spikes.

Technology

Inside the Quantum 757 is a classic three-way system, which consists of four drivers. A passive crossover, which is equipped with high quality components, is used for the correct allocation of frequencies to the corresponding chassis. The Quantum 757 exhibits phase and amplitude-optimised dispersion properties thanks to its elaborate correction circuits. To ensure perfect signal transmission between the connecting terminal, crossover and chassis, Magnat has equipped the speaker with high-quality internal wiring.

The large terminal area features sturdy screw terminals that offer optimum contact reliability and signal purity for cables with large cross sections. The bi-wiring and bi-amping option, which is common for this price range, is ensured by the quadruple pole terminal assembly.

The lower two chassis reproduce bass frequencies up to approximately 250 hertz before the low-pass filter reduces the level with an increasing pitch. The midrange frequencies between 250 and 2,800 hertz are reproduced by the midrange driver that is positioned at the top of the baffle. The small dome tweeter subsequently operates beyond the auditory threshold. All three cones are manufactured from aluminium and ceramic and measure 17 cm. This material mixture is intended to provide the radiating surface with damping properties, while ensuring it is light and rigid at the same time. At the centre of the silver/grey cones is an inverse dust cap, which ensures additional stabilisation for the radiating surface, thereby enhancing its resonant behaviour. The tweeter is equipped with a small 25 mm textile dome. A double magnet system with pole core ventilation operates behind the dome for a low-distortion reproduction of the treble range.

Sound

Magnat's Quantum 757 presents an extremely balanced sound character during the listening test. It transfers any signal it is supplied in a tonally neutral manner. Cheap showmanship is just about as far away from its performance as is an intrusive or cheeky demeanour. In Gustav Holst's "The Planets" by Telarc, the floorstanding speaker comes up trumps with a very tidy spatial presentation. Each instrument is at its proper position and can be located precisely. The 757 generates an excellent level of depth within the width of the stereo image. In short: The Quantum 757 sounds neat and precise.

It delivers a pleasing performance in the bass range with an agile temperament that doesn't let up, even at higher volumes. The midrange reproduces voices and instruments in a very authentic manner. The tweeter sounds brilliant and clear, which provides the listener with an open and detailed sound pattern."