

MOON By Simaudio Neo 430HAD Review

by Michael Liang

Fully Loaded

The \$3500 Simaudio MOON Neo 430HA is not just another “me too” product from an established high-end audio company out to grab a piece of the personal audio pie. Features such as headphone crossfeed (Xfeed), selectable Hi/Lo output gain, fully balanced differential design with front panel dual mono 3-pin XLR outputs, 4-pin XLR balanced stereo output, 1/4” stereo TRS output, 3.5mm input and remote control – the extensive list goes on. Headphone enthusiasts normally find these things on an “end



game” headphone amplifier. For \$800 more, you can top it off with an internal Hi-Res DAC card with four digital inputs capable of PCM 24-bit/192kHz (all inputs) and 32-bit/382kHz, DSD64, DSD128, DSD256 via the asynchronous USB.

My review unit is the version with internal DAC (MOON Neo 430HAD). This is my first extended use of a Simaudio product so I did download and read through the well-written, brief, 16-page owner’s manual prior to its arrival. And that got me even more anxious. I’m no stranger to equipment “break-in” so it’s nice to see that Simaudio backed up this theory by noting in the manual “your 430HA will continue to improve during the first 300 hours of listening.” Another observation is that the Neo 430HAD inherited some features from Simaudio’s higher-end Evolution Series.

from owner's manual:

“M-eVOL2 volume control circuit using MDAC's (operating in a current steering R-2R configuration) which alter the audio signal's amplitude, yielding no sonic degradation of the signal, regardless of the selected volume setting. This circuit offers 530 steps and channel matching of 0.1dB”

“4 stages of our M-LoVo (MOON Low Voltage) DC regulation circuit; a highly sophisticated circuit that is virtually free of noise, yielding an exceptionally fast, precise, and stable DC voltage. This circuit, found in the Evolution series 810LP Phono Preamplifier and 740P Preamplifier, results in a power supply with a virtually unmeasurable noise floor”

“SimLink™ controller port for 2-way communications with other compatible MOON components.”

If you’re a specs person, numbers such as 8 watts of power @50Ω, output impedance of 1.25Ω, 0.005% THD and signal-to-noise ratio of 120dB at full output certainly would not disappoint any “specophile.” I’ve come across many headphone amplifiers in my seven years of being in the personal audio hobby, so I am not easily impressed, but the Neo 430 HAD’s features list and specs has my attention. Skip the marketing materials and read the manual!

Hear Every Detail



To put the Neo 430HAD's power output rating to the test, I chose the demanding [Abyss AB-1266 by JPS Labs headphone](#) (rated at 85dB sensitivity) and utilized the dual mono 3-pin XLR balanced connections. On track 1, "Opening," through track 2, "Blue Suede Shoes," from [Viva ELVIS – The Album \(Cirque du Soleil\)](#), the sound I'm getting is large with loudspeaker-like authoritative bass, a listening experience beyond every headphone I've used to date. This soundtrack album is beautifully mixed with dynamic sound effects that switch between left and right channels and outside your head. High-end headphones coupled with powerful amplifiers provide a non-fatiguing listening experience. The Neo 430HAD exhibits no restraints going full-throttle and keeping it there. This is way beyond my listening comfort zone and hearing safety, for that matter, but it sounded great, not hard or forceful. It is toe-tapping musical and smooth.

Dialing things back a bit, I moved to my [Noble Audio K10 custom-fitted in-ear monitors](#). The MOON Neo 430HAD's ultra-low 1.25Ω output impedance makes it ideal for IEMs with balanced armature multi-drivers, and in the case of the K10, we have 10. Throwing

so much power at a pair of IEMs may sound insane, but in use, the sound is incredible. There is so much depth and body in the music at a low volume level, there's no need to crank it up to hear the full frequency spectrum. With so much power and gain, enough to drive the Abyss headphones with ease, you would expect the Neo 430HAD to have some background noise when using IEMs. Well, in LO gain the 430HAD does have a small amount of hiss with the K10 when no music is playing. But this is quickly overshadowed by music as soon as I hit "play" on [Igor Levit's Bach: Partitas BWV 825-830](#) on my [Sony HAP-Z1ES music server](#). I can hear an incredible amount of detail with this combo; even the occasional squeak on Levit's chair is audible. I really like the ultra-fine 530-step volume control on the Neo 430HAD. It allows me to enjoy music at any level. This is especially valuable when using sensitive IEMs such as the Noble Audio K10. The internal Hi-Res DAC provides plenty of detail and finesse in the music and proves to be almost on par with my [McIntosh D100](#) in a direct comparison via the balanced XLR connection on the Neo 430HAD. I think integrating the DAC directly with the amplifier, taking out any signal loss in cables and power source, yields some performance gains. At \$800, the value of the DAC upgrade exceeds its asking price in my opinion. The headphones I've used with the Neo 430HAD have all imaged very well so I didn't have much use for the Xfeed headphones' crossfeed circuit. Those coming from speakers to headphones may find the Xfeed useful in getting accustomed to listening with headphones.

Living Without You

The Moon Neo 430HAD is truly a remarkable product, and the fact that it sits at the low end of Simgaudio's products portfolio tells me that I need to look into their other offerings. Whether you are a casual headphones listener or an enthusiast like me who owns over 200 pairs, the Neo 430HAD will exceed expectations. I am seriously considering buying the review unit to use for reviewing purposes as my reference solid-state headphone amplifier/DAC. I don't think I could part with it!

MOON by Simgaudio Neo 430HA retails for \$3500, 430HAD (with DAC) \$4300.