

Audient EVO 16

USB Audio Interface

The EVO 16 targets newcomers to recording, but offers some surprisingly professional features.

SAM INGLIS

Audient started out as manufacturers of large- and medium-format analogue mixing consoles, drawing on the immense experience of designer Dave Dearden. When they moved into making audio interfaces, one of the key selling points was their ability to apply this analogue design expertise in the new sector. Audient's ID range thus combines ergonomic desktop form factors with mic preamps and other circuit designs closely related to those used in their flagship ASP consoles.

The ID-series interfaces are competitively priced, but on the pure value-for-money front, they are undercut by rival products that use mass-market, off-the-shelf components and circuits. Hence the launch of Audient's EVO series

of interfaces, brought to market more affordably by the use of generic audio circuitry instead of the Audient custom designs employed in the ID series. But price isn't the only thing differentiating the EVO interfaces from their ID brethren.

Tabula Rasa

The market for budget, entry-level interfaces is mostly made up of newcomers to recording. These customers, on the one hand, benefit from designs that present the easiest possible learning curve; but on the other, they're also unburdened by preconceptions as to how an audio interface should work. Consequently, Audient have put a lot of work into the usability and ergonomics of the EVO series, and they've not been afraid to depart from established convention. The EVO 4 and 8 look nothing like any other audio interface

I've ever seen, and present a refreshingly minimal and friendly user interface.

Designed to sit on a desktop, those two units can be bus-powered, and are aimed primarily at podcasters and self-recording musicians. The new EVO 16 is rather different. Though it too connects to the host computer using a single USB-C port, it's a mains-powered device (with an internal PSU, happily) that boasts eight analogue inputs with mic preamps, eight line outputs and a pair of independent headphone outputs. It also introduces digital I/O into the EVO equation for the first time, and with impressive comprehensiveness. Two pairs of optical Toslink connectors are switchable between ADAT Lightpipe and stereo S/PDIF digital audio formats, and there's also a word-clock output so that you can keep connected devices locked to the



Most of the EVO 16's I/O is on the rear panel, along with the USB-C port and mains IEC inlet.

EVO 16. So, although it's called the EVO 16, it actually offers up to 24 inputs and outputs at base sample rates. At 88.1 or 96 kHz the ADAT channel count is halved, as usual, for a total of 16 I/O.

The plastic casing of the EVO 8 and 4 raised some eyebrows, but I can't find anything to complain about in the physical design of the EVO 16, which is predominantly made of metal and feels very sturdy. One interesting design choice concerns rackmounting: Audient's research suggests that the majority of customers in this sector don't own any 19-inch rack gear and are more likely to use an interface freestanding. As shipped, therefore, the EVO 16 comes without rack ears and with a pair of rubber feet that allow it to sit firmly on a desktop without scratching it. Anyone who does want to rackmount it can register their unit to receive an optional kit, and the feet are easily removed. This seems a sensible approach to me, though I suppose you could argue that if Audient really aren't expecting it to be rackmounted, they could have used a different form factor with the controls on the top.

Digital By Design

One of the distinguishing features of the EVO 8 and 4 is that there are no analogue controls at all. Buttons select different parameters for adjustment, and an endless rotary encoder with a halo of white LEDs does the adjusting. Helping out in the background, meanwhile, are technologies such as Smartgain, of which more presently. The EVO 16 extends this all-digital approach in a logical fashion, with the headline new feature being something Audient call Motion UI. Whereas the smaller EVOs have only that LED halo to provide visual feedback, the EVO 16 has a square, high-resolution colour display;

and the idea behind Motion UI is to give the user immediate and clear indication of whatever it is they're doing at the moment.

As on the smaller EVO interfaces, there's a numbered button for each input channel, plus two more buttons to toggle phantom power and high-impedance mode. This last is available only on the first two inputs, which emerge on the two front-panel combi sockets. So, for example, to engage high-impedance mode on channel two, you'd first press the button labelled '2' to bring that input into focus, whereupon its numeral lights up. You can then press the 'guitar' button to switch to that mode, and use the main encoder to adjust the input gain. Simultaneously pressing adjacent odd- and even-numbered buttons will link those two channels for stereo. Motion UI responds to most such actions with friendly and informative feedback; for example, if you press the 48V button, a Pac-Man ghost appears along with the words Phantom On, while adjusting the gain manually brings up a large numerical readout.

I've long been a fan of digital preamp gain control. It allows me to adjust gain either from the unit or from software, it permits gain to be precisely matched between channels, and it makes gain settings easier to recall. In fact, I usually think of it as a premium feature found mainly among the upper strata of the audio interface world, so I'm particularly impressed that Audient have implemented it on such an affordable product. The sweet icing on this particular cake is Smartgain, which is a means of effortlessly optimising the gain for all the channels you're using, in one go. Simply press the green Smartgain button, then one or more numbered input buttons, then the Smartgain button again. The EVO 16 will then 'listen' to whatever it is that you're trying to record and set

the gain parameter on each channel accordingly. It will also report any channels that 'fail' the Smartgain process, for example if there's no signal present, so that you can check your connections.

On the output side, three buttons to the right of the encoder temporarily assign it to the main monitor output or the levels of the two headphone outputs. Pressing and holding one of these buttons toggles muting, while a fourth button labelled F can perform one of four assignable functions: Mono, Alt Speaker switching, Dim and Talkback enable. This last is, again, an unusual and welcome feature on an interface in this price bracket. The EVO 16 doesn't have a talkback mic of its own, but if you're not willing to sacrifice one of the other inputs, it can take the talkback signal from a second device such as a USB >>

Audient EVO 16

£399

PROS

- Excellent value for money.
- Digital control over everything including preamp gain.
- Smartgain is a neat time-saver.
- Configurable 'master section' features including speaker switching, talkback and a very good mono option.
- Better than decent audio specifications.
- Up to 24 inputs and outputs at base sample rates.

CONS

- Illuminated buttons are difficult to see in daylight.
- Latency figure reported to DAWs is not quite right.

SUMMARY

Audient have laid down a challenge to rival manufacturers with an entry-level interface that offers many professional features, as well as some welcome ergonomic innovations.

» mic. There's no physical on/off switch, but the EVO 16 can be powered down by pressing and holding the main encoder. A momentary press of the encoder cycles the display through three different meter pages relating to either the inputs or outputs, depending on what button you last touched. Metering is the only context in which the display's relatively small size could become an issue, though it's not a problem when the EVO is close at hand.

In use, this is all very slick and efficient, and I only have a couple of minor gripes. The white LEDs that illuminate behind the numbered buttons are difficult to see in daylight, and I had to shade the front of the unit with my hand in order to be sure which input was selected. (Trivial as it sounds, this would actually be top of my list of things to improve or change.) On the output side, power cycling the EVO 16 resets both headphone levels and the main monitor volume to zero, which avoids one sort of nasty surprise at the cost of another — it would be an improvement if this could be made optional. And it would be nice if Motion UI had some way of reporting why an input had failed Smartgain, as well as the mere fact of failure. In general, though, it's all very friendly and intuitive, and Smartgain itself is brilliant. I've only ever encountered a similar feature on the Roland Studio Capture, where it was implemented with too little headroom. Here, Audient have got it just right, and I never managed to accidentally clip an input once Smartgain had set the level appropriately. It also respects stereo linking even when peak levels vary from left to right, as it should do.

Soft Play

I mentioned the ability to adjust preamp gain from software as one of the pluses of the digital approach, and in this case, the software in question is simply called EVO. As the EVO 16 is a class-compliant device and uses the Mac's built-in Core Audio driver, you can actually operate it on Apple devices without installing the EVO software, but I can't imagine why anyone would do so! In look and feel, EVO adopts the 'clean and clear' look also favoured by manufacturers such as Focusrite and Arturia, and which probably owes a lot in the first instance to Ableton Live. When you first load it up, in fact, you might think everything is greyed out, but you soon realise that it's just very grey.

Like most interfaces of its ilk, the EVO 16 has a built-in DSP mixer to handle



— The EVO software mixer is clear and simple, but gives access to some surprisingly deep functionality.

routing, low-latency cue mixing and use as a standalone mic preamp. In fact, it has several mixer pages, each of which can funnel all of the physical inputs down to a single stereo output. The main mixer is duplicated, with an optional level offset, as the Alt Speaker mix; the speaker volume control only affects the levels of these mixes, which might typically be routed to outputs 1-2 and 3-4 respectively. Four further mixes labelled Cue A-D are available, and it's also possible to set any physical output pair to DAW Thru, whereby it is directly addressed from a DAW output pair. This would be useful if, for example, you want to use hardware outboard as insert processors.

In its default state, EVO seems designed to present the simplest and least intimidating array of controls possible, presumably so as not to put off newcomers. Delve a little deeper, however, and you'll find that it offers a surprisingly comprehensive level of control, including a number of features that are more typical of expensive 'professional' interfaces. I've already mentioned the ability to apply a level offset to the Alt Speaker mix, for level-matched speaker switching. That and all the other possible function button settings are all available simultaneously from the right-hand side of the EVO panel, and many are further configurable from the Settings window. A particularly great feature is that you can choose whether you want the mono fold-down to be routed to the left, right, or both speakers — single-speaker mono is incredibly

useful, and I can't think of many other interfaces that make it easily accessible at a single button press. Routing is as flexible as you're ever likely to need it to be, and unless you wanted to use the EVO 16 to drive a surround speaker setup, I can't imagine feeling limited by its capabilities.

One thing that confused me until I read the manual was the menu item labelled Input Routing. This, it turns out, refers specifically to the EVO's loopback option, which permits the stereo output of one piece of software to be treated as an EVO input for the purposes of recording and monitoring. Quite a few interfaces now offer similar options, which are very useful for streaming, podcasting, vlogging and other such unsavoury activities. The loopback input here can be taken either directly from a stereo DAW return or from one of the EVO's mixers.

In Use

One of the things that differentiates the EVO range from Audient's more costly ID and ASP products is the use of generic audio circuitry rather than bespoke designs. However, that doesn't necessarily mean that you can expect inferior performance, and the audio specifications for the EVO 16 are actually rather good. (They're also commendably clear and comprehensive, especially in regard to things like headphone output level, which is often overlooked.) If you're thinking of interfacing the EVO 16 with other studio gear, though, be aware that like many other affordable interfaces, it doesn't quite operate at 'professional' levels. The

outputs generate a maximum level of +12dBu, while the hottest that can be accommodated at the inputs is +16dBu.

The total gain range on the mic preamps is 58dB, and the alignment is quite nicely judged. At one end of the scale, you can get a healthy level from close-miked speech with a moving-coil dynamic mic, and on the other, you can record drums without clipping. Equivalent Input Noise is less than -127.5dB (presumably A-weighted, though this is not stated) and the A-D converters deliver a dynamic range of 112.5dB A-weighted; the practical upshot is that even with the headroom that Smartgain leaves, the noise floor of the EVO 16 itself is always going to be way, way below that of your source. Input impedance in high-impedance mode is 500kΩ, which is on the low side, but of course you can easily attach a DI box if you feel this is loading down your electric guitar.

The outputs boast an even more impressive dynamic range of 121dB; this could be important, since the output volume control operates in the digital domain, but the relatively low maximum output level should mean you can connect active loudspeakers without having to turn things down too far. In the headphone amp department, you should have no problem with modern low-impedance, high-efficiency headphones, but may struggle to get enough level from older models — again, this is typical of interfaces in this price bracket.

I tested the EVO 16 on both Intel and M1 Mac machines, and it worked flawlessly on both. This is relatively unsurprising given that it uses the built-in Core Audio driver for class-compliant devices. With a 32-sample buffer size, most class-compliant devices will deliver a round-trip latency of less than 6ms at 44.1kHz. The EVO 16 reported a somewhat higher figure of around 8ms to Reaper, but when I tested this by re-recording an audio click, it was placed about 80 samples early on the timeline, suggesting that the true figure is indeed around 6ms.

Having been briefed by Audient about the wonders of Motion UI and Smartgain, I was expecting the EVO 16 to offer a radically different user experience from other audio interfaces. In practice, I actually think it would be fairer to say that it offers a user experience that's somewhat familiar — but from much more expensive audio interfaces. Having absolutely everything under digital control is a rare luxury at this price level, and some of Audient's UI innovations remind me of more costly products that achieve similar levels of user-friendliness using touchscreens. In its own price bracket, what I appreciated most of all was the surprising extent to which it takes on conventional rivals at their own game. For example, the most obvious competitors for the EVO 16 are Focusrite's third-generation Scarlett 18i20 and PreSonus's Studio 1824c. The former has Focusrite's Air option and its own talkback mic, while the Studio offers MIDI I/O, and both offer a wider gain range on their preamps. However, as well as matching or bettering most of these rivals' specs, the EVO 16 offers 16 ADAT inputs at base sample rates, digital preamp control, a colour display and better 'master section' features, including that assignable button. It may be targeted at newcomers to recording,

but this is a product that has a lot to offer to those with more demanding requirements. **///**

£ £399 including VAT.
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EVO 16 Copy

EVO 16

24 in / 24 out Audio Interface

Features:

- 8 x EVO Mic Preamps
- 2 x JFET Instrument Inputs
- 2 x Independent Headphone Outputs
- 8 x Line Outputs
- 2 x Optical Inputs
- 2 x Optical Outputs
- Multi-Channel Smartgain
- 'EVO Motion UI' Control System
 - High-Res LCD Screen
 - One Knob Centralised Control
 - Ultra Clear Metering
 - Input/Output Control
 - Channel Status Indication
- Programmable Function Button
- Ultra-Low Latency Software Mixer
- Monitor Control
- Audio Loop-back
- Word Clock Output
- USB2.0 (USB-C Connection)
- 24bit / 96kHz

Tagline

A new way of doing things

Intro

Our most powerful interface yet is here

Make studio quality recordings with EVO 16's next-level audio performance. Eight award winning EVO Preamps alongside our advanced converter technology will make everything you do, sound better. Add to that, intelligent mic preamps that set their own levels with Smartgain, the all new, groundbreaking Motion UI control system, and enough I/O firepower to tackle even the biggest of sessions, EVO 16 is truly a studio powerhouse, designed from the ground up to make recording easy.

Get studio quality recordings

The EVO Mic Preamp

Level up your audio performance with eight sonically stunning EVO Preamps. Backed by 25 years of engineering experience, our analogue mic preamp has been designed to deliver the most accurate, clean, and true to source version of your audio, no matter what you're recording.

- **Professional Sound**
 - Get studio quality recordings
- **58dB Mic Gain**
 - Easily power those gain hungry mics.
- **EIN - (No noise, no nonsense)**
 - Ultra-low distortion, noise free signal.

An analogue mic preamp, but smarter.

Our EVO Preamp technology not only has all the sonic advantages of an analogue mic preamp, but combines it with digitally controlled precision, giving you the ability to set your gain with pin-point accuracy, right down to the decibel.

- Perfectly match the level of stereo pairs
- Control from software
- Real time visual feedback on the screen

Clearer, sharper clarity

Advanced Converter Technology

Providing a MASSIVE 121dB of dynamic range, EVO 16's high performance converter technology makes sure you hear your audio accurately, helping you make creative decisions confidently, identify issues and improve your recording and mixing game.

A total gain-changer...

Smartgain

Make recording drums and larger sessions easy with Smartgain. Automatically set the gain for all 8 channels at once with a simple touch of a button. Powered by our lightning quick Smartgain algorithm, Smartgain uses advanced peak analysis to automatically analyse, adjust and set your gain to the perfect levels - all in less than 20 seconds! Now it's up to you to figure out what to do with all that time you're saving...

- Works on 8 mics at once
- Save Time
- Avoid Clipping

Working Solo?

Your own assistant engineer

Record, adjust levels, repeat? Sound familiar? Save time and make recording on your own a breeze with Smartgain. Simply set up your mics, hit Smartgain, start performing and EVO 16 will take care of the rest.

Introducing Motion UI

A powerful new control system

The Motion user interface has been designed to change the way you interact with your audio interface. For the first time, a stunning high resolution, full colour screen intelligently displays information as you need it, transforming EVO 16 into a fully immersive, easy to use experience.

The Screen

Every adjustment, every detail, every button press is beautifully displayed in real-time on a 240X240 TFT backlit LCD Screen, letting you navigate hardware features effortlessly, make changes on the fly and take full control of your recording session without ever looking at your computer.

Plus, IPS technology means information on the screen remains legible no matter your viewing angle - ideal for a variety of setups.

Channel Status

Pressing an input or output button momentarily displays the channel name, the levels and the functions activated for that specific channel. All the information you ever need in one place.

Metering

Keep an eye on your levels by quickly cycling through your inputs and outputs with EVO 16's crystal clear, full colour metering.

One Knob Control

Designed to keep your session in motion, One-Knob-Control lets you glide through EVO 16's hardware features from a single centralised point. Unlimited power, simple control.

Function Button

Thanks to the customisable F-button, you can assign any of EVO 16's advanced monitoring controls to the programmable function button. Your workflow, just the way you like it.

Room for expansion

Digital Outputs

Future Proof your studio and configure your setup to tackle bigger sessions. Whether you're recording drums or taking on a full band, EVO 16's optical inputs and outputs have got you covered. Supporting both ADAT and SPDIF, add up to 16 channels of mic preamps to your setup, giving you plenty of options for expanding your studio down the line.

Line Outputs

Pick the best route

Connect and listen to your mixes through multiple sets of speakers with EVO 16's eight line outputs. Alternatively use the extra line outputs to send audio to external outboard gear, such as compressors or FX units, or to headphone amps for distribution to your artists.

Clarity where you need it most

Headphone Outputs

Drive even the most demanding headphones with EVO 16's two dedicated headphone amps. Easily power headphones up to 600 Ohms all while experiencing detailed monitoring and playback as well as plenty of volume.

Classic tone, modern sound

2 x Instrument Inputs

To build a monster guitar sound you need the right foundation. Our harmonically rich JFET instrument input circuit is designed to replicate the input stage of a classic valve amplifier, providing an ideal sonic foundation before you hit your guitar sims.

Advanced Monitor Control

For the keen listener

EVO 16 takes critical listening seriously and is packed full of monitoring functionality to back it up. Whether you are switching between two sets of speakers using the ALT monitor feature, checking your mix in Mono or quickly communicating with your artist using Talkback - all features can be activated straight from EVO 16's front panel. The best part is you get to customise which control is assigned to the hardware F-button.

Communication is key

Talkback

EVO 16's dedicated talkback technology lets you use any audio source connected to your computer such as a built-in or USB microphone as your talkback mic, freeing up valuable mic preamps for recording.

Speed meets reliability

Ultra-fast USB

In the studio, every second counts - and with rock solid driver performance, high-speed USB connection, and ultra low latency monitoring, EVO 16 will always deliver the reliability needed to keep up with your creativity.

The Mixer

Engineered to simplify your workflow, the EVO Mixer enables you to set up and route your inputs + outputs effortlessly, provide ultra-low latency monitoring, set up dedicated artist headphone mixes and so much more. Compatible with MacOS and Windows.

For the content creators

Audio Loop-back

In the world of content, your audio needs to not only sound great but be easy to control. Audio Loop-back makes this possible. Ideal for content creators, podcasters and streamers.

Looks that could kill

Who said interfaces have to look utilitarian? EVO 16 has been meticulously designed to look amazing on both your desktop and in your rack. Super bright backlit LED lighting not only looks stunning but ensures visibility in the darkest of studios, whilst a solid steel chassis makes sure EVO 16 is built to last.

Stacked or Racked

Portable

Although packed full of features, EVO 16 defies the normal with its deceptively small form factor. At just over 16in wide with non-slip rubber feet, EVO 16 works perfectly whether on your desktop, under your laptop or as a permanent fixture to your studio with optional rack ears.

Environmentally Friendly

In order to minimise our environmental impact, EVO 16's detachable rack ears will be available as a free optional extra, reducing required raw materials, shipping volumes, and thus our carbon footprint. We have also taken great steps to ensure EVO 16's packaging utilises recycled materials whilst keeping plastic usage to a minimum.

Warranty

All of our products come with a three-year limited warranty guaranteeing you further protection and peace of mind when you choose EVO by Audient.

ARC

Compatible with all major audio software and plugins, EVO 16 comes bundled with a collection of professional recording software, including Cubase LE, giving you everything you need to start recording right out of the box.