

AudioEase Altiverb 6 | from £410

Convolution reverbs started a revolution for producers – **Steve Hillier** checks out Altiverb's latest update...



WHAT IS IT?

A convolving reverb plug-in for enabling you to use the sound of real reverberant spaces within your DAW

CONTACT

Who: Audioease
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HIGHLIGHTS

- 1 Ease of use
- 2 The included impulse responses are the best available in the world
- 3 The sound quality is superb

PRICING

XL version
£700

Even in 2007, the fact that you can sample the sound of a room and use it to generate reverberation within your own music feels almost magical.

We're accustomed to the idea of playing multi-sampled guitars, string sections and drum kits and getting a result that's close to the sound of the real thing. But placing your music within the reverberation of any room in the world? It's a beguiling concept. Fancy recording your next album in the Taj Mahal? Or maybe a cave underneath the Andes? But with a computer and some relatively cheap software we can avoid the airfare and do it without leaving the comfort of our studios.

This is the revolution of convolving reverb units; they've been around at a professional level for many years, but

even hobbyists can dabble with plug-ins such as Space Designer that comes as standard with apple's Logic. In the software world, AudioEase's Altiverb has long been considered the leader of the pack. It has a certain quality that other reverbs lack, and has been favoured by producers and engineers ever since its release in 2002. Its last major update was in 2005, and this new version six has some important features that should excite and intrigue producers, especially professional-level users.

Sixth time around

Possibly the most significant new feature is Altiverb's support for Pro Tools TDM hardware on Mac OS X. This is big news for producers – AudioEase have optimised Altiverb to run on a single Pro Tools HD/Accel chip, producing a

maximum of a two-second convolving reverb. Link six chips together and you can have reverberation up to 25 seconds in length.

Why is this significant? It means that you can include Altiverb within your Pro Tools hardware setup at last and not have to worry about how hard it's taxing your computer's onboard CPUs. According to AudioEase, TDM users have been accustomed to using pairs of chips to achieve quite modest reverb times of around three seconds under convolution – Altiverb is evidently quite frugal with your processor cycles.

Speaking of CPUs, Altiverb will now run on Intel processors under Mac OS X, but TDM support is only available with the more expensive XL version, which also supports sample rates of up to 384kHz for the dogs and bats amongst us. The regular version supports sample rates up to 96kHz – you'll already know if you need sample rates higher than this. I don't.

Version 6 also includes an improved user interface. For the first time there's an impulse response browser, which is a huge improvement over the previous cascading menu style of selecting settings. I'm no fan of pop-up menus, so AudioEase get an extra point for this simple inclusion. But we're not totally out of the woods. The preset selector still opens up into a cascading menu. Oh well, you can't have everything. AudioEase have included 'automation



presets', numbered virtual memory slots on each instance of Altiverb that can recall settings you've prepared earlier, including loading in new impulse responses. This can be achieved via the regular automation facilities in your host DAW. It works just as advertised, but I had a hard time thinking how I'd put this facility to use. Maybe live?

Stunning sound

So those are the specs, but how does it sound? In a word, stunning. Altiverb ships with well over 1,000 impulse responses, covering everywhere from Caen cathedral in Saint Etienne, France, to a 30-foot-long tank somewhere in the Netherlands. These sound amazing; you won't be growing short of sound design ideas for years. And once you've registered you'll have access to countless more from the Audioease website too.

Altiverb can be quite taxing on your CPU. The longer the impulse response, the more calculations it has to make to generate this reverb. Consequently, it



Most impulse responses come with illustrative images – and blueprints of the building!

My standard set up uses two reverb settings: one for vocals (usually either a plate setting or small early reflections setting) and one room sound for everything else. I might occasionally stretch to include other reverbs: an additional larger room for strings or lead sounds when needed, and another for the occasional special effect, such as the reverb from inside a bucket, which can sound great on snare drums. Altiverb handles these jobs with ease;

convolving reverb plug-ins could sound substantially different in the studio; after all, the mathematical process of convolution is basically the same with each product. I shouldn't have been doubtful.

Altiverb is by far the best sounding reverb plug-in I've heard. To my ears it's far smoother and luscious than even Space Designer in Logic. Maybe this is down to the loving care that's been put into the development and recording of

At last, there was that luscious, detailed, all-enveloping sound that I didn't even realise I was missing

pays to use it on an effects send or buss, where multiple tracks and instruments can use the same reverb plug-in. With reverbs this detailed it makes no sense to muddle up your sound with competing room sounds.

you can even download an impulse response from a Coke can.

Best sounding

As a newcomer to Altiverb I was initially a little sceptical about how different

the impulse responses included with Altiverb, and if that's so then Apple clearly have some catching up to do.

However, I suspect there's something more going here. Creating my own impulse response in my living room and loading it into both units yielded subtly different results, and I know which unit I preferred. I have no problem with Space Designer, but putting it side by side with Altiverb was a revelation.

At last there was that luscious, detailed, all-enveloping sound that I didn't realise I was missing. Consequently, I have no hesitation in recommending Altiverb 6 to everyone. A superb product indeed. **FM**

Convolution?

Traditionally, digital reverb units simulate the reverberation of a physical space with a complex series of delays, filters and feedback loops. They often sound excellent and thousands of albums have been made using this technique, but convolution reverb units and plug-ins take a different approach.

First, you need to sound a starting pistol or loud sine wave sweep (an impulse) in a space, then record the reverberation that occurs (impulse response). Load that into your convolving reverb plug-in, which will analyse the recording and 'convolve' it with the audio signal you wish to process.

Convolution is a fairly simple process that generates a moving average signal based on the impulse response and the incoming audio.

The result is a new signal; reverberation that takes on the characteristics of the original space.

An interesting mathematical property of convolution is that theoretically you can swap around the impulse response with the incoming audio and end up with exactly the same sound.



SPECS

Mac: G4 1GHz, Mac OS X 10.3.9, 512MB RAM, iLok USB key. Plug-in formats: AU, RTAS, MAS, VST. Cubase 4 not supported.

PC: Pentium/Athlon 1GHz, Windows XP SP2, 512MB RAM, iLok USB Key. Plug-in formats: RTAS and VST.

ALTERNATIVES



Waves IR-1

£500

Expensive (at least when compared to Altiverb) but IR-1 sounds amazing and gives you the ability to lengthen or shorten reverb time while retaining much of the original character of the room.

waves.com



Apple Logic Space Designer

£600

Included as part of Logic Pro, Space Designer sounds great and comes with hundreds of impulse responses, including forests and volcano calderas.

apple.com



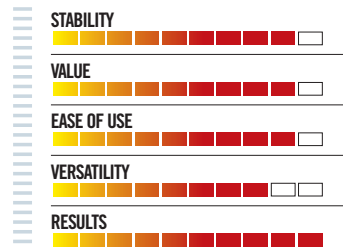
Sony Oxford Reverb

£350

Extremely flexible and stunningly smooth, the Sony Oxford Reverb isn't a convolving reverb as such, but it's definitely worth a look. Currently works with Pro Tools only.

sonyoxford.co.uk

FutureMusic VERDICT



An essential purchase for anyone needing a pro-level convolving reverb plug-in.