

Sony C-100

Sony's first new studio microphone for 25 years gets **JON THORNTON'S** Hi-Res pulse racing

Sony have been very quiet of late — at least in terms of the studio microphone market. Of course, they've maintained a significant presence in wired and wireless microphones for broadcast and video, but have steered clear of the studio since the C-800G. Still, if you're going to sit back, you may as well do it in style after producing such a truly iconic microphone.

So the C-100 has a lot to live up to as the flagship product in a range that heralds Sony's return to the recording studio, whilst simultaneously championing the company's alignment to the 'Hi-Res Audio' movement. Now, everybody from Neil Young down has been talking around this subject for years, and the truth is that there's no single definition. But the Japanese Audio Society, whose Hi-Res Audio logo appears on a number of manufacturers' products, has had a stab. Simply put, if signal processing and AD/DA can happen at 24 bit/96kHz, and audio can be recorded or played back in an uncompressed file format at that resolution, it's Hi-Res audio. And at the analogue end of things, speakers, headphones and (wait for it) microphones need to deliver and capture audio at extended frequency responses — to at least 40kHz.

It's a relief then, that most professional workflows in the digital domain have been happily Hi-Res compliant for quite a while then (and, seriously, I do applaud any movement that tries to ensure that consumers get the best audio deal possible). But the front end of the analogue equation is a different matter. To date, I could name a handful of microphones that would meet the JAS criteria — some Earthworks models, Sennheiser's MKH-800... diaphragm size and tuning alone make a standard AF large diaphragm capacitor design unlikely to ever meet that design goal.

This is where the C-100 comes in. With a useful (and supposedly reasonably flat) frequency response that extends from 20Hz all the way up to 50kHz, it certainly earns the badge. A squint through the head grille gives an indication as to how this has been achieved, with two capsule assemblies.

Now, we've seen a number of multi-capsule designs recently — most notably Audio Technica's 5040 and 5047. But with those designs, the capsules are identically sized. In the C-100, a smaller capsule with a dual 17mm diaphragm sits atop a larger one that features a 25mm dual diaphragm. With complementary tuning (and I assume some internal electronic trickery), the lower capsule takes care of business up to 25kHz, with the upper capsule handling things from then on up.

Looking for all the world like a C-800G that's been shrunk in the wash (and lost its Peltier cooling assembly in the process), the C-100 is a compact affair, and looks extremely well screwed together. Stubby slide switches on the front and rear of the microphone body provide pattern selection (fig-8, omni, cardioid), a -10dB pad and a high pass filter. The model provided for review was a pre-production version, and inevitably there are already some changes slated for the final production model. These include changing these switches due to noise issues (although I didn't encounter any problems) and providing a higher quality shock-mount the pre-production version felt a bit lightweight and out of keeping with a premium product.

Utterly impressed

And to paraphrase Henry Higgins, 'By George, I really do think they've got it'. I'll admit to being ever slightly on the sceptical side of the whole extended frequency response debate — I can certainly appreciate arguments for and against, and perhaps my scepticism increases in inverse proportion to age related HF loss... But only a handful of times have I ever been so utterly impressed by a microphone on first presentation — and on nothing more exciting than spoken word. There's a warmth and depth to the lower registers that sounds powerful but never woolly, but this is overlaid by a precision to the



/ The cardioid pattern is very smooth

mid-range and HF detail that means that you don't actually feel like you are listening through a microphone at all. The cardioid pattern is very smooth and tight sounding, with strong rear rejection, which helps underline this characteristic

on spoken word. Switch to omni, and there's a little too much 'reality' in a less than ideal acoustic.

Moving to sung (female) vocals and if anything, I'm even more impressed. I've heard that kind of 'precision' and clarity to a microphone's sound before, but very rarely in conjunction with a lovely and subtle voicing of the fundamentals. Sony Pro Audio apparently spent a lot of time working with Sony Music trying out different tunings for the capsule — and that work really shows here. Switching to acoustic guitar (on

the cardioid pattern again), and that same sense of suddenly seeing things through a freshly cleaned window (in aural terms) is repeated. It's a slightly bright tonality, and one that won't reward clumsy finger work, but never sounds jarring or jangly.

Welcome back Sony. Seriously. **T**

resolution/VERDICT

PROS Tremendous marriage of character and precision to the sound; solid build quality; compact size; dual capsules innovative and effective.

CONS You'd really want a pair...

bit.ly/Sony-Micro-Pro-Audio

Review microphone supplied by www.soundnetwork.co.uk