

Electrocompaniet PD-1 (£1250)



Electrocompaniet's new PD-1 is the largest DAC here and would be the most traditional in appearance but for its touch-sensitive display panel. It's solidly enough built – although the review top plate on the review sample did rattle against the fascia.

The PD-1 is unique in this group in two respects. First, it is supplied with a remote control, which allows the input source, output volume setting and display brightness to be adjusted. Second, it offers a wireless connection for use with the optional EMS 1 music streamer (£250), a small box, also with antenna, that is powered via a USB connection down which audio signals can be streamed to the PD-1. No driver installation or server software is required – all you have to do is ensure that the EMS 1 is the selected audio output device, then you can replay files using player software of your choice.

Input selection and volume control are also available via touch-sensitive arrows on the fascia display but the latter gives no indication of when digital lock is achieved or of the incoming sampling rate. Unfortunately the USB input is archaic in being restricted to 16-bit resolution and 48kHz sample rate, whereas the S/PDIF inputs support up to 24-bit/192kHz.

SONIC FOOTPRINT

Via S/PDIF the PD-1 has a distinctive sonic footprint that, if memory serves, bears a strong family resemblance to the previous ECD1. People who fall in love with the Electro – and there will be many – will be seduced by the unfailingly



ABOVE: Horizontal arrows on the display toggle between digital inputs, vertical arrows control volume up/down

commodious stereo image it projects and general euphony. This DAC majors on eliminating grit and grain, and has a silken, spacious quality unmatched in this group.

But there is a downside to this determined urbanity, which manifests itself in the form of slightly softened textures and lessened excitement. The insistent cello sawing at the start of the Tippett excerpt, for instance, lost some of its stridency but also a little of its urgency, dulling somewhat the impact of a passage that should prod your adrenal glands.

Waters' 'Perfect Sense' was spacious and the QSound trickery only added to the sense of fine stereo imaging, but it too, in its laid-back passages, lacked a certain spark. The big picture was great but the fine brush strokes were less telling, making the PD-1 fatigue-free over long listening periods but, arguably, less than fully engaging.

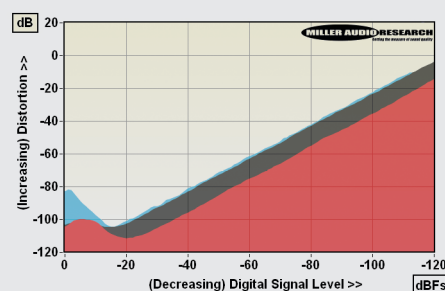
Sound Quality: 82%



HI-FI NEWS LAB REPORT

Electro's S/PDIF input is the superior option here, fully supporting 24-bit/192kHz inputs with an analogue frequency response that's just -3dB down at 76kHz, reaching 90kHz at -5.9dB. The balanced output is healthy at 3.8V but the source impedance is slightly higher than the 100ohm specification at 240ohm. Distortion is also a little higher than the optimistic 0.003% (20Hz-20kHz) rating, the dominant 2nd/3rd harmonics settling at 0.0029% at 1kHz but increasing to 0.01% at 20kHz with 48kHz, 96kHz and 192kHz input sample rates. The A-wtd S/N ratio is impressively wide at 112dB (re. 0dBfs) while digital jitter is very low at <30psec for all input sample rates.

The USB input is only a poor cousin in terms of its 96dB A-wtd S/N ratio and 48kHz sampling rate, the former having some mild impact on levels of distortion [see black trace, Graph below]. Jitter remains very low while the output level and frequency response from 20Hz-20kHz are unchanged. Interestingly, all inputs show a slight deep bass lift of +0.1dB/20Hz. Power consumption is less than specified – 6W rather than 35W. PM



ABOVE: Distortion versus digital signal level at 1kHz (red/SPDIF, black/USB) and 20kHz (blue/USB) over a 120dB range



ABOVE: Both balanced and unbalanced digital outputs are provided but there is no balanced digital input. Wireless input connects to optional EMS 1 music streamer

Maximum Output Level/Impedance	3.79Vrms / 243ohm (balanced)
A-wtd S/N Ratio (S/PDIF / USB)	112.3dB / 96.1dB
Distortion (20Hz-20kHz/0dBfs)	0.0029-0.011% (S/PDIF)
Distortion (20Hz-20kHz/0dBfs)	0.0027-0.011% (USB)
Frequency response (20Hz-20kHz)	+0.08dB to -0.16dB
Digital jitter (S/PDIF / USB)	27psec / <10psec
Resolution @ -100dB (S/PDIF / USB)	±0.3dB / ±0.6dB
Power consumption	6W
Dimensions (WHD)	420x50x340mm