

## PC SPECIALIST Enigma K3



£500 • From [www.pcspecialist.co.uk](http://www.pcspecialist.co.uk)

### VERDICT

**A competent but unremarkable system, given a welcome boost by Intel Optane**

**THE ENIGMA K3** is another PC that's eschewed an SSD in favour of Intel Optane memory, along with Cyberpower's. Once again, it's relying on a 1TB hard disk (the Seagate Barracuda, by far the most common choice at this price point) accelerated by a 16GB Optane module, which slots into the M.2 port on the motherboard, effectively creating a 16GB cache for your favourite programs and files.

According to AS SSD, this boosts sequential read speeds all the way up to 753.18MB/s, faster than you'd get from any SATA SSD, although write speeds are expectedly more in line with regular mechanical performance, at 119.63MB/s. You might also notice that this is slower than the Infinity X33 Optane's recorded read speed of 846.25MB/s, but we're not complaining too much. This storage setup remains exceedingly fast, by budget standards, at fetching data, and since the files for Windows 10 itself are placed in the cache, it boots to the desktop in a matter of seconds.

### STORE MORE

Again, though, you're trading off capacity for this speed: compared to the other PCs on test here, which have both a 1TB hard disk and a 240GB or 250GB SSD, you're getting about a fifth less total storage. On the bright side, 1TB is still perfectly adequate for most uses, and there is moderate scope for future storage additions. Inside, you'll find a single 2.5in drive bay and a total of three 3.5in bays, two of which are free to fill up with extra HDDs. There's also a second M.2 slot going spare, but to get the most out of this you'd need to

buy an NVMe SSD and migrate Windows and all your files from the hard disk to the new drive – that's no small amount of money and faff, and it would make the Optane drive obsolete in the process.

At least the dual M.2 drives are evidence of the Enigma K3's lovely motherboard. It's a full-size ATX model, the Asus ROG Strix B250H Gaming, and despite the name has plenty on offer for the discerning home office user. It's ripe for expansion thanks to its four PCI-E x1 and two PCI-E x16 slots, and the four RAM slots allow for plenty of memory. The existing 8GB of DDR4 RAM is split into two lots of 4GB running in dual-channel mode, so there's already an advantage there.

It also provides a practical mix of rear connection ports, including four USB2 ports, two USB3 ports, one PS/2 socket and Gigabit Ethernet. Audio is particularly well served, with rear speaker, C/SUB and optical S/PDIF outputs joining the usual line in, line out and microphone jacks. The only slight limitation comes from having only two video outputs – one HDMI and one dual-link DVI-D – so be wary if your desk is home to more than a couple of monitors.

### CHIPS ARE DOWN

Sadly, the Enigma K3's power doesn't match its speedy storage. PC Specialist has gone for a dual-core, 3.9GHz Intel Core i3-7100, which together with that 8GB of RAM produced 4K benchmark scores of 82 in the image test, 70 in the video test, 52 in the multitasking test and 63 overall. As the image portion is most representative of minute-to-minute performance in light tasks, it's a shame that the Enigma K3 couldn't break 100 (as many of the other PCs did), and even with Hyper-Threading – Intel tech that creates extra virtual 'cores' for the system to use – it's always going to be at a disadvantage compared to a Core i5-based PC.

That said, however, the multitasking test score of 52 isn't half bad for the i3-7100. It beats the Gladiator Enterprise, Wired2Fire Diablo Vertex, Cyberpower Infinity X33 Optane and Box Cube Essence Quiet, all of which should match or exceed it on paper. We suspect the dual-channel memory is helping out here.



For £500, there are still significantly more powerful systems to consider over this one, but the Enigma K3 demonstrates how even the entry-level Kaby Lake Core series can put up a fight. The i3-7100 also shares the same Intel HD Graphics 630 as its more expensive brethren, allowing this PC to manage an impressive 40fps in Dirt Showdown running at 720p with the High quality preset.

### MYSTERY MACHINE

While it's certainly possible to add in hardware such as a Wi-Fi card or optical drive, there isn't much in the way of extras at this spec. Be prepared, therefore, to make use of the single USB2 and USB3 ports on the front panel if you ever need to burn or rip a disc, or if you're too far from an Ethernet port and need to plug in a wireless receiver.

The case isn't much to shout about, either. It's as functional as it needs to be, but aesthetically, it's rather awkwardly stuck between low-key office properness and flashy gaming extravagance, not really committing to either. As a result, it just ends up looking slightly naff.

To be fair, it's also cool and quiet, and we will admit to liking how the 120mm exhaust fan is backlit – it gives the entire interior a cool blue hue, glimpsed through the various air vent holes.

It will take more than some LEDs to outshine the Enigma K3's imperfections, though, and it's hard to shake the sense that for the same money, you could get a PC that does a lot more – whether in terms of features, performance, or both.

At the same time, we don't want to sound too down on this PC. The Optane/HDD combo is great and its benchmark scores, while losing out in certain comparisons, are still within acceptable ranges for a £500 rig.

