Pint-sized DNA sequencer impresses first users

05 May 2015

The MinION device can sequence small genomes, such as those of bacteria and viruses, displaying the genetic sequence in near real-time. The MinION is a portable, palm-sized device designed to sequence DNA for just US$1,000. It is powered by a lithium battery (estimated to last 3–4 days) and plugs into the USB port of a laptop, displaying data on the screen as they are generated, rather than at the end of a run that can take hours or days.

The MinION was developed by Oxford Nanopore Technologies, a company initially formed in 1998 from the DNA-sequencing experiments performed at the University of Oxford. The device uses a tiny enzyme that can read single-stranded DNA sequences, and can be used for epidemiological studies, to detect microorganisms in the environment, or to sequence a single bacterial genome.

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