BYTE QUEST

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Byte Quest is the article published by the CSE dept of Vasavi College of Engineering regarding the latest innovative Technologies and Software that have been emerged in the competitive world. The motto of this article is to update the people regarding the improvement in technology. The article is designed by the active participation of students under the guidance of faculty coordinators.

Good ,bad or indifferent if you are not investing in new technology , you are going to be left behind.

-Philip Green

Once a new technology rolls over you, if you're not part of the steamroller, you're part of the road.

-Stewart Brand.

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NEW WI-FI SYSTEM 'HALOW' OFFERS LONGER RANGE AND USES LESS POWER .

A new Wi-Fi standard called 'Wi-Fi HaLow' has been officially announced by the Wi-Fi Alliance, promising to connect devices over longer ranges while using less power than existing Wi-Fi networks. HaLow (pronounced 'Halo') operates in the 900MHz band, whereas the wireless networks running in your home operate on either the 2.4GHz or 5GHz bands. The primary advantages of the 900MHz band are that it will enable Wi-Fi signals to travel greater distances – nearly twice the range of today's Wi-Fi, according to the Wi-Fi Alliance – while offering greater power efficiency.The low power draw of Wi-Fi HaLow – which also goes by its technical name of IEEE 802.11ah – means it

Of course, some of these kinds of devices are already available with Bluetooth, which is another popular low-power data connectivity technology. But the advantage of HaLow over Bluetooth is that HaLow devices will be able to connect directly to the Internet, whereas Bluetooth devices primarily connect to other local devices only.

- SWAPNA(2/4 CSE-A)

FIRST CAR IN BAG

Kuniako Saito, a Japanese engineer, and his team at Cocoa Motors, have created a laptop-sized personal vehicle that weighs less than seven pounds. The device, dubbed the 'WalkCar', is described as a 'car in a bag' because it can easily carried around. It's sort of like a small, four-wheeled electric skateboard meets a Segway. The device is powered by lithium batteries and comes in both indoor and outdoor models. It model,but can carry a person of upto 120 kgs.

Riders steer the WalkCar by shifting their weight from side-to-side in the direction they want to go. It can reach speeds up to 10 km per hour (6.2 miles per hour) and has a range of about 11.2 km (7 miles) after it's been charged for about 3 hours, according to the report. Cocoa motors plans to begin pre-orders in October via a Kickstarter campaign. While it's no hoverboard, it still looks pretty cool and easy to ride.

- P.HONEY(2/4 CSE-B)

THIS NEW ALGORITHM CAN TELL YOU HOW

Anybody with a smartphone knows the problem of snapping too many photos, with an itchy shutter finger quickly leading to hundreds of images that need to be sorted and culled.

But new software from researchers at the Massachusetts Institute of Technology (MIT) could help photographers curate and keep only the best images, thanks to an algorithm that can detect how memorable or forgettable they are almost as accurately as a human can.

The "MemNet" algorithm uses deep learning techniques, relying on a neural network that has learned to identify image patterns based on how memorable they are. You can try it out for yourself here by uploading your own photos or linking to images online.

The researchers schooled the algorithm in memorability recognition by feeding it a stream consisting of tens of thousands of images that had been ranked in terms of how memorable they were, based on testing with observers, which awarded each image an objective memorability score.

The collection, which at 60,000 images now stands as the world's largest image memorability dataset, was processed by the software The algorithm independently taught itself how to find patterns in (and correlations among) the photos, by analysing the images and building its own understanding of image elements associated with memorability and distinguishing them from ones ranked as forgettable.

In addition to identifying and scoring images based on their memorability, the algorithm also produces a heat map on images to indicate which parts of them are distinctly memorable.

MemNet scored 64 percent in correlating memorable images – representing a 30 percent improvement on existing algorithms – and was only narrowly beaten by the human testers, who scored 68 percent.

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