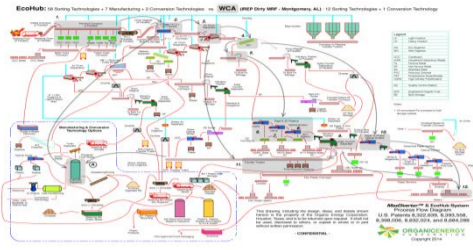


Weekly Discovery

We SHARE to inspire and ignite ideas!

15 May 2017 – 19 May 2017



Special Highlight

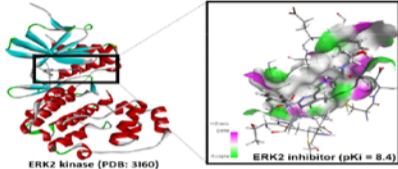
Eco-Industrial Parks

According to the Eco-industrial Park Handbook for Asian Developing Countries, Eco-Industrial Parks are a collective of manufacturing and service businesses contained within a development that collaborate with the purpose of operating in a manner that reduces harm to the environment while maximizing operations through green practises in energy, waste disposal and production operations. Many countries are developing these Eco- Industrial Parks including Singapore.

[READ MORE>](#)

ARTIFICIAL INTELLIGENCE

Molecular dynamics, machine learning create 'hyper-predictive' computer models



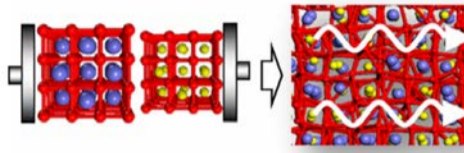
Source: Journal of Chemical Information and Modeling

Highly accurate 'hyper-predictive' models were employed for prediction of good candidates for drugs amongst chemical compounds. A process that takes 6 months now only requires 3 hours, speeding up the process of drug discovery. Read more at the [Journal of Chemical Information and Modeling](#).

Source: [Sciencedaily](#) (15 May 2017)

BATTERY TECHNOLOGY

Harnessing geometric frustration to tune batteries for greater power



A phenomenon that is able to raise the rate at which charge gets transported in a battery. Consequently, the battery will have increased power. Geometric frustration could also be employed to design zero-emission materials. Read more at [American Chemical Society](#).

Source: [Phys.org](#) (10 May 2017)

CITY DESIGN

Easy-to-assemble building kits aim to inspire new generation of architects

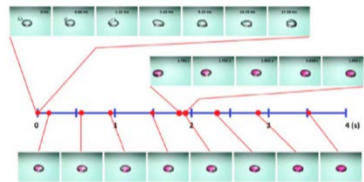


Arkit, a manufacturer for architectural model kits, has introduced 3D city-building kits, namely Arkit Cityscape and Arkit Masterplan. These city-building kits allow anyone to unleash their creativity in designing their very own cities.

Source: [Dezeen](#) (10 May 2017)

DROP DYNAMICS

Acoustic levitation of liquid drops: Dynamics, manipulation and phase transitions



This technology is gentle and is able to handle larger amounts of liquid unlike other techniques and is useful in soft matter analysis. It may improve several physical-chemical processes, including self-assembly, materials synthetics, and interactions between cells.

Source: [Advances in Colloid and Interface Science](#) (18 March 2017)

MACHINE LEARNING

If you can't beat robots then why not teach them?



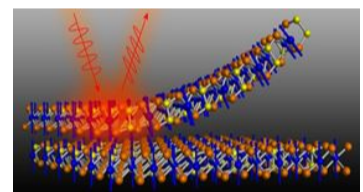
A special report by the Financial Times reported that workers having Machine Learning skills are in high demand and command higher salary.

Click on this link to create your FT login: <https://registration.ft.com/corporate/signup/EX77TifKzEVe>

Source: [Financial Times](#) (3 May 2017)

MATERIALS

Scientists discover thinnest and flattest ever magnet



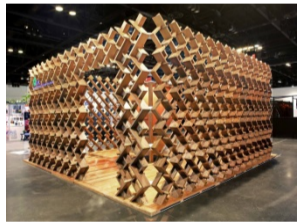
A new magnetic 2D material could create the thinnest magnet in the world. It could be applicable to a wide range of areas, such as nanoscale memory, spintronic devices and magnetic sensors.

Read more at [Nature](#).

Source: [Materials Today](#) (12 May 2017)

MODULAR WOOD STRUCTURE

Modular Meranti Pavilion Premieres at Orlando's AIA Conference



An intricate modular interlocking lattice structure which can easily be assembled without construction equipment was showcased at a recent conference in Orlando.

Source: [ArchDaily](#) (13 May 2017)

NEUROSCIENCE

Your Brain Can Only Take So Much Focus

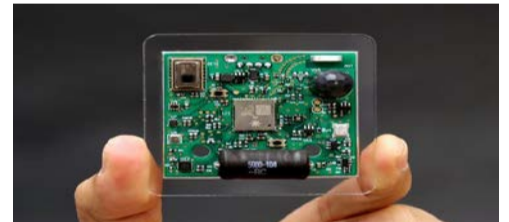


It is important to "focus" and "unfocus" our brain to optimise it and be effective and creative in our work and study.

Source: [Harvard Business Review](#) (12 May 2017)

SENSORS

This Mega-Sensor Makes the Whole Room Smart



An all-in-one compact sized device that contains sensors that monitor movement, sound, humidity, temperature, lighting and more. Watch this [video](#) to see the smart homes of the future.

Source: [MIT Technology Review](#) (10 May 2017)

SOLAR INNOVATION

Flame it on the sunshine: Thai solar chicken a hot hit

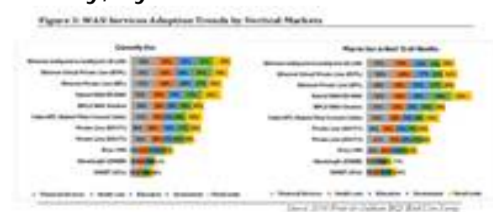


A Thai roadside vendor employs a solar reflector comprising nearly 1,000 moveable mirrors, which he designed on his own, to focus the sun's rays onto a row of marinated chickens. The chicken cooked in this way, was, according to one patron, delicious.

Source: [GMA Network](#) (14 May 2017)

WIDE AREA NETWORKS

2016 Enterprise WAN Adoption Trends: Ethernet and MPLS Usage Steady, Hybrid WAN on the Rise

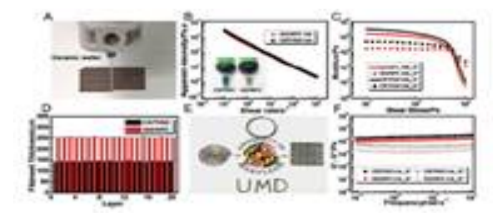


A recent survey from end-user perspective on the existing and planned adoption strategies for WAN services was compiled in this recent Frost & Sullivan report.

Source: [Frost & Sullivan](#) (13 May 2017)

3D PRINTING

3D-printed device makes clean steam



Using a 3D-printed material made of carbon nanotubes and graphene oxide, this device which is the brainchild of researchers from University of Maryland is able absorbs more than 90% of the sunlight and transform it to steam. You can read more at [Advanced Materials](#).

Source: [Nature.com](#) (15 May 2017)

