eutychus

US diplomats not Havana a great time

In 2016, US diplomats and intelligence operatives based at their recently reopened embassy in Cuba began reporting a mysterious cluster of symptoms reminiscent of concussion – headaches, memory loss, a sense of pressure in their heads, nausea, and fatigue. There was no obvious cause. Some suggested that it was sonic weapons, others that was some kind of weaponised microwaves. All blamed the Russians (because that's what you do). Then US officials posted in other parts of the world started to complain of similar clusters of symptoms in what was now being dubbed 'Havana Syndrome'. While outside influence is not ruled out, a theory that is gaining ground is that it is a form of mass psychogenic illness among US embassy staff around the world. Whatever the cause of this baffling syndrome, it was enough to deter the US Vice-President's recent visit to their Embassy in Hanoi. *The Economist*, 23 August 2021 *econ.st/3kQNeU7*

'Zero Covid' policy shuts major trade route

For two weeks in mid-August, global trade routes through Asia faced significant disruption as the third biggest port in China, Ningbo, was partially closed after a single dockworker tested positive for Covid. China's policy is to keep China totally Covid free, a policy that many in the region are abandoning in the face of the Covid delta variant's very high infectivity. The result has been a significant hold up in global trade that may have longer-term effects, especially if such closures happen again. The difference between 'Zero Covid', and a policy driven by mass vaccination will become apparent over the coming months. *Forbes* 14 August 2021 *bit.ly/3j.JlgtO*

A not so big hand for the latest in prosthetics

A bionic limb that looks and feels human and is practical and easy to use? Well, we may not be there yet, but for the millions who have lost a hand or arm, that dream may be one step closer. Gu Guoying and his team at Shanghai Jiao Tong University have developed a powered, articulated hand that responds to brain signals and sends sensory feedback. It is lighter than all current alternatives (and even lighter than many real hands at under 300g) and runs on pneumatics. You do still need to wear an external pack to run it, but this is the least bulky and difficult bionic limb to date. And you won't need six million dollars - the model costs a mere \$500 compared to the \$10,000 for most alternatives. *The Economist*, 21 August 2021, *econ.st/2VyMASw*

Sharpen up with tea

In recent years, the UK has become famous for its creative output - in TV, films, music, and literature. It turns out our national obsession with boiling the leaves of *Camellia sinensis*, and drinking the infusion many times a day, may be the source of this creativity. Researchers at Peking University found that it does not seem to be caffeine (or tea's unique stimulant, theanine), but the act of making and drinking tea that released creativity and focused the mind. So, the next time you need to clear out the cobwebs and focus, making a cuppa, caffeinated or otherwise, really might be what you need. *The Times*, 15 August 2021, *bit.ly/3A6EXSg*

It's a bug's life...

We may be used to the idea that dogs (and even some humans) can smell diseases before they present clinically, but it now transpires that insects may be the next diagnostic breakthrough. Giovanni Galizia of the University of Konstanz, in Germany has been using genetically modified fruit flies to detect breast cancer from urine samples. Hirotsu Takaaki, of Kyushu University, in Japan, has been using worms to detect up 15 types of cancer using blood and urine samples. Meanwhile Aria Samimi in the Netherlands has been using bees to detect COVID-19. Could the future of diagnostics rely on some of the smallest creatures God put on the earth? Time will tell, as all these approaches are still experimental and have yet to have any regulatory approval. *The Economist*, 31 July 2021, *econ.st/3A0Cngl*

Resisting the return to the office

While pregnant women are at no greater risk of COVID-19 than anyone else, a Covid infection can cause pregnancy complications. The Royal College of Obstetricians and Gynaecologists recommend that employers recognise this as the demand to return to office work mounts. Many mothers and mothers-to-be have discovered the benefits of home working and have begun to resign as employers increasingly demand a full return to the office with few options for flexible working. Family life and safety have become higher priorities for many during lockdown, both women and men. The traditional workplace, with the lengthy commute and the costs and hassles of school runs and childcare, are making the traditional workplace increasingly unattractive for women in particular in the post-Covid world of work. *The Guardian*, 4 September 2021, *bit.ly/3I7C25w*

Cancer vaccines are almost here

Before COVID-19, the team at Oxford University was working on cancer vaccines. That work is now moving forward again and is about to move to human trials on non-small cell lung cancer. Animal studies have shown that using viral vectors to carry genetic information to trigger an immune response against cancer cells has a significant impact in slowing tumour growth or shrinking cancers. In combination with anti-PD-1 immunotherapy, which triggers anti-tumour T-cells, this approach could revolutionise cancer treatment in the coming decade. *The Times*, 3 September 2021, *bit.ly/3E9drWw*

Climate friendly labour

Entonox has been the friend of many a woman in labour for decades. However, the nitrous oxide that is its active ingredient is also a powerful greenhouse gas. An NHS trust can contribute the equivalent of 3,000 tonnes of CO_2 in the exhaled nitrous oxide from a labour ward over a year. A new device, called a Mobile Destruction Unit (MDU), collects, and destroys the nitrous oxide exhaled by the user. It's been used in Sweden for a while but is now being trialled at the Newcastle Birthing Centre here in the UK. Expect to see more and more labour units across the UK declaring their lowered carbon footprint in the years to come! *BBC News Online*, 10 September 2021, *bbc.in/3npzDpw*