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Massive decline in flu cases during Australia's lockdown

Alice Klein

MEASURES designed to stop the spread of the coronavirus in Australia seem to also be suppressing flu in the country.

Australia's flu season normally peaks during its winter months, from June to August. But cases often start to build around January, as travellers from the northern hemisphere bring the virus into the country.

This year, Australia had 6962 laboratory-confirmed cases of flu in January and 7161 in February. However, detected cases have since nosedived, with 5884 recorded in March and only 229 in April, compared with 18,705 in April 2019. This is despite more flu testing being conducted this year.

Australia's FluTracking surveillance system, which surveys about 70,000 people each week and records their flu-like symptoms, shows that in the week ending 26 April, only 0.2 per cent of Australians had symptoms. This figure was 1.4 per cent at the same time last year.

The sharp fall in cases is probably due to Australia's decision to



control the spread of covid-19 by banning non-essential gatherings of more than 500 people from 16 March and then to shut its borders on 20 March, says Robert Booy at the University of Sydney. "We're not importing any flu and anything that stops close contact with others is going to make it harder for the influenza virus to transmit," he says.

On 23 March, non-essential businesses such as pubs, gyms, restaurants and cinemas were forced to close. Additionally, in mid-March, states and territories began encouraging remote learning where possible. This is probably another reason why flu cases are down, says Kirsty Short at the University of Queensland.

These measures also meant Australia reported 20 or fewer new covid-19 cases each day in the week up to 1 May. If the measures are kept in place, flu cases should continue to be suppressed too, says Booy. "That could mean we see fewer deaths

Sydney beaches that were closed due to social distancing are now open

from respiratory infections overall this year," he says. Covid-19 deaths in Australia have been relatively low at 95 up to 4 May. Between 1500 and 3000 Australians die of flu in a normal year.

But even if the restrictions are eased, we could still see a reduction in flu cases due to behavioural changes, says Short. "People are washing their hands more and instead of having the attitude that they can still go to work if they're sick, they now know to stay home if they have respiratory symptoms," she says.

More people than usual have been vaccinated against flu this year, which may bring cases down as well, says Short. But they may rise again when students return to school, she says. Some studies suggest school-aged children transmit the coronavirus less. "But we know that children are a hotbed of influenza infection," says Short. "It will be interesting to see what happens."

Sleep

How the coronavirus crisis is affecting your dreams

CHANGES in sleep patterns caused by the pandemic could mean that many of us are dreaming more or remembering more of the dreams we have, and the threat of the coronavirus may have affected the nature of the dreams themselves.

According to a survey conducted by a team at King's College London, 62 per cent of people in the UK are getting as much sleep, if not more, than before stricter social distancing measures began on 23 March. Similar patterns are likely in other countries, and it is reasonable to assume that for some of those staying at home, the time saved from getting ready for work and commuting is being used to get more sleep. This means dream time and dream recall is probably increasing during the crisis, says Mark Blagrove at Swansea University, UK.

When you sleep for longer, you have more rapid eye movement (REM) sleep. This is the sleep stage from which most dreams are recalled. Modern life, however, typically involves shortened sleep.

That may now be changing for some. "Lack of work schedules may be allowing individuals to wake up without an alarm clock," says Blagrove.

At the same time, anxiety can disrupt our sleep, leading to more awakenings. When you wake from REM sleep, you are much more likely to remember the dream you were having. The content and tone of our

62% of people in the UK are getting as much sleep, or more, than before dreams is also probably being affected. "Our dreams are more likely to incorporate memories from recent waking life that are emotional," says Blagrove.

"Dreams are thought to be the brain's way of working out our emotional problems, and the more anxious we become, the more vivid the dream images become," says Russell Foster at the University of Oxford.

"Don't worry about your dreams," he says. "Take comfort in the fact that your brain is doing what it should be doing." Rowan Hooper