

# News Items

A compendium of pest management news items from the media relevant to FAOPMA member countries

Compiled by Stephen L. Doggett and David Lilly

## USING DEAD RATS TO SMUGGLE CONTRABAND INTO PRISON!

Dead rats have been used by criminal gangs to smuggle drugs, phones, and other contraband into Dorset Prison in the UK. The items were sown into the rats and then thrown over the perimeter fence. Perhaps the most disappointing aspect of the article was that it failed to mention the species used!

Source: *The Guardian* (25/Mar/2019), [www.theguardian.com/society/2019/mar/25/gangs-using-dead-rats-smuggle-drugs-uk-prisons?CMP=Share\\_iOSApp\\_Other](http://www.theguardian.com/society/2019/mar/25/gangs-using-dead-rats-smuggle-drugs-uk-prisons?CMP=Share_iOSApp_Other)

## BANGLADESH: HOW NOT TO FOG FOR MOSQUITOES!

A story below mentions of a major mosquito problem at Dhaka International airport. The issue has been so bad that planes have been delayed departure with cabins becoming full of mosquitoes. The image in the following link will give you an idea of just how bad the mosquitoes are:

[www.thedailystar.net/city/high-court-question-authorities-failure-curb-mosquito-menace-at-dhaka-airport-1714033](http://www.thedailystar.net/city/high-court-question-authorities-failure-curb-mosquito-menace-at-dhaka-airport-1714033)

In response to the problem, the local authorities posted on Facebook a video of them fogging mosquitoes. Try and count how many things that are wrong with this process!

<https://www.facebook.com/dncc.gov.bd/videos/1701736219847588/>

Here are a list of our observations of the issues here:

- the area was not cleared of people prior to commencement of spray.
- the spraying was not stopped when people were obviously going to be directly sprayed (see the two security guards at the start of the video coping a face full.
- inappropriate personal protective equipment. A cloth over the face offers no protection against gaseous

vapours. A half or full face respirator is required, with the appropriate charcoal filters. Likewise operators should be appropriately attired with protection clothing.

- spraying above plants (the fog should be sprayed at the base of the plant).
- inadequate coverage (note how only the closest bushes receive any treatment).
- spraying into thin air (no mosquitoes there, complete waste of chemicals).
- spraying during the day (it is clear that convection currents are causing the chemical to rise, rather than float and spread at ground level, this immediately should have put a halt to the treatment).
- unnecessary personal involved (during chemical applications only those personnel directly involved in the treatment should be present).

Clearly there was a political imperative to do the treatment and filming was undertaken for the cameras to show that something was being done. However, no consideration was considered regarding the quality of the treatment. Improper spraying can lead to non-target impacts, increases the risk of insecticide resistance development, and can lead to other unintended consequences. Such 'displays' must be soundly condemned.

## ASIA/PACIFIC: DENGUE UPDATE

*Sri Lanka*: 8,900 cases in the first two months of 2019.

*India*: Dengue cases rise four fold.

*Vietnam*: 3,275 cases in Khanh Hoa Province for this year.

*Indonesia*: 2,282 cases and one death.

*Malaysia*: 28,580 cases and 49 deaths up to 9/Mar/2019.

*Cambodia*: >1,000 cases in 2019.

*Thailand*: almost 10,000 cases this year.

*Philippines*: 40,614 cases up to 14/Mar/2019. This is 68% higher than last year for the same period.

*Reunion*: 179 dengue cases in one week up to late

February.

Source: *Promed Digest* (17/Mar/2019), Vol. 81(46).

### AUSTRALIA: BARMAN FOREST VIRUS OUTBREAK IN TASMANIA

Barmah Forest virus (BFV) is a mosquito-borne disease spread by various species of mosquitoes throughout Australia. While it is present on mainland Australia, the first local cases of transmission in Tasmania have been reported, with some five cases notified (note an outbreak is defined as 'more than usual', thus one case can be an outbreak if there are normally none). The cases have occurred from the eastern areas of the state and the most probable vector is *Aedes camptorhynchus*, the southern saltmarsh mosquito (SLD: BFV causes rashes, fevers, muscle and joint pain, and is non-fatal. Every year there are around 1,000 cases annually. I have published quite extensively on this virus and these papers can be obtained from my ResearchGate page; search on my name).

Source: *Promed Digest* (17/Mar/2019), Vol. 81(44).

### AUSTRALIA: MAGGOTS FOUND IN HEAD WOUND IN ELDERLY RESIDENT

An elderly patient at an aged care facility in NSW has been found with live maggots in a wound in their head. Unfortunately, the same facility where the patient lives has come under scrutiny over several issues relating to patient care. The patient is now receiving treatment (SLD: the infestation of wounds, called 'myiasis' is not all that uncommon and can occur in post-operative wounds if flies can enter the medical facility. Understandably, hospitals tend to keep such occurrences very quiet!)

Source: *ABC News* (12/Mar/2019), <https://www.abc.net.au/news/2019-03-12/maggots-found-in-residents-head-wound-at-bupa-facility/10893240>

### BANGLADESH: MOSQUITO CONTROL NEGLIGENCE AT DHAKA AIRPORT

The High Court of Bangladesh has raised questions about the negligence of the authorities at Dhaka airport to manage their inherent mosquito problem. The Court sought reasons why the negligence would not be declared illegal (SLD: under the World Health Organization, countries have an obligation to ensure that mosquito breeding at ports is minimised to prevent spread to other countries.)

Source: *DhakaTribune* (12/Mar/2019), [www.dhakatribune.com/bangladesh/court/2019/03/12/hc-questions-authorities-negligence-to-curb-mosquito-menace-at-dhaka-airport](http://www.dhakatribune.com/bangladesh/court/2019/03/12/hc-questions-authorities-negligence-to-curb-mosquito-menace-at-dhaka-airport)

### INDIA: KINGFISHER STUCK IN RODENT TRAPS

A white-throated kingfisher was found in Mumbai stuck in a glue trap used for capturing rodents. A wildlife veterinarian spent more than two hours freeing the bird ensuring that it was not harmed in the process. Local animal activists say that it is not uncommon for small mammals and birds to be captured and subsequently die in glue traps. (SLD: with stories like this, it is completely

understandable why so many animal right groups wish to have glue traps banned. Pest Control Operators have a professional duty to ensure such devices are placed where wildlife can never come in contact with the traps. I find it astonishing that people can be so careless in the placement of rodent glue traps and such recklessness with expedite the demise of this type of trap.)

Source: *The Times of India* (12/Mar/2019), <https://timesofindia.indiatimes.com/city/mumbai/kingfisher-stuck-in-glue-pad-for-rats-freed-after-2-hour-effort/articleshow/68367818.cms>

### CHINA: 40 DEAD COCKROACHES IN A TAKEAWAY MEAL!!!

A woman in China ordered a meal from an online food delivery service provider and noticed a dead cockroach in the meal. She then carefully went through the dish and found it had a whole stack of friends – some 40 cockroaches in total. You can watch a video of her in the link below, picking out all the cockroaches and placing them onto paper towel. The cockroaches were largely hidden by the similar colour of the meal. The local Food and Drug Administration were notified and currently investigating the incident.

Source: *LatestLY* (11/Mar/2019), <https://www.latestly.com/social-viral/chinese-woman-finds-40-dead-cockroaches-in-her-takeaway-meal-watch-disgusting-video-687517.html>

### TAIWAN: RATTUS SOUPUS

A diner from Hsinchu City in Taiwan was feasting on a bowl of mutton hot pot when he found a dead rat floating in his dinner. He took several images which were posted to social media. The restaurant concerned refunded his meal of rat, but provided no further compensation.

Source: *Lad Bible* (11/Mar/2019), <http://www.ladbible.com/news/food-man-shocked-to-find-dead-rodent-floating-in-his-stew-20190311>

### AUSTRALIA: YELLOW CRAZY ANT

The Yellow Crazy Ant (*Anoplolepis gracilipes*) has been identified in northern NSW, around Lismore and the Terania Creek area. Now the Department of Primary Industry is undertaking a surveillance blitz of the area with plans to inspect over 600 properties. The Yellow Crazy Ant are considered a serious environmental pest.

Source: *Echo Daily* (21/Feb/2019), [www.echo.net.au/2019/02/yellow-crazy-ant-blitz-in-lismore/](http://www.echo.net.au/2019/02/yellow-crazy-ant-blitz-in-lismore/)

### INDIA: RODENTS ON TRAINS IN AGRA

Rodents are a major issue on trains in the region of Agra in central northern India. One woman while waiting in a first class lounge looked down to find a rat as 'fat as a rabbit' feasting on her sandwich. In the past, an engineer had his fingers nibbled on by a rat and other guests have been bitten. Rats also chew on wires and cables, and can do serious damage to infrastructure. Thus the local railway authority is instituted a new rodent control program.

Source: *Times of India* (5/Mar/2019), <https://timesofindia.indiatimes.com/city/agra/rodents-pests-bleeding-railway-coffers-agra-div-alone-to-spend-rs-24-lakh-for-pest-control/articleshow/68260393.cms>

### CHINA: LIVE COCKROACH PULLED OUT OF GIRLS EAR

A 17 year old girl in China experienced pain in her ear. Upon medical inspection, doctors pulled a live cockroach out of her ear canal. It is thought that the cockroach may have entered to feast on her ear wax (SLD: can cockroaches get any more disgusting?)

Source: *Daily Mail* (5/Mar/2019), <https://www.dailymail.co.uk/news/article-6769261/Girl-17-live-cockroach-pulled-ear-crawled-asleep.html>

### SINGAPORE: RATTY RICE

The government body, the Agri-Food and Veterinary Authority, is investigating an incident of a dead rat being found within a bag of basmati rice. The rice is packed in India and the product has been recalled pending investigation.

Source: *Channel NewsAsia* (4/Mar/2019), <https://www.channelnewsasia.com/news/singapore/ava-investigating-dead-rat-rice-sheng-siong-11307282>

### TAIWAN: NEW TERMITE SPECIES FOUND

A new species of termite has been discovered in Taiwan, the first to be found and named by local scientists. A/Prof. Li Hou-feng and Liang Wei-ren, from the National Chung Hsing University, found the termite feeding on tree trunks in the east of the island nation. The termite was named *Stylotermes halumicus* after a local term 'halum', which means pangolin.

Source: *Focus Taiwan* (1/Mar/2019), <http://focustaiwan.tw/news/aedu/201903010012.aspx>

### INDIA: KYANSANUR FOREST UPDATE

With a public inquest relating to the latest outbreak Kyansanur Forest disease (KFD), the court has been told that 8 people have died this year and some 189 tested positive Shivamogga, Uttara Kannada, and Chikkamagaluru districts. Questions have been raised regarding the adequate supply of the vaccine to people in the region.

Source: *Promed* (1/Mar/2019), Vol. 81(4).

### TICK BITE RESULTS IN ALLERGY TO EATING MEAT

Mammalian Meat Allergy (MMA) is a condition whereby a person can develop an allergy to the consumption of meat following the bite of certain tick species. Basically the tick injects a carbohydrate called 'alpha-gal', which was thought to have come from a previous blood meal from some animal host. In the latest research, it appears that a tick can induce MMA without feeding on an animal. (SLD: MMA was first described from Australia by the immunologist, A/Prof. Sheryl van Nunen who noticed a link in patients with unexplained anaphylaxis and what they had recently eaten. The one thing in common with all the patients is that they had been bitten by a tick.

Now there has been more than 800 cases described from Australia alone, which is the global hot spot for MMA. A/Prof. Nunen established a committee called 'TiARA' to raise the awareness of this condition and the allergies caused by ticks. The web site, [www.tiara.org.au](http://www.tiara.org.au), contains a lot of information on the condition for patients).

Source: *US News* (27/Feb/2019), [www.usnews.com/news/health-news/articles/2019-02-27/tick-bites-more-likely-to-cause-red-meat-allergy-than-thought](http://www.usnews.com/news/health-news/articles/2019-02-27/tick-bites-more-likely-to-cause-red-meat-allergy-than-thought)

### FAT RAT SAVED

While most of us in the pest management have the task of removing rats, (permanently), recently a group of people were tasked to save the life of a very fat rat. A young girl in Bensheim, Germany, found a rat trapped in a sewer cover. The rodent had become fat during the winter months while running around the sewers and in trying to get out through the cover, became firmly wedged in the lid. A rescue team of eight were called in to save the furry beast and it was released unharmed.

Source: *ABC* (27/Feb/2019), <https://www.abc.net.au/news/2019-02-27/rat-saved-from-manhole-by-german-animal-rescuers/10852558>

### INDONESIA: WORLD'S LARGEST BEE DISCOVERED (AGAIN!)

The world's largest bee, known as Wallace's giant bee (*Megachile pluto*) after the famous ecologist who first described it, has been rediscovered after not being seen for almost four decades. Now this bee is large; it has a wing span of 6cm and a body length of around 4cm. Plus it has a massive set of jaws and is described a "flying bulldog". It uses the jaws to dig into termite mounds where the bee makes its nest. Currently this species is listed as "vulnerable to extinction" by the International Union for Conservation of Nature. Sadly there are no restrictions on the trade of this bee, which could facilitate its extinction.

Source: *BBC News* (22/Feb/2019), [www.bbc.com/news/science-environment-47311186](http://www.bbc.com/news/science-environment-47311186)

### BED BUGS: HOW NOT TO RESPOND WHEN YOUR CUSTOMER IS BITTEN

A couple spent UK£3,000 on a holiday to a five star resort in Cape Verde, a small island group of the coast of west Africa. While staying at the resort, the couple received horrendous bites from what they claimed were bed bugs and shared their bite reactions on social media. They were forced to sleep fully clothed to avoid further bites. Following lodging a complaint, the travel agency stated in a written reply that "Insects are an inevitable product of hotter climates" (SLD: this is a dreadful response to a serious situation and totally inadequate. I can understand the couple sharing their plight on social media.)

Source: *Daily Mail* (22/Feb/2019), [https://www.dailymail.co.uk/travel/travel\\_news/article-6729557/Holidaymaker-shares-photos-bed-bug-horror-3k-Cape-Verde-Tui-trip.html#newcomment](https://www.dailymail.co.uk/travel/travel_news/article-6729557/Holidaymaker-shares-photos-bed-bug-horror-3k-Cape-Verde-Tui-trip.html#newcomment)

### AUSTRALIA: A RODENT BECOMES THE FIRST CLIMATE CHANGE EXTINCTION

An Australian rodent, *Melomys rubicola*, is believed the first species to have become extinct due to human induced climate change. The species was only found on a small island in the Torres Strait known as Bramble Cay. The island measuring only around 50x100m is off the coast of Papua New Guinea underwent a storm surge, which believed to have drowned the remaining population. The report states that the root cause of the extinction was sea level rise associated with global warming. Sadly, neither the Queensland or Australian governments did anything to support the saving of this species.

Source: ABC (20/Feb/2019), [www.abc.net.au/triplej/programs/hack/bramble-cay-melomys-first-climate-change-mammal-extinction/10830080](http://www.abc.net.au/triplej/programs/hack/bramble-cay-melomys-first-climate-change-mammal-extinction/10830080)

### INDIA: REFRIGERATOR DRIP PANS PRODUCE MANY MOSQUITOES

In a survey undertaken by the Municipal Corporation of Gurugram, the drip pans of refrigerators were found to produce more mosquitoes than other sites within the home. One in three houses were identified with mosquito infested drip pans during the survey.

Source: *The Times of India* (17/Feb/2019), <https://timesofindia.indiatimes.com/city/gurgaon/fridges-drip-pan-a-mosquito-breeding-hotspot-in-households-finds-mcg-survey/articleshow/68029608.cms>

### DENGUE UPDATE, 17/FEB/2019

*Sri Lanka*: there has been 2 deaths and over 3,740 cases in the first three weeks of January.

*Nepal*: one case in Kathmandu was reported.

*Pakistan*: 166 cases have been reported since 1/Jan/2019.

*India*: 70 people have been tested positive for dengue virus in Pune.

*Indonesia*: there have been 176 deaths and 16,692 cases for 2019, with East Java having the highest numbers (3,074 cases and 52 deaths), up until 7/Feb.

*Malaysia*: 973 cases and 2 deaths.

*Philippines*: 2,132 cases and 26 deaths.

*Taiwan*: the first local case for three years was reported.

*Maldives*: 107 cases of dengue reported with 16 from the capital Male.

*New Caledonia*: 319 cases reported for 2019.

*Palau*: 77 cases for this year.

Source: *Promed Digest* (17/Feb/2019), Vol. 80(55).

### RAT ERADICATION PROGRAM ON SOUTH GEORGIA ISLANDS SUCCESSFUL

On South Georgia Islands in the southern Atlantic, rats were introduced onto the island by whaling vessels some 250 years ago. The result was devastating for the natural bird life of the islands. A ten year rat eradication program costing USD\$14million involved rat poison being dropped from helicopters have proved successful. The island has been declared rat-free as of last year. This has ensured the island has once again become a haven for birds and it is

estimated that the bird life will triple in the next few years

Source: *CBC News* (12/Feb/2019), [www.cbc.ca/news/canada/calgary/brian-keating-king-penguin-colonies-south-georgia-island-archipelago-1.5016192](http://www.cbc.ca/news/canada/calgary/brian-keating-king-penguin-colonies-south-georgia-island-archipelago-1.5016192)

### AUSTRALIA: ANT INFESTATIONS PLAGUE GOLD COAST

In the northern sections of the Gold Coast in southeast Queensland, Australia, residents are being plagued by ants. Some are saying that they can only stay outdoors for a couple of minutes before being attacked. Furthermore, they are coming indoors covering food surfaces and even eating glues in shoes. One local said that she cannot even leave her eight week old unattended for fear of attack.

A local pest controller is saying that the lack of rain is forcing ants indoors to seek food and water

Source: *Gold Coast Bulletin* (13/Feb/2019), [www.goldcoastbulletin.com.au/news/sun-community/ant-infestation-plagues-northern-gold-coast-homes/news-story/046137b3aee649f314f7b8fa37aadf4a](http://www.goldcoastbulletin.com.au/news/sun-community/ant-infestation-plagues-northern-gold-coast-homes/news-story/046137b3aee649f314f7b8fa37aadf4a)

### SOUTH PACIFIC: ZIKA AND DENGUE VIRUSES IN HORSES

Both dengue and Zika viruses are endemic to many South Pacific islands. Researchers have now found that horses in the region are regularly infected with these viruses. As to if horses play a role in the spread of these viruses have yet to be ascertained.

Source: *ProMed-ahead Digest* (13/Feb/2019), Vol. 79(26).

### SINGAPORE: TWO DENGUE DEATHS IN THE FIRST SIX WEEKS OF 2019

Already for 2019, there have been two deaths attributed to the mosquito-borne disease, dengue. Both cases were residents in their 70's and they lived close to Paya Lebar air base, in the north east of Singapore. National Environmental Officers have conducted mosquito control operations in the area. In 2018, there were 3,285 dengue cases in Singapore, as 20 per rise upon the previous year, with five deaths.

Source: *The Independent* (12/Feb/2019), <http://theindependent.sg/take-mosquitoes-seriously-two-deaths-in-first-six-weeks-of-year/>

### MALAYSIA & SINGAPORE: BED BUGS ON BUS

A Malaysian girl recently took a bus from her hometown of Taiping to Singapore and suffered multiple painful bites, with some of them developing into blisters (bullous eruptions), which required medical treatment. Bed bugs were blamed as the cause and the insects were suspected of hiding in the seats. According to the report, the bus line, Starmart, has been the subject of several bed bug complaints in the past (SLD: bed bugs in mass transport is a growing issue and there are multiple reports of these insects occurring on ships, aircraft, trains, as well as buses).

Source: *World of Buzz* (12/Feb/2019), [www.worldofbuzz.com/msian-suffers-painful-blisters-rashes-from-bed-bugs-after-taking-bus-ride-to-singapore/](http://www.worldofbuzz.com/msian-suffers-painful-blisters-rashes-from-bed-bugs-after-taking-bus-ride-to-singapore/)

**MAGGOT MASSES DEVOUR MONSTER MEALS**

Maggots (fly larvae) working together can rapidly devour foods. For example, they can eat an entire pizza in two hours (see video in link below). It has now been suggested that perhaps maggots can be employed as waste disposal units to help rid the world of rubbish (SLD: sadly the report did not say what would be done with the mass of adults flies that emerged!)

Source: *ABC News* (12/Feb/2019), <https://www.abc.net.au/news/2019-02-12/maggot-fountain-eat-pizza-two-hours-feeding-structure/10803048>

**BUG COLLECTING BARBIE!**

Famous toy maker, Mattel, has now introduced a new figure in the range of dolls; Entomologist Barbie. She comes complete with a range of insects. This new Barbie is the result of the collaboration with National Geographic such that a range of intellectual Barbies have now been produced. This has included astrophysicist Barbie, marine biologist Barbie, and wildlife conservationist Barbie (SLD: who said blondes are dumb?). Mattel has been highly criticised over the Barbie range, with feminist groups stating that these blond dolls are stereotypical and unrealistic, as they portray some unobtainable ideal of the female form. It is true that entomologist Barbie does not reflect a real insect worker; she is not covered in mud or have bed bugs and cockroaches crawling all over her (as you do in such infestations). Plus pink is probably not the ideal colour to wear into the field.

Source: *The Guardian* (12/Feb/2019), <https://www.theguardian.com/commentisfree/2019/feb/11/meet-entomologist-barbie-still-white-pink-and-unattainably-thin>

**MYANMAR: NEW MOSQUITO FROM FOSSIL RECORD**

A new mosquito found preserved in amber dating back some 100 million years has been found in Myanmar. The species named *Priscoculex burmanicus*, is thought to be related to the Anophelines mosquitoes, which are the vectors of malaria. Whether or not malaria existed back then is the subject of debate.

Source: *ScienceDaily* (11/Feb/2019), [www.sciencedaily.com/releases/2019/02/190211163959.htm](http://www.sciencedaily.com/releases/2019/02/190211163959.htm)

**COCKROACH EXHIBITION**

If you are happening to be travelling to Europe anytime soon, you may wish to visit the historic city of Dubrovnik in Croatia. The Croatian Natural History Museum has a cockroach exhibition running until 6/May/2019. For Game of Thrones fans, the museum is next to the famous stairs where Cersei Lannister was forced to stroll naked in the famous 'walk of atonement' scene.

Source: *Total Croatia News* (10/Feb/2019), [www.total-croatia-news.com/travel/34069-cockroach-exhibition-dubrovnik-natural-history-museum](http://www.total-croatia-news.com/travel/34069-cockroach-exhibition-dubrovnik-natural-history-museum)

**MCMOUSESHAKE?**

A man in Ohio, USA, claims that McDonalds served him a milkshake containing a live mouse. He is now seeking USD\$100,000 in damages. The owner of the branch is stating that the claim is 'wildly fabricated and false' (SLD: it is hard to imagine that a food server would not have noticed a mouse within a cup.)

Source: *New Zealand Herald* (9/Feb/2019), [www.nzherald.co.nz/business/news/article.cfm?c\\_id=3&objectid=12202313](http://www.nzherald.co.nz/business/news/article.cfm?c_id=3&objectid=12202313)



The new Entomologist Barbie. Will we soon see Pest Manager Barbie, such as Termite Barbie? Rodent Barbie? Cockroach Barbie? Bed Bug Barbie has a certain ring to it!

## DIET DRUGS TO STOP MOSQUITOES DESIRE FOR BLOOD

After a mosquito blood feeds, they will not bite again until after they lay their eggs. A group of researchers asked the question, could they use continue to suppress this non-feeding behaviour by using the insects' own chemicals. Various molecules called 'neuropeptides' are involved in this feeding inhibition and so the researchers fed the mosquitoes on these chemicals. Indeed it did work, and mosquitoes failed to feed for two days. The challenge will be how to get mosquitoes in the wild to feed on the chemicals, however if blood feeding was suppressed for only a short period, this could significantly reduce the risk of mosquito-borne diseases.

Source: *Nature* (7/Feb/2019), [www.nature.com/articles/d41586-019-00511-4](http://www.nature.com/articles/d41586-019-00511-4)

## AUSTRALIA: COCKROACH INVASION

In Adelaide, South Australia, there are reports of a major invasion of cockroaches into homes. This is being blamed on the heatwave, with extremes in temperature and low rainfall, with no precipitation recorded for 50 days. As a consequence, the cockroaches are entering homes to find a cool refuge. The main species people are seeing is the American cockroach, *Periplaneta americana* (SLD: another unexpected consequence of climate change?)

Source: *The Advertiser* (7/Feb/2019), [www.adelaidenow.com.au/news/south-australia/sas-breaking-news-blog-the-pulse-adelaides-dry-spell-officially-enters-50th-day-almost-no-chance-of-rain-on-friday/live-coverage/d86575c01fa827a44781d639614a7eb7](http://www.adelaidenow.com.au/news/south-australia/sas-breaking-news-blog-the-pulse-adelaides-dry-spell-officially-enters-50th-day-almost-no-chance-of-rain-on-friday/live-coverage/d86575c01fa827a44781d639614a7eb7)

## MALAYSIA: RATS IN HOSPITAL CANTEEN

The Health Department in Johor has forced the canteen in Sultan Ismail Hospital to close down for two weeks after images of a rat on food trays was spread on social media. According to the report, the canteen failed to follow legislative guidelines under the Food Act.

Source: *The Star Online* (7/Feb/2019), [www.thestar.com.my/news/nation/2019/02/07/rat-sighting-shuts-hospital-canteen-johor-health-dept-orders-hsi-eatery-closed-for-two-weeks-after-p/](http://www.thestar.com.my/news/nation/2019/02/07/rat-sighting-shuts-hospital-canteen-johor-health-dept-orders-hsi-eatery-closed-for-two-weeks-after-p/)

## BED BUGS AND CINEMAS

Ever since the first cinemas opened in the early 1900s, bed bugs have invaded these sites. People bring in bags, which may be infested with bed bugs, and human turnover is high. Furthermore, cinemas are dimly lit, making bed bugs hard to see. As the bite reaction is often not immediate, people may not link their allergic spots to bed bugs in the cinema they visited a few days previously. More indications of bed bugs in cinemas have emerged, with reports from the US and Luxembourg. In response to the latter, the art house cinema, Cinémathèque in Luxembourg, shut down for three months during the treatment process. In the future, bed bug detection dogs will be used to inspect bed bugs on a monthly basis (SLD: bed bugs in cinemas are a real nightmare and I have been involved in several cases. Infestations tend to take a long time to be recognised, and by that stage, have

spread widely from the original seat. Sanitation tends to be poor; underneath seats you find a mass of popcorn, rubbish, and loose change. The sites are very dimly lit and so artificial lighting is necessary. Often seats need to be completely dismantled and surface sterilised with steam, or even fumigated. The whole process is time consuming and expensive, and control costs approaching USD\$10,000/theatre are not uncommon. Thus it is easy to understand how the Luxembourg cinema was closed for three months.)

Source: *Luxembourg Times* (8/Feb/2019), <https://luxtimes.lu/culture-life/36433-cin-math-que-reopens-after-bedbug-infestation> and *Datebook* (7/Feb/2019), <https://datebook.sfchronicle.com/movies-tv/the-last-picture-show-amc-van-ness-to-close-immediately>

## AUSTRALIA: CONCERNS OVER FIRE ANT PROGRAM

Following a series of complaints, a public education session was held over the fire ant eradication program in southeast Queensland and hosted by Biosecurity Queensland. Many landowners considered that the meeting was just political double speak and they were 'fobbed' off by the officials present. The concern is around the baits being used and that some of the organic farmers may lose their organic certification. In contrast, Biosecurity Queensland claims there has been a lot of public consultation and most of the concerns are being addressed (SLD: while sympathy can be had for organic farmers, fire ants pose a national biosecurity risk and they must be eradicated at all costs. Hopefully governments can adequately compensate any of the farmers affected.)

Source: *Star* (7/Feb/2019), [www.gattonstar.com.au/news/fire-ant-program-info-session-leaves-questions-una/3642288/](http://www.gattonstar.com.au/news/fire-ant-program-info-session-leaves-questions-una/3642288/)

## AUSTRALIA: ZIKA-RESISTANT MOSQUITOES DEVELOPED

Scientists from Australia and the US have engineered a mosquito that will resist spreading Zika virus. Potentially, this strain of *Aedes aegypti*, could be used to displace the native type that can spread the virus. To achieve this, the researchers injected an anti-Zika gene into the developing embryos of the mosquitoes, along with a gene that produces red eyes, so that the modified mosquitoes could be distinguished (SLD: Zika virus occurs in many parts of the world where *Aedes aegypti* occurs, including Asia. The virus became particularly prominent following a major epidemic in Brazil during 2015 whereby many babies were born with birth defects such as microcephaly, as a result of the pregnant mother becoming infected with the virus).

Source: *scimex* (6/Feb/2019), [www.scimex.org/newsfeed/scientists-develop-zika-resistant-mosquitoes](http://www.scimex.org/newsfeed/scientists-develop-zika-resistant-mosquitoes)

## WISH TO AVOID MOSQUITOES? PAINT YOUR WALLS WITH AN ANTI-MOSQUITO PAINT!

Launched late last year, is an anti-mosquito paint from the company Plascon. This is not designed to repel mosquitoes, but to kill them on contact. The paint contains the pyrethroid, permethrin, and the

manufacturer claims efficacy for two years. It is to be used indoors against malaria mosquitoes (SLD: considering that insecticide resistance to the pyrethroids is so widespread, including in the regions where this product is being sold, notably Africa, it is hard to imagine that efficacy will be high. Interestingly, the manufacturer fails to discuss the issue of resistance in their product spiels. Note also that paints incorporating insecticides have been around for some time.)

Source: *SoftPower News* (6/Feb/2019), [www.softpower.ug/museveni-launches-plascons-anti-mosquito-paint/](http://www.softpower.ug/museveni-launches-plascons-anti-mosquito-paint/)

### AUSTRALIA: USING RODENTS TO CONTROL COCKROACHES

A proposal has been put forward by researchers at the University of Sydney to control cockroaches with rodents. Water rats, a native species to Australia, can be trained to hunt cockroaches. If the cockroach trial is successful, then the rats will be trained to hunt Asian House geckos, which has invaded large parts of Australia (SLD: to be honest, I cannot imagine many situations where rodents would be used over baits, which are so effective at killing cockroaches...time well tell.)

Source: *10 Daily* (7/Feb/2019), <https://tendaily.com.au/news/australia/a190201qdb/the-brazen-new-plan-to-pit-rats-against-cockroaches-in-sydney-streets-20190206>

### COURT IN US CLOSED DUE TO BED BUGS

A courthouse in the US was closed after the judge spotted bed bugs on the clothing one of the lawyers. According to the report, the lawyer laid his coat on some files and the bed bugs fell out. The decision to close the court was to protect the public from this insect and the site was promptly treated.

Source: *TulsaWorld* (5/Feb/2019), [www.tulsaworld.com/news/state-and-regional/bedbug-discovery-on-lawyer-s-clothing-leads-to-closure-of/article\\_04146c89-d71e-5939-9ced-10709da2853c.html](http://www.tulsaworld.com/news/state-and-regional/bedbug-discovery-on-lawyer-s-clothing-leads-to-closure-of/article_04146c89-d71e-5939-9ced-10709da2853c.html)

### MASSIVE BED BUG INFESTATION!

There are many sad tales associated with bed bugs. Typically they involve people on low incomes who are unable to pay the high cost of eradication and so the infestation can go on for years. The infestation can increase to alarming proportions to the point that there are so many bed bugs, the blood loss from the bites can affect the health of the resident. One such example that appeared on the internet is of an ex Vietnam vet from Ohio, USA. Gary Meutzel, the bed bug sufferer, has been battling these insects for years. A video on line (which is largely an advertorial) shows his couch being turned over revealing thousands of bed bugs (see link below). Ultimately heat was used to rid his home and belongings of the infestation (SLD: heat requires a high degree of expertise; you need to ensure that heat flows into all areas, be cognisant of proper preparation, such as covering sprinklers, and understand thermodynamics such as heat sinks, to ensure treatment failure does not occur. Heat treatment requires a big upfront investment, with some machines costing over USD\$100,000).

Source: *Cleveland.com* (5/Feb/2019), [www.cleveland.com/metro/2019/02/bed-bug-barbecue-company-helps-vietnam-veteran-in-parma-battling-infestation-and-months-of-isolation.html](http://www.cleveland.com/metro/2019/02/bed-bug-barbecue-company-helps-vietnam-veteran-in-parma-battling-infestation-and-months-of-isolation.html)

### INDONESIA: DISTURBING IMAGES OF MOSQUITO CONTROL

Disturbing images of workers applying insecticide fogs in Jakarta have appeared on line. Members of the public are standing around shrouded in the insecticide fog, while the applicator of the equipment fails to wear proper respiratory masks. The image of a scarf around the face is totally inadequate and would provide little protection against gaseous vapours (SLD: in the application of insecticides, professional pest managers have responsibility to protect the public and themselves).

Source: *Xinhuanet* (4/Feb/2019), [www.xinhuanet.com/english/2019-02/04/c\\_137799179.htm](http://www.xinhuanet.com/english/2019-02/04/c_137799179.htm)

### INDIA: COCKROACH IN AIR INDIA MEAL

Air India apologies after a passenger is served a cockroach in his meal on a Bhopal-Mumbai flight. The passenger found the cockroach in his meal of idli-vada-sambar. He promptly posted to social media an image of the meal where the cockroach could clearly be seen.

Source: *India Today* (4/Feb/2019), [www.indiatoday.in/india/story/air-india-apologises-after-passenger-finds-cockroach-in-food-served-during-flight-1448172-2019-02-04](http://www.indiatoday.in/india/story/air-india-apologises-after-passenger-finds-cockroach-in-food-served-during-flight-1448172-2019-02-04)

### SINGAPORE: AEDES AEGYPTI NUMBERS DOWN BY 80% WITH WOLBACHIA RELEASE

*Wolbachia* is a naturally occurring intracellular parasite of insects, and is being used to control *Aedes aegypti* mosquitoes, the vector of dengue and Zika viruses. *Wolbachia* infected mosquitoes have been released at a number of locations in Singapore and the drop in *Aedes* populations have been dramatic. At Nee Soon East, an 80% reduction was recorded, while in the Tampines West study site, *Aedes* numbers were cut by a half.

Source: *The Straits Times* (31/Jan/2019), [www.straitstimes.com/singapore/aedes-mosquito-population-down-80-per-cent-in-nee-soon-east-cluster](http://www.straitstimes.com/singapore/aedes-mosquito-population-down-80-per-cent-in-nee-soon-east-cluster)

### SINGAPORE: CLAIMS THAT SNAKE WAS MISHANDLED BY PEST CONTROL COMPANY

Claims were made by the Agri-Food and Veterinary Authority of Singapore, that a snake was mishandled during its capture outside Tang Plaza. However the company, Anticimex, deny this allegation. The snake, a large python, was caught in a very crowded part of the city and the company was attempting to protect the general public. In the process, one of the technician placed their foot on the snake to immobilise the reptile and was bitten. It was this incidence that has spread around social media. The technician had surgery to remove an embedded snake tooth.

Source: *Channel NewsAsia* (31/Jan/2019), [www.channelnewsasia.com/news/singapore/snake-python-tang-plaza-pest-control-anticimex-responds-to-](http://www.channelnewsasia.com/news/singapore/snake-python-tang-plaza-pest-control-anticimex-responds-to-)

[ava-11189478](#)

### INDIA: MAYOR PROMISES TO RID THE CITY OF MOSQUITOES

The Mayor of Nellore in India (close to Chennai) has promised to provide garbage bins to clean up the city. Rubbish collects rainwater, which in turn provides habitat for mosquitoes such as *Aedes aegypti*, which is the main vector for dengue virus (SLD: as anyone who has been to India would know, sanitation is a major issue and rubbish collection is hugely problematic. The mayor should be congratulated for creating this initiative. However it is imperative that all bins are routinely emptied and do not become a mosquito breeding source.)

Source: *The Hans India* (31/Jan/2019); [www.thehansindia.com/posts/index/Andhra-Pradesh/2019-01-31/Mayor-promises-residents-mosquito-free-city/485260](http://www.thehansindia.com/posts/index/Andhra-Pradesh/2019-01-31/Mayor-promises-residents-mosquito-free-city/485260)

### AUSTRALIA: HUGE RAT IN POPULAR SYDNEY WESTFIELD RESTAURANT

Video has emerged of a rat running around one of the most popular restaurants on Sydney's iconic Westfield. Din Tai Fung is a Taiwanese restaurant that specialises in dumpling and is a huge hit with the locals, with long daily queues. The restaurant expressed apologies and assured diners that the venue will be cleaned and pest control services employed (SLD: there are many restaurants on this floor and I have eaten at many, thus it was unfortunate for the particular group involved. This incidence highlights the power of social media and the dangers of poor pest management.)

Source: *10 Daily* (31/Jan/2019); <https://tendaily.com.au/news/australia/a190131oar/watch-huge-rat-runs-inside-popular-westfield-restaurant-20190131>

### ESA POSITION STATEMENT ON CLIMATE CHANGE

The largest insect related society in the world, the Entomological Society of America (ESA), has just released a position statement on the effects of climate change on insect life, and the consequences to humans. Beyond damage to the ecosystem such as biodiversity loss and altered food webs, the ESA suggest that climate change will impact humans through; decreased pollination, reduced food security, increased agricultural and pest outbreaks, increased spread of disease carrying insects, loss of natural resources, and more invasive species. The position paper provides examples of recent changes in the status of some serious pests, whereby some are going through more generation cycles, while others are increasing their distribution. The ESA is encouraging politicians to be more proactive in matters relating to climate change (SLD: is it time for FAOPMA to develop a position statement?)

Source: *ESA* (31/Jan/2019), [www.entsoc.org/sites/default/files/files/Science-Policy/2019/ESA-Position-Statement-Climate-Change.pdf](http://www.entsoc.org/sites/default/files/files/Science-Policy/2019/ESA-Position-Statement-Climate-Change.pdf)

### MOSQUITO REPELLENT MARKET TO HIT USD \$5BILLION BY 2022

According to a new report by Zion Marketing, the global

mosquito repellent market is predicted to reach USD\$5 billion by 2022. The report profiled the major suppliers of repellents, and provides current and forecasted demands for repellents from major regions across the globe (SLD: perhaps it was to be expected that global sales in repellents will continue to increase; dengue infections continue to climb and invasive species are spreading globally.)

Source: *Europe Industry News* (28/Jan/2019); <http://europeindustrynews.com/10238/mosquito-repellent-market-globally-reach-usd-5-00-billion-in-2022/>

### JAPAN: MAYBE A BIT TOO WEIRD; DATING A COCKROACH

A Japanese man who has a fondness for eating insects, dated a cockroach for a year. He even fantasized about having sex with Lisa (the name of his buggy girlfriend). Sadly their relationship only lasted for a year, as poor Lisa passed away (cockroaches do not live very long). To celebrate her passing, the man ate Lisa! (SLD: if you really wish to hear more about this heart wrenching tale, click on the link below and watch a video of the story.)

Source: *SocialNewsDaily* (28/Jan/2019), <https://socialnewsdaily.com/82711/japanese-man-dated-a-cockroach/>

### HEADHUNTING ANTS

In a very macabre behaviour, an ant species found in Florida, *Formica archboldi*, decorates its nest with the severed heads of a much larger ant species. Scientists have wondered for some time, how a much smaller ant can sneak up on its larger and more aggressive cousin to be able to kill it, before the decapitation process. Apparently, *Formica archboldi* is coated in chemicals similar to its larger adversary and so can sneak up to it unnoticed. It then sprays the larger ant with concentrated formic acid and the dying ant is then dragged away before being chopped into pieces.

Source: *BBC Focus Magazine* (28/Jan/2019), <https://www.sciencefocus.com/news/mystery-of-headhunting-ants-solved/>

### GALAPAGOS ISLANDS: USING DRONES TO FIGHT RATS

Unmanned aerial vehicles (UAVs), more commonly known as 'drones', are increasingly being used for pest control. The can be used to treat large areas, especially those that are not very accessible via foot. Furthermore they are much cheaper than aerial applications involving helicopters or fixed-winged aircraft. In areas of endangered wildlife, drones are also less of a disturbance than larger aircraft. The Galapagos Islands is one of the most famous areas of the globe for their unique wildlife, however rats are causing major damage to the ecosystems of several of the islands. On one of the small islands in the cluster of the Galapagos, Seymour Norte, conservationists were able to eradicate rats from this island in 2007. However, the rodents have returned, probably swimming from a nearby land mass. Now drones have been employed to drop rodenticides bombs

right across the island. The drones are being flown autonomously (i.e. pre-programmed) to precisely deliver the product at predetermined locations.

Source: *Wired* (25/Jan/2019), [www.wired.com/story/drones-drop-poison-bombs-to-fight-one-islands-rat-invasion/](http://www.wired.com/story/drones-drop-poison-bombs-to-fight-one-islands-rat-invasion/)

See also: [www.nature.com/articles/d41586-019-00176-z](http://www.nature.com/articles/d41586-019-00176-z)

### INDIA: INCREASE IN SCRUB TYPHUS CASES

Health authorities are concerned about an increase in scrub typhus, with sanitation workers most affected. In 2018, there were around 269 cases with two deaths in the state capital of Thiruvananthapuram, within Kerala. Just in the first 18 days of this year, some 58 cases have been confirmed. The increase is blamed on a rise in rodent populations, which are the hosts of the mites, due to a lack of waste management. (SLD: scrub typhus is a rickettsial disease spread via chigger mites to humans. The mites acquire the bacteria from rodents, notably certain mice species. Avoiding the bites of the mite is the main means of preventing the disease. The use of personal repellents and the wearing of impregnated permethrin-treated clothing is advisable in high risk areas.)

Source: *ProMED Digest* (23/Jan/2019), Vol. 78(49).

### THE PERFECT VALENTINE GIFT; NAME A COCKROACH AFTER YOUR BELOVED!

The Bronx Zoo in New York has a very unique Valentines present; you can name a Madagascar hissing cockroach after your sweetheart and send them a digital certificate of the naming. At only \$15 you will be both economical and romantic!

Source: *NH1* (23/Jan/2019), <https://nh1.com/nh1/the-bronx-zoo-will-let-you-name-a-cockroach-for-your-valentines-day-sweetheart/>

### JUST NOT CRICKET, BUT BED BUGS INSTEAD!

English cricketer and fast bowler, Stuart Broad, claimed to be 'getting eaten alive' by bed bugs, while in Barbados on a tour against the West Indies. Other English players were also affected and many slept on mattresses in corridors to avoid bites in the rooms. According to the report, Broad reacted quite badly to the bites, which included in a very 'sensitive area' (SLD: we now know how to defeat the Brits in the next Ashes series!)

Source: *The Sun* (23/Jan/2019), [www.thesun.co.uk/sport/cricket/8266534/stuart-broad-bed-bugs-england-west-indies-first-test/](http://www.thesun.co.uk/sport/cricket/8266534/stuart-broad-bed-bugs-england-west-indies-first-test/)

### AUSTRALIA: LACK OF FUNDING THREATENING WORLD HERITAGE RAINFOREST FROM YELLOW CRAZY ANT

The Yellow Crazy Ant is considered one of the most invasive species on the planet and can cause tremendous damage to native fauna (see report on the Christmas Island red crab below). The pest ant has invaded the wet tropics of northern Australia, which is a World Heritage Region. Unfortunately, funding to control the ant is due to run out, and government has yet to confirm if the control

program will continue. The funding amount required (AUD\$6million per year for seven years) seems trivial compared to the affects this ant could have on the region (SLD: we can only hope that politicians see sense and urgently fund this program).

Source: *The Guardian* (22/Jan/2019), [www.theguardian.com/environment/2019/jan/22/yellow-crazy-ants-world-heritage-area-at-risk-through-lack-of-funding](http://www.theguardian.com/environment/2019/jan/22/yellow-crazy-ants-world-heritage-area-at-risk-through-lack-of-funding)

### AUSTRALIA: RATS IN FAMOUS FAST FOOD TAKEAWAY

Fast food shop Oporto has been forced to close its Broadway store in Sydney after videos were posted on Facebook showing rats running around its premise. Rats were filmed jumping onto counters and kitchen equipment. According to the owner of the company, the store was immediately closed, pest control measures implemented, and the store undergone intensive cleaning. The presence of the rats were blamed on nearby construction works (SLD: construction work is well known to disturb and displace rodent populations, especially in Sydney. Pest management companies should advice their clients to undertake increased rodent monitoring and control, when construction is undertaken nearby.)

Source: *ABC News* (22/Jan/2019), [www.abc.net.au/news/2019-01-21/oporto-rat-infestation-video-forces-sydney-store-to-shut/10733304](http://www.abc.net.au/news/2019-01-21/oporto-rat-infestation-video-forces-sydney-store-to-shut/10733304)

### BANGLADESH: GROWING MOSQUITO PROBLEM IN DHAKA

The mosquito problem is continuing to grow in the city of Dhaka and reports claim that while government authorities undertake adulticiding with fogs, they never attempt to solve the problem through source reduction of larval habitats. However, senior government officials claims a different view and claims they have been highly proactive, undertaking property inspections and fining people with serious mosquito problems. In 2018, almost 6,500 people were infected with the dengue virus with some 24 deaths. The number of cases of dengue have grown over recent years (15,100 cases between 2014 to 2018) and government insiders state that there is no special program to control or monitor mosquitoes.

Source: *The Independent* (22/Jan/2019), [www.theindependentbd.com/post/184273](http://www.theindependentbd.com/post/184273)

### NEW ZEALAND: DEATH BY CHOCOLATE (FOR THE RATS)

In Wellington, New Zealand, chocolate is being trialled as a lure for rats to attract them to traps. This avoids the use of toxic baits which can affect other wildlife. The chocolate does not appeal to birds and so will not enter the traps.

Source: *The Advertiser* (21/Jan/2019), [www.adelaidenow.com.au/news/world/nz-rats-face-death-by-chocolate-in-new-trial/video/0f6eb6941e3e682a22735aae21dfbb85](http://www.adelaidenow.com.au/news/world/nz-rats-face-death-by-chocolate-in-new-trial/video/0f6eb6941e3e682a22735aae21dfbb85)

### BED BUGS AND COCKROACHES IN SCHOOLS

While the presence of cockroaches is ubiquitous (and

expected) wherever humans occurs, it is rare that bed bugs in schools are reported in the press (even if we in the industry are fully aware of it happening!). A report warns that city schools in Glasgow are riddled with bed bugs. A freedom of information request by journalists found seven complaints of bed bugs, with one primary school having up to five treatments of bed bugs in 2018. Some reporters are claiming that this pest problem can be directly linked with poverty, as families with infestations cannot afford to undertake proper bed bug management (SLD: we know there is clear link between many pest problems and poverty. The whole of society should pay for the control of these insect pests to reduce the overall pest burden they impose.)

Source: *Evening Times* (21/Jan/2019), [www.eveningtimes.co.uk/news/17372363.cockroach-and-bedbug-alert-for-glasgow-teachers-city-schools-riddled-with-insects/](http://www.eveningtimes.co.uk/news/17372363.cockroach-and-bedbug-alert-for-glasgow-teachers-city-schools-riddled-with-insects/) and, [www.eveningtimes.co.uk/news/17372354.bedbug-and-cockroaches-the-only-solution-is-eradicating-poverty/](http://www.eveningtimes.co.uk/news/17372354.bedbug-and-cockroaches-the-only-solution-is-eradicating-poverty/)

#### **AFRICA: WIDOW LOSES LIVE SAVINGS TO TERMITES**

A woman in Ghana buried all her money under a heap of firewood in Ghana, Africa. The termites ate the wood and then went onto the delicious wood fibres of her cash. Apparently she did not trust banks after much of her money was taken by a dishonest company.

Source: *GhanaWeb* (21/Jan/2019), [www.ghanaweb.com/GhanaHomePage/NewsArchive/Widow-loses-life-savings-to-termites-after-hiding-money-under-firewood-716968](http://www.ghanaweb.com/GhanaHomePage/NewsArchive/Widow-loses-life-savings-to-termites-after-hiding-money-under-firewood-716968)

#### **HONG KONG: TERMITES PROTECT FORESTS IN DROUGHT**

Scientists from the University of Hong Kong found that termites increase in abundance during droughts. This results in higher rates of plant decomposition as a result of the termite feeding, leading to greater nutrient recycling and higher levels of soil moisture. Thus it appears that termites help buffer the effects of drought.

Source: *Asian Scientist* (21/Jan/2019), [www.asianscientist.com/2019/01/in-the-lab/termite-drought-tropical-rainforest/](http://www.asianscientist.com/2019/01/in-the-lab/termite-drought-tropical-rainforest/)

#### **CHRISTMAS ISLAND: TINY WASP TO FIGHT CRAZY ANTS**

Without a question, the most iconic creature on the tiny island of Christmas Island are their renowned red crabs. Made famous by their well-documented annual migration, and there are many videos of cars and bikes swerving around these crustaceans during their yearly exodus. Unfortunately, around 30 years ago yellow crazy ants (*Anoplolepis gracilipes*) formed super colonies on the island and would attack any crab that crossed their path. First the crabs are blinded with acid sprayed from the ant, and then the acid attacks the joints of the crabs, stopping and killing them. More than 40 million crabs have been killed by this pestiferous species of ant. The yellow crazy ants feed on honeydew from scale insects

and a novel approach to controlling the ant has been by the introduction of a parasitic wasp (*Tachardiaephagus somervillei*), which attacks and kills the scale. Where the biocontrol program has been initiated, numbers of the yellow crazy ant has decreased.

Source: *ABC* (16/Jan/2019), [www.abc.net.au/news/2019-01-16/wasps-enlisted-to-control-crazy-ants-on-christmas-island/10666868](http://www.abc.net.au/news/2019-01-16/wasps-enlisted-to-control-crazy-ants-on-christmas-island/10666868)

#### **INDIA: JAPANESE ENCEPHALITIS VIRUS**

There is a syndrome called 'Acute Encephalitis Syndrome' (AES), which is characterised by fever and various neurological conditions such as confusion, delirium and coma. A number of viral diseases have been attributed to this including those transmitted by mosquitoes such as dengue and Japanese encephalitis virus (JEV). In a recent study of over 10,000 AES patients, where a diagnosis could be made, around one third could be attributed to JEV, another third to scrub typhus (a disease carried by mites) and five percent to dengue virus. This highlights the role of arthropod vectors in the transmission of deadly diseases that can affect the brain.

Source: *ProMED Digest* (13/Jan/2019), Vol. 79(34).

#### **SRI LANKA: TRYPANOSOMIASIS IN DOGS**

A trypanosome is a unicellular parasite that can infect a range of vertebrates. The most famous (or infamous!) of these is *Trypanosoma cruzi*, which can cause Chagas disease in humans (it is thought that Charles Darwin contracted Chagas during the voyage of the Beagle). The parasite is transmitted via a 'triatome' insects, often called 'kissing bugs'. A dog in Sri Lanka (in Balangoda) was recently diagnosed with *Trypanosoma* infection (known as Trypanosomiasis), which is the first record of the occurrence of this disease for the island nation. Members of these parasites are known to occur in the Indian subcontinent and the disease is known as 'Surra', and can infect a variety of vertebrate animals including dogs. More work needs to be undertaken on the Sri Lankan case to confirm the identity of the disease.

Source: *Promed* (13/Jan/2019), Vol. 78(26).

#### **EGG-XACTLY, WELL NO! POSSIBLE NEW METHOD OF MOSQUITO CONTROL**

Researchers from the University of Arizona have discovered a protein in mosquitoes that is crucial for the formation of their eggs. This protein is known as 'Eggshell Organizing Protein'. By blocking this protein, the egg shell failed to form properly resulting in the death of the embryo. Perhaps in the future, mosquito populations may be able to be controlled by blocking the gene that develops the egg protein.

Source: *Arizona Public Media* (11/Jan/2019), <https://news.azpm.org/p/news-topical-sci/2019/1/11/144184-ua-research-could-help-reduce-disease-spreading-mosquito-populations/>

#### **INDIA: KYASANUR FOREST DISEASE OUTBREAK**

There has been an outbreak of Kyasanur Forest disease (KFD) in villages within the Shivamogga district. At least

22 people have been infested with the disease and some four deaths have occurred. (SLD: KFD is transmitted by ticks, which pick up the virus from monkeys. For this reason it is also known as 'monkey fever'. The disease is potentially deadly and can cause haemorrhagic fevers. Prevention is via vaccination and the prevention of ticks bites via the use of personal w, permethrin treated clothing, and habitat treatment.)

Source: *Promed* (6/Jan/2019), Vol. 78(11).

**ASIA AND INDIA: CHIKUNGUNYA VIRUS**

Thailand: cases during November 2018 increased from 538 to 2,143 in one month.

India: 31 cases of Chikungunya virus were reported in November 2018, from Ahmedabad state.

Source: *Promed* (4/Jan/2019), Vol. 79(7).

**AUSTRALIA: MAN ATTEMPTS TO KILL SPIDER AND TRIGGERS MAJOR POLICE RESPONSE**

"Why don't you die!" were the words heard by a passer-by, while a baby cried loudly from inside the premise. The call from the panicked hearer of the words prompted a full-scaled police response. Lo and behold, the victim of the murder attempt was a humble household spider! The man responsible for the emergency admitted he suffered from arachnophobia, namely a fear of spiders. He

walked into a room and was confronted with the arachnid villain, which prompted an all-out panic attack. Grabbing a nappy and fought with the eight legged beast, until it resembled a brown smear (I guess that is what is normally in nappies!). Of course the police arrived expecting a murder, which they did find, but not of the two legged variety. The man later admitted that he had never been so embarrassed in his life...

Source: *ABC News* (4/Jan/2019); <https://www.abc.net.au/news/2019-01-03/wa-police-called-out-for-man-trying-to-kill-spider/10683454>

**CHINA: STAFF FORCED TO EAT COCKROACHES (UGH!)**

Staff who failed to reach sales targets were forced by managers to each cockroaches and drink urine, according to local media reports. Other staff were publicly humiliated and whipped with belts. The same company also shaved the hair off under performing staff, forced them to drink water from toilets, or drink vinegar. The local police arrested several managers. (SLD: this is one way to curb the ever present cockroach problem!)

Source: *BBC News* (7/Nov/2018), [www.bbc.com/news/world-asia-china-46120627](http://www.bbc.com/news/world-asia-china-46120627) ■



**Fancy eating this? Do a goob job and you won't have too! (see above story)**