

NSW Arbovirus Surveillance and Mosquito Monitoring 2025-2026

Environmental Health Branch, Health Protection NSW

Weekly Update: Week ending 6 December 2025



Bottom left - Common banded mosquito, *Culex annulirostris* **Top and bottom right** - Saltmarsh mosquito, *Aedes vigilax* (Copyright 2020)

Weekly reports are available on [Mosquito-borne disease surveillance](#).

Please send questions or comments about this report to:

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Testing and scientific services are provided by the Department of Medical Entomology, NSW Health Pathology, Institute of Clinical Pathology and Medical Research (ICPMR) for mosquito surveillance, and the Arbovirus Emerging Diseases Unit, NSW Health Pathology (ICPMR) for sentinel chicken surveillance.

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Summary

Arbovirus Detections

Sentinel Chickens

• There was no arbovirus detection in sentinel chickens for the week ending 6 December 2025.

Mosquito Isolates

• There were no arbovirus detections in mosquito samples in the week ending 6 December 2025.

Mosquito Abundance

Inland

- **Low:** Balranald, Forbes, Griffith, Leeton, Murrumbidgee, Tamworth, Wilcannia.
- **Medium:** Moree.

Coastal

- **Low:** Batemans Bay, Gosford, Lake Cathie, Murwillumbah, Narooma, Newcastle, Port Macquarie, Wyong.
- **Medium:** Ballina, Tweed.

Sydney

- **Low:** Bankstown, Blacktown, Canada Bay, Cumberland, Earlwood, Georges River, Hawkesbury, Liverpool, Northern Beaches, Parramatta, Sydney Olympic Park, The Hills.
- **Medium:** Penrith.

Environmental Conditions

Climate

- In the week ending 6 December 2025, rainfall was average or below average across all of NSW.
- In the coming week, 13 November to 19 December 2025, rainfall is expected to be lower than average.
- Minimum temperatures are expected to be average or higher than average across the state, high temperatures are expected in Hunter New England. Maximum temperatures are expected to be higher than average across NSW.

Tides

- High tides over 1.8 meters are predicted for 21-22 December 2025 and 1-7 January 2026 which could trigger hatching of *Aedes vigilax*.

Human Arboviral Disease Notifications

Ross River Virus

Three probable cases were notified in the week ending 6 December 2025.

Barmah Forest Virus

One probable case was notified in the week ending 6 December 2025.

Arbovirus Detections

This section details detections of Murray Valley encephalitis virus, Japanese encephalitis virus, Kunjin virus, Ross River virus and Barmah Forest virus in the NSW Arbovirus Surveillance and Mosquito Monitoring Program.

Sentinel chickens

Chickens are bled for detection of antibodies directed against Murray Valley encephalitis virus, Japanese encephalitis virus and Kunjin virus, indicating exposure to these viruses. Test results for the past week are shown in the map below. A positive test result indicates one or more chickens in a flock tested positive for the **first time** to antibodies directed against a particular virus, indicating newly acquired infection.

Sentinel chicken antibody test results for samples collected in the week ending 6 December 2025

In the week ending 6 December, no viruses were detected in sentinel chickens.

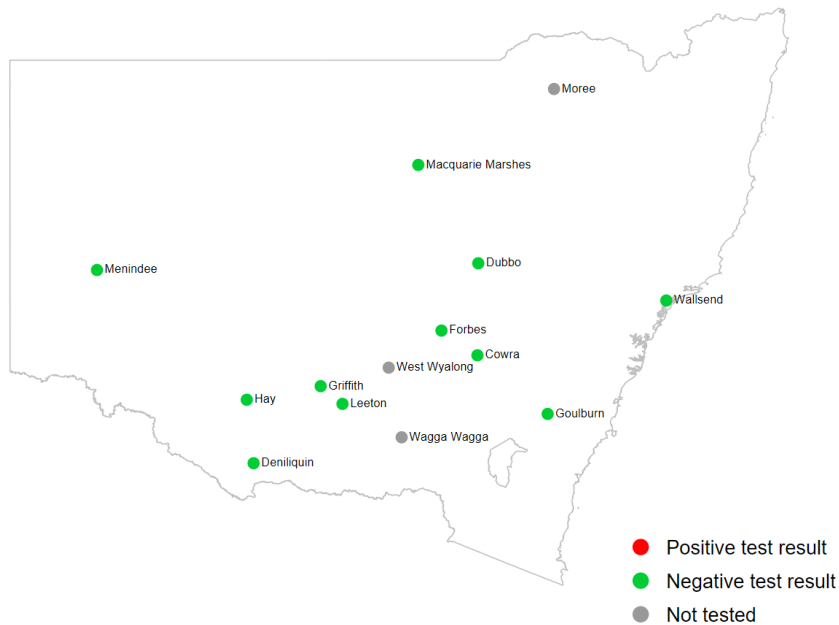


Table 1: Positive test results in the 2025-2026 surveillance season.

Date of sample collection	Location	Virus
2025-11-20	Cowra	Kunjin

Mosquito isolates

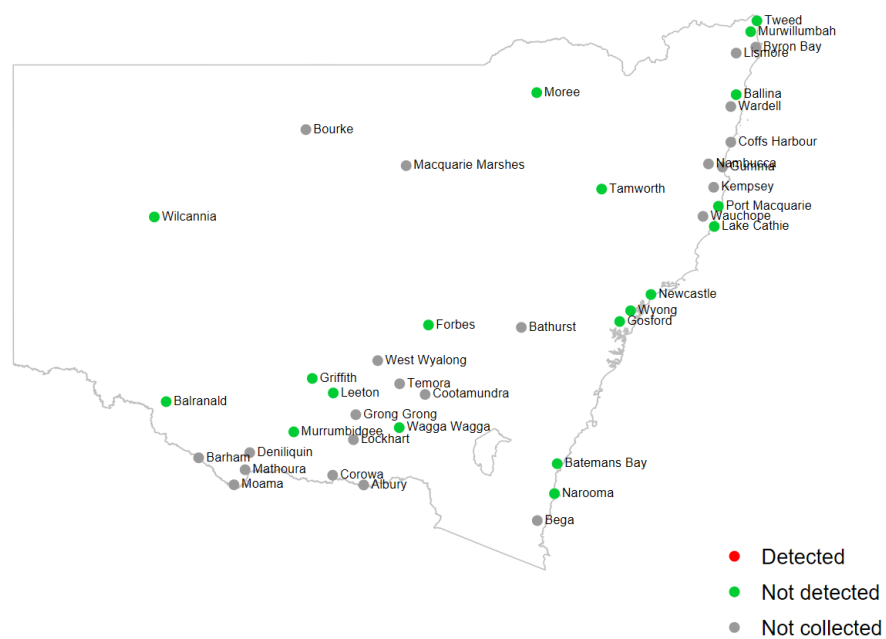
Whole grinds of collected mosquitoes are tested for arbovirus nucleic acids to determine the presence of arboviruses in mosquitoes. Test results for detections of Murray Valley encephalitis virus, Japanese encephalitis virus, Kunjin virus, Ross River virus and Barmah Forest virus for the past week are shown in the maps below. Detections of all arboviruses (including Edge Hill virus and Kokobera virus) for the season are detailed in the positive test results for the 2025-2026 surveillance season.

Test results for mosquito trapping sites reported in the week ending 6 December 2025

In the week ending 6 December 2025, there were no arbovirus detections in mosquitoes.

Inland and coastal sites

The map highlights detections of arboviruses that can cause human notifiable conditions, such as Murray Valley encephalitis virus, Japanese encephalitis virus, Kunjin virus, Ross River virus, and Barmah Forest virus. Detections of all arboviruses (including Edge Hill virus, Stratford virus and Kokobera virus) for the season are detailed in the positive test results for the 2025-2026 surveillance season.



There have been no arbovirus detections in mosquitoes during the 2025-2026 surveillance season.

Sydney sites

The map highlights detections of arboviruses that can cause human notifiable conditions, such as Murray Valley encephalitis virus, Japanese encephalitis virus, Kunjin virus, Ross River virus, and Barmah Forest virus. Detections of all arboviruses (including Edge Hill virus, Stratford virus and Kokobera virus) for the season are detailed in the positive test results for the 2025-2026 surveillance season.



There have been no arbovirus detections in mosquitoes during the 2025-2026 surveillance season.

Mosquito abundance

This section details counts of mosquitoes in the NSW Arbovirus Surveillance and Mosquito Monitoring Program. Each location represents the count average for all trapping sites at that location for the most recent week that collections were provided prior to preparation of this report.

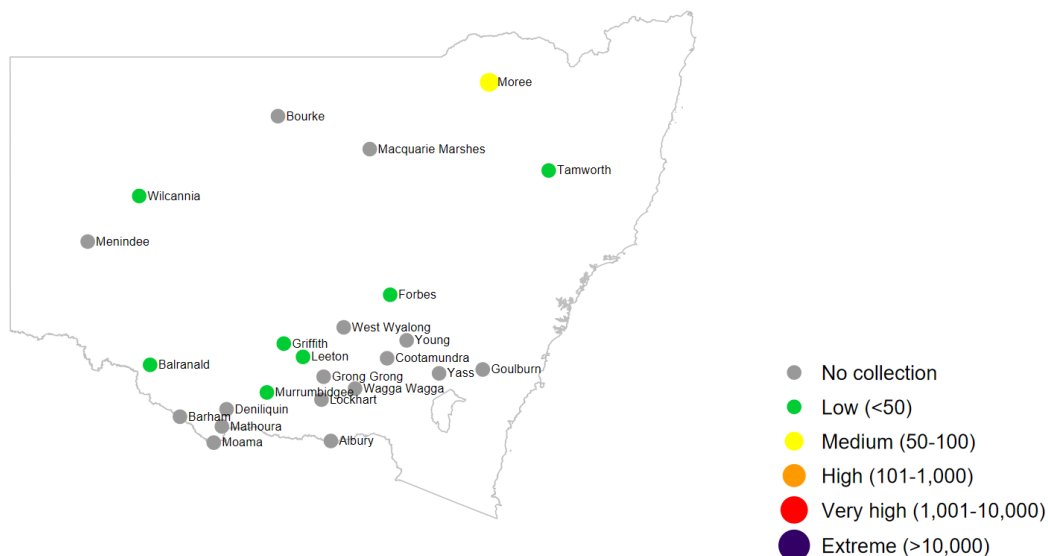
Culex annulirostris and *Aedes vigilax* are vectors of interest for Ross River virus and Barmah Forest virus, *Culex annulirostris* is also a vector for Japanese encephalitis virus.

Mosquito counts

Mosquito counts (average per trap per location) for mosquito trapping sites reported in the week ending 6 December 2025

Inland sites

Total mosquito counts



Culex annulirostris counts

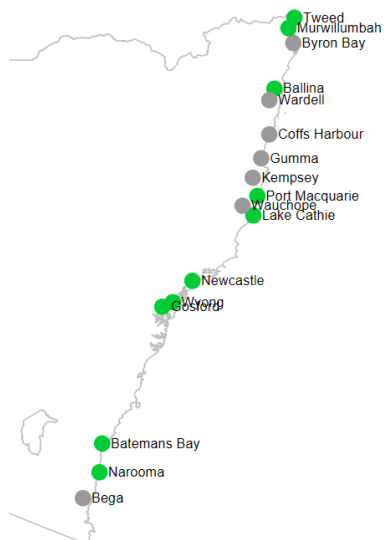


Coastal sites

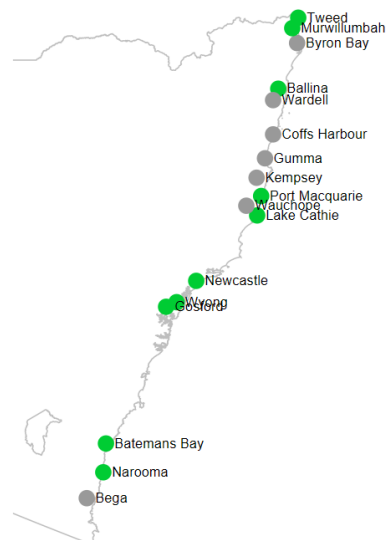
Total mosquito counts



Culex annulirostris counts

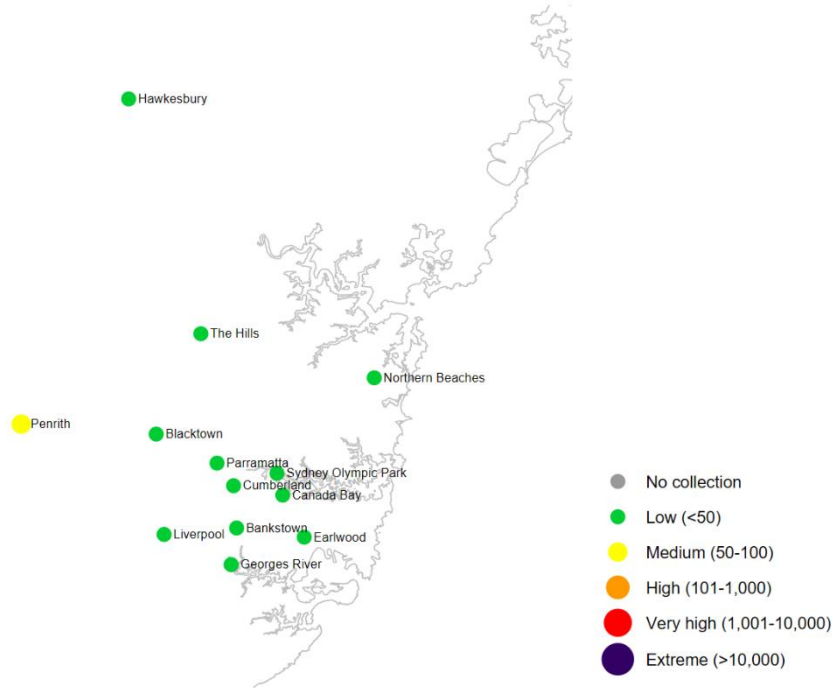


Aedes vigilax counts

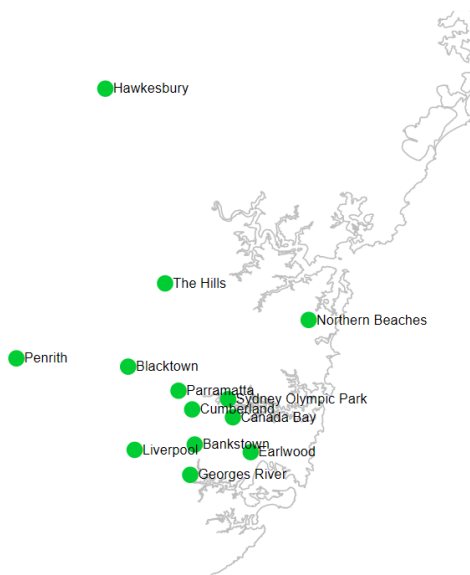


Sydney sites

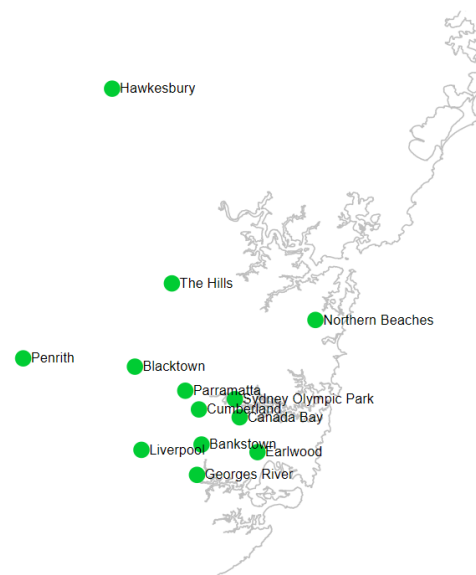
Total mosquito counts



Culex annulirostris counts



Aedes vigilax counts



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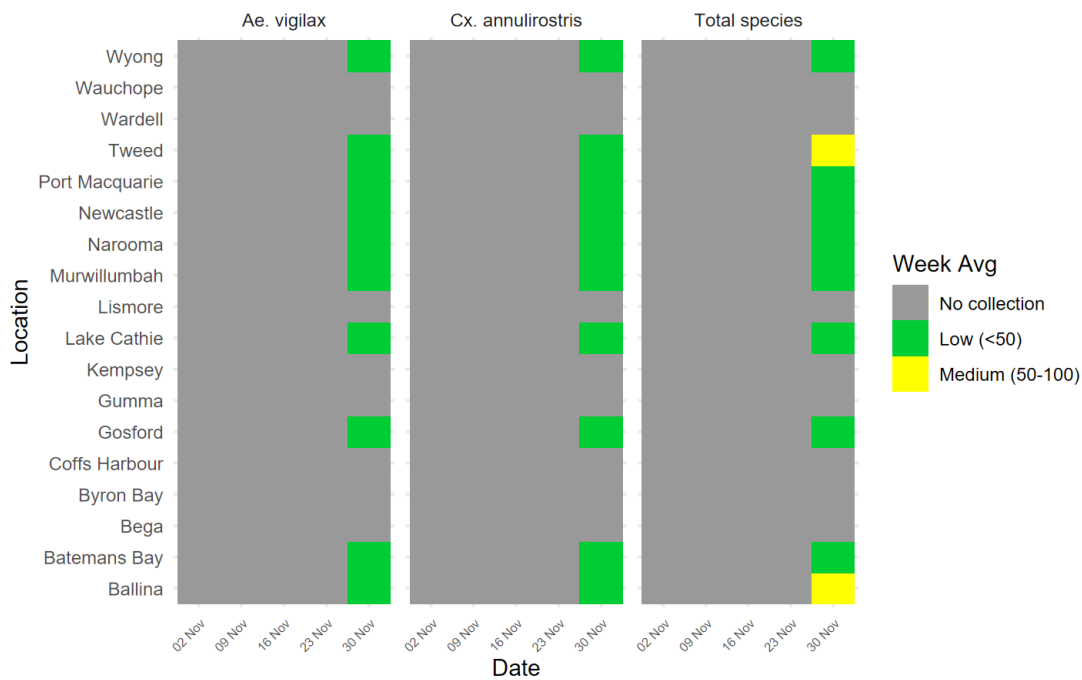
Mosquito abundance results for the 2025-2026 season

season

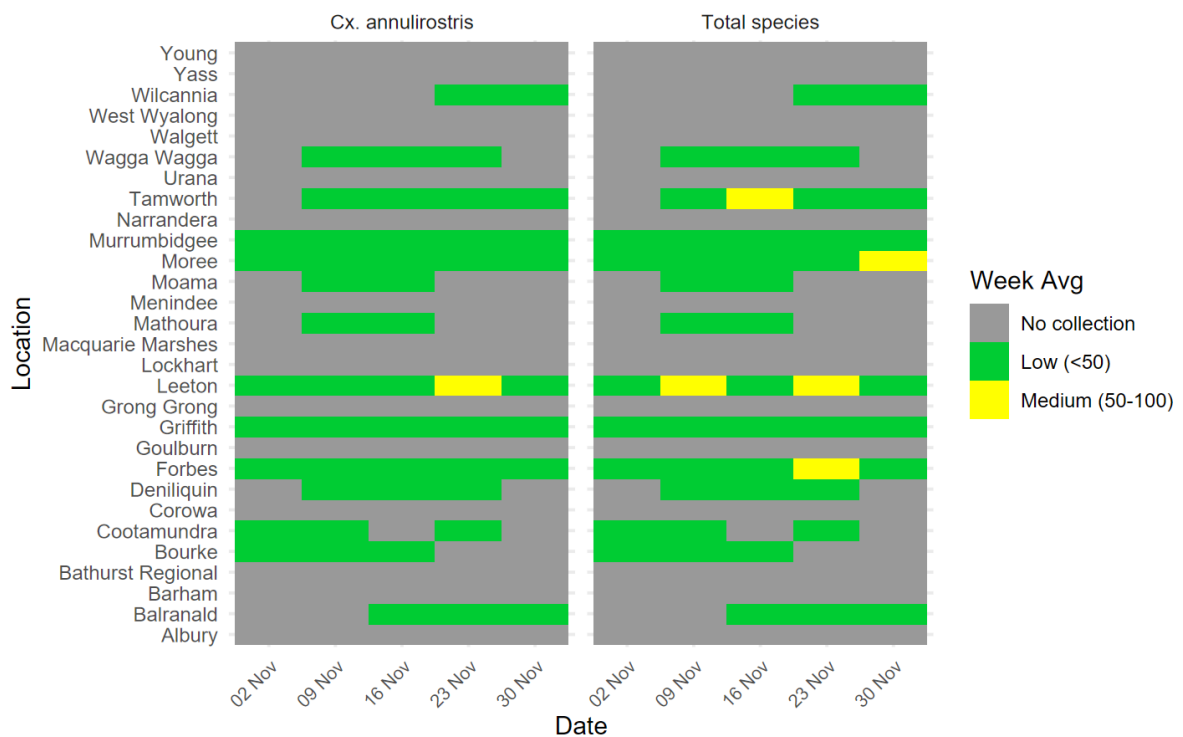
This section shows all mosquito trapping results by location and species type to date for the current arbovirus season.

Cumulative mosquito abundance tables

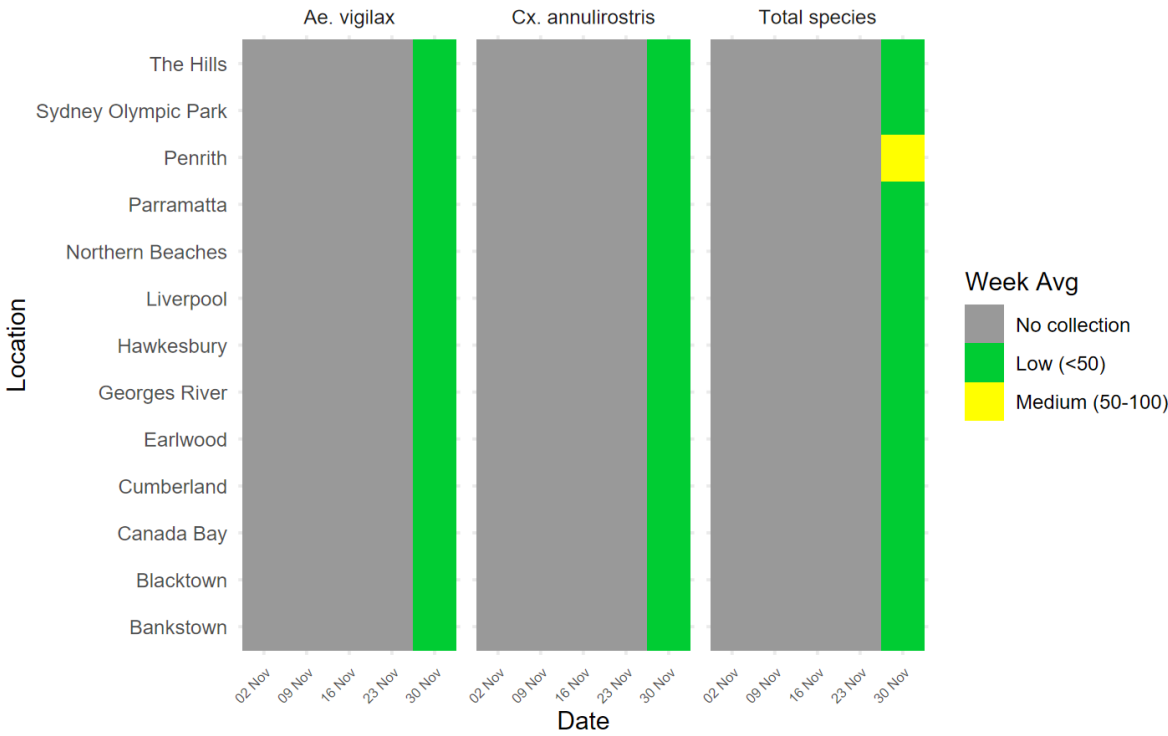
Number of mosquitoes trapped along the coast (weekly average)



Number of mosquitoes trapped inland (weekly average)



Number of mosquitoes trapped in Sydney (weekly average)



Human arboviral disease notifications

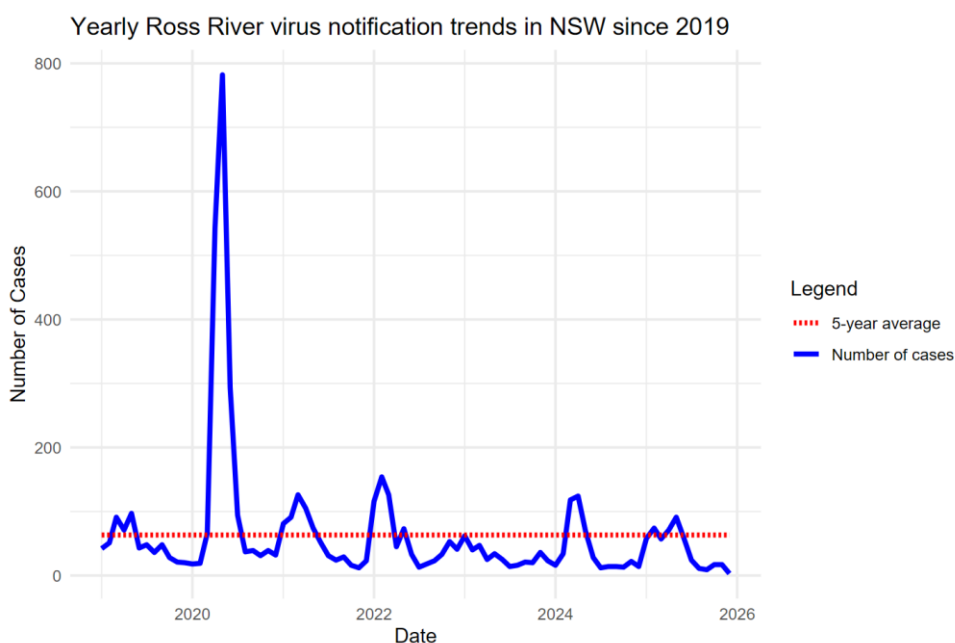
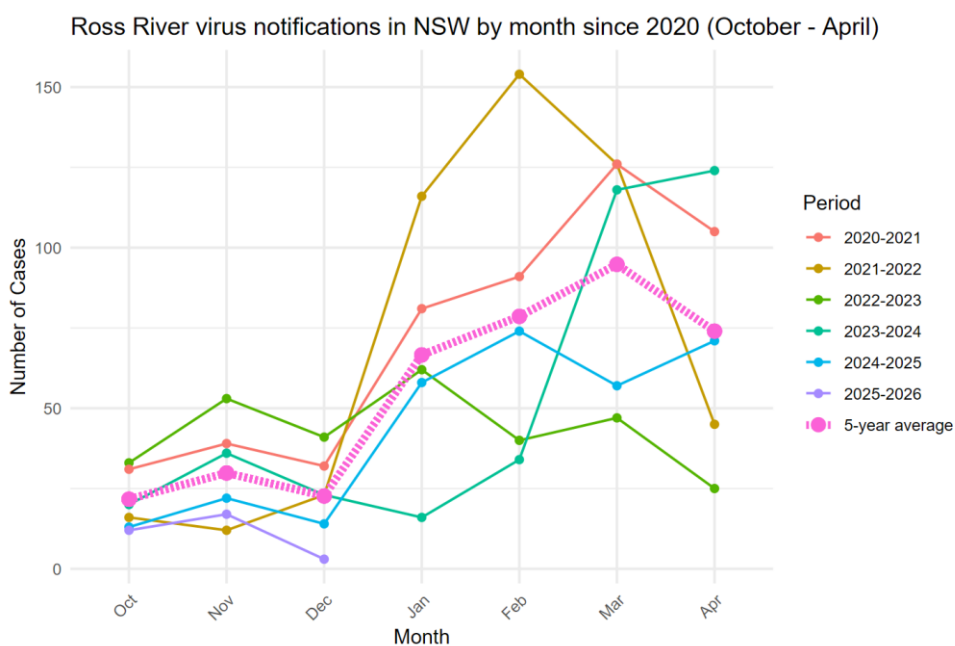
Under the *NSW Public Health Act 2010*, human arboviral infections are notifiable in NSW.

Recent notifications of Ross River virus and Barmah Forest virus infections in humans (by date of case report received)

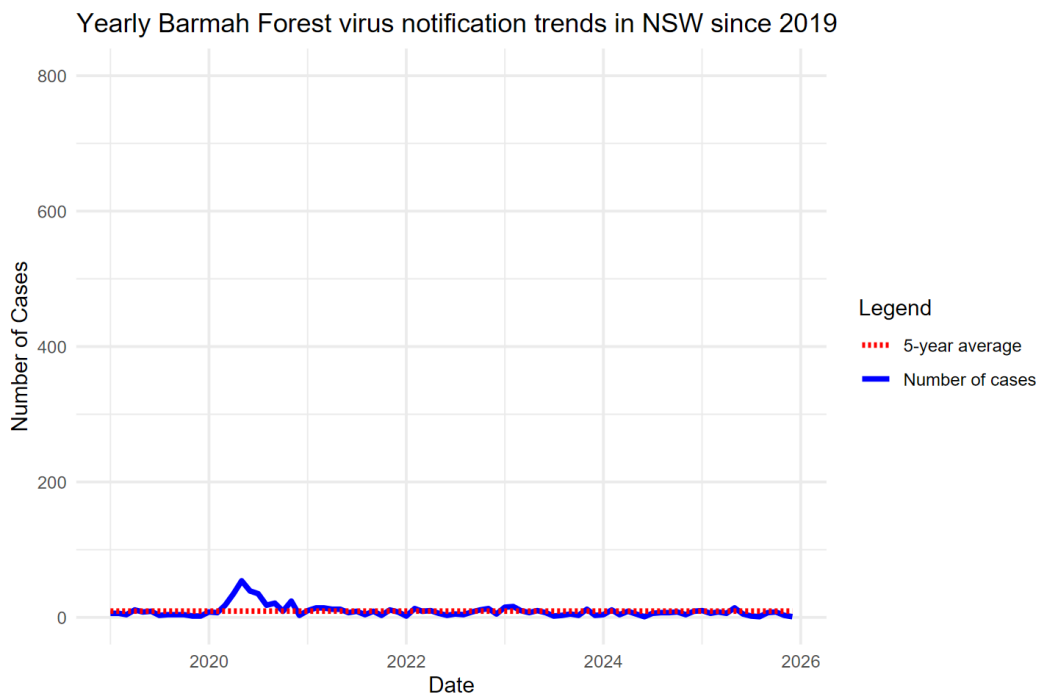
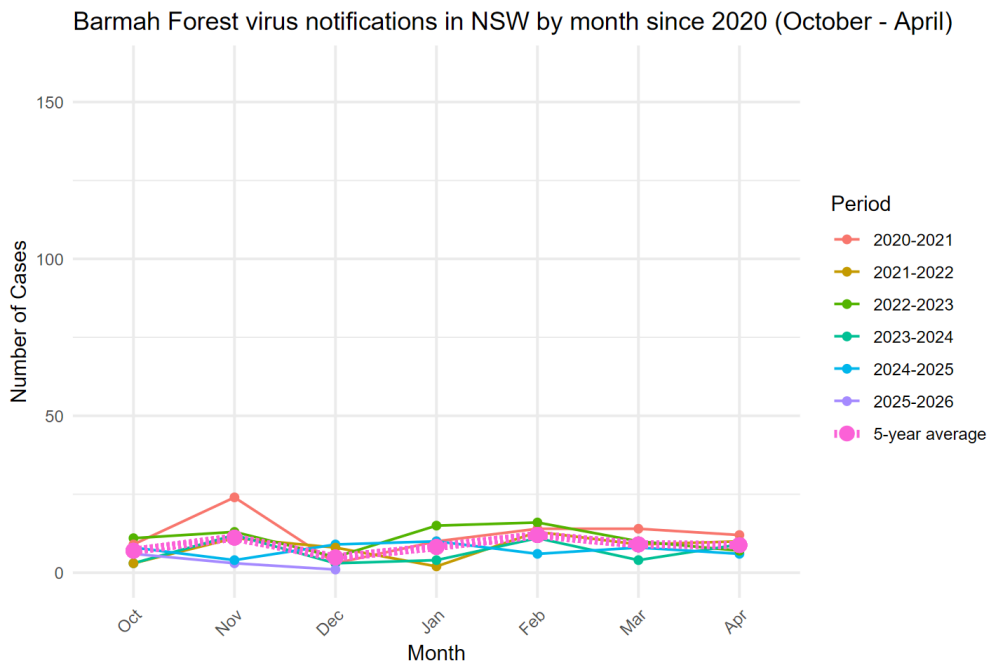
Notifications of Ross River virus and Barmah Forest virus infections, by month of disease onset (the earlier of patient-reported onset or specimen collection date), are available online at the [NSW Health website - infectious diseases data](#).

The following figures show notifications for the current NSW Arbovirus Surveillance and Mosquito Monitoring season (2025-2026), and the same period in the previous four years.

Ross River virus



Barmah Forest virus



Note: Presented human cases include both confirmed and probable cases.