



Guide to interpreting notifiable infectious disease data for Western Australia

1. Data source

The data summarised in the graphs and tables on the dashboard are sourced from the WA Notifiable Infectious Diseases Database (WANIDD) maintained by the Communicable Disease Control Directorate, Public and Aboriginal Health Division, Department of Health WA. This database contains information on notifiable infectious diseases and related conditions that have been reported to the Department of Health, as mandated by the Public Health Act 2016 and Public Health Regulations 2017. For more information go to [Notification of infectious diseases and related conditions \(health.wa.gov.au\)](https://www.health.wa.gov.au/notifications).

2. Data extraction and reporting

Notifiable disease data are extracted from WANIDD using the “optimal date of onset”, with the exception of the following diseases: hepatitis B (includes both newly acquired cases and cases of unspecified duration), hepatitis C (includes both newly acquired cases and cases of unspecified duration), leprosy, non-infectious syphilis and tuberculosis, which are extracted by “date of receipt” of the notification. The “optimal date of onset” is derived from the ‘true’ date of onset of illness provided by the notifying doctor or obtained during case follow-up, or if this is not available the date of specimen collection for laboratory notified cases, and when neither of these dates is available, the date of notification by the doctor or laboratory, or the date of receipt of notification, whichever is earliest. Data presented in the [dashboard](#) can be aggregated by month, quarter and year, gender, age groups, Aboriginality and region. The region signifies the location where the person resides. The tables and graphs present data up to the previous day.

3. Inclusion criteria

This dashboard includes all notifiable infectious diseases diagnosed in Western Australia, including both WA residents, and interstate or overseas visitors. It also includes cross-border notifications, who are WA residents diagnosed with notifiable diseases in other Australian jurisdictions. Data are available for all notifiable infectious diseases and related conditions that are currently notifiable in WA, with the exception of COVID-19, HIV/AIDS, acute rheumatic fever, Carbapenem-resistant Enterobacteriaceae (CRE) infection or colonization, Carbapenem-resistant Enterobacteriaceae (CRE) infection or colonization, Vancomycin-resistant enterococci (VRE) infection or colonization and methicillin resistant Staphylococcus aureus (MRSA).

4. Timeliness, accuracy and completeness

Data are current at the displayed “Data current to date”. The number of cases reported is subject to change, as notifications may be received late, or rejected after further investigation and data cleaning.

Completeness of case ascertainment for notifiable diseases varies, depending on: the characteristics of the particular disease, which determines the extent to which infected persons seek medical attention and are tested; whether doctors request specimen collection and testing; the availability of sensitive diagnostic methods; and the completeness of notification by treating doctors and diagnostic laboratories. Ascertainment is less likely to be complete for more common and/or less serious infections (e.g. influenza, chlamydia,

rotavirus gastroenteritis).

5. Case definitions for notifiable infectious diseases

For current national case definitions see [Australian National Notifiable Diseases Case Definitions](#). Additionally, several diseases are notifiable in WA but not nationally. These include: acute rheumatic fever, chancroid, melioidosis, paratyphoid fever, typhus (rickettsial infection), *Vibrio parahaemolyticus* infection and yersiniosis. Case definitions for these diseases are listed [Surveillance Case Definitions for notifiable infectious diseases and related conditions in WA](#). In WA, “flavivirus infection” is notifiable, and includes several flavivirus infections (e.g. Murray Valley encephalitis virus, Kunjin/West Nile virus, Japanese encephalitis virus) that are listed individually in the national case definitions.

6. Data interpretation

Caution should be exercised in interpreting trends in notification data, due to changes over time in case definitions, laboratory diagnostic tests and notification requirements. One should also be aware that the most recent time periods reported in tables (where presented) may contain incomplete data for that period. Rates should be interpreted with caution especially those diseases with low number of notifications, as small changes in numbers reported can lead to large changes in rates. Comparing rates of the current year with previous years should be interpreted with caution as data are incomplete for the current year and some diseases have seasonal changes in the number of notifications reported (e.g. Ross River virus infections increase in summer). Diagnosis and notification in WA does not mean the disease was acquired in WA. A significant number of cases of many diseases, and in some instances, all cases, are acquired overseas. For instance, there is no local transmission of malaria and dengue fever in WA as appropriate mosquito vectors do not occur, and all notified cases are acquired outside the state. For other diseases, such as measles and hepatitis A, most cases are acquired overseas, but limited local transmission may occur from imported cases. If necessary, appropriate assistance should be sought in interpreting notifiable infectious disease data.

7. Citation of the WA Notifiable infectious disease data

Acknowledgement of the Communicable Disease Control Directorate, Department of Health Western Australia, should accompany any use of these data.

Suggested citation: Communicable Disease Control Directorate, Department of Health Western Australia. *Notifiable Infectious Disease Reports*, available at: Notification of infectious diseases and related conditions, available at https://www.health.wa.gov.au/Articles/N_R/Notifiable-infectious-disease-report, accessed [include date].

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