

WEEKLY BULLETIN

Communicable Disease Threats Report

Week 24, 11– 17 June 2023

Today's disease topics

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Executive Summary

COVID-19 associated with SARS-CoV-2 – Multi-country (EU/EEA) – 2019 - 2023

- By the end of week 23 (ending 11 June 2023), decreasing or stable trends had been observed in EU/EEA indicators, based on pooled country data in all age groups. This is a continuation of the pattern observed in recent weeks.
- Among the 15 countries reporting at least 10 results from SARS-CoV-2 sequencing or genotyping for weeks 21–22 (22 May to 4 June 2023), the estimated distribution of variants of concern (VOC) or variants of interest (VOI) was 94.6% (47.4–100.0% from 15 countries) for XBB.1.5, 4.3% (0.4–21.1% from 11 countries) for BA.2.75, 2.0% (0.4–3.6% from six countries) for XBB and 1.8% (0.6–31.6% from six countries) for BQ.1.

West Nile virus One Health seasonal surveillance - 2023

- This is the third weekly update of the 2023 WNV monitoring season.
- To date, no human cases have been reported.
- One outbreak in birds has been reported in Italy.

Chikungunya and dengue – Multi-country (World) – Monitoring global outbreaks

- In 2023, as of 7 June, 214 317 cases and 281 deaths of Chikungunya virus disease have been reported.
- In 2023, and as of 8 June, 2 162 214 cases and 974 deaths of dengue virus disease have been reported globally.
- The current likelihood of local transmission events of chikungunya and dengue viruses occurring in areas where the vector is present in mainland EU/EEA is high, as the environmental conditions are favourable for vector activity and virus replication. The likelihood is expected to increase to very high in coming weeks as temperatures continue to increase.

Avian influenza A(H9N2) - Multi-country (World) - Monitoring human cases

- One new human case of avian influenza A(H9N2) has been reported in China, bringing the overall number of human cases since 1998 to 125, including two deaths.
- Most of the cases reported to date have been in China (112).
- No human cases have been reported in the EU/EEA and related A(H9N2) viruses are not present in poultry populations in the EU/EEA.
- The risk of zoonotic influenza A(H9N2) transmission to the general public in EU/EEA countries is considered to be very low.

Measles – Multi-country (World) – Monitoring European outbreak

- Measles transmission is currently low in the EU/EEA.
- Since the beginning of the year, 242 cases have been reported in TESSy by 12 countries.
- During April 2023, 46 confirmed cases were reported by ten countries.
- An outbreak is ongoing in Austria, with 121 cases reported as of 13 June 2023. The number of cases is currently decreasing.
- Outside of the EU/EEA, cases and outbreaks have been reported in Armenia, Switzerland, and Ukraine. The complete list of cases reported worldwide is available below for all WHO Regions.

Monthly diphtheria epidemiological monitoring in the EU/EEA - 2023

- In 2023, and as of 12 June, 45 diphtheria cases were reported in the EU/EEA through The European Surveillance System (TESSy). Cases were reported in Germany (35), Czechia (5), Latvia (3), Norway (1) and Slovakia (1). This represents an increase of 17 cases since the previous update, with data as of 8 May 2023.
- In 2023, and as of 12 June, two fatal cases (Czechia (1) and Latvia (1)) had been reported in the EU/EEA .
- One additional EU/EEA country (Slovakia) has reported diphtheria cases in 2023.
- ECDC has no data indicating community transmission and outbreaks of *Corynebacterium* (C.) diphtheriae in the broader EU/EEA population as a result of the increased number of diphtheria cases observed since the second half of 2022.
- Clinicians should continue to be aware of the clinical features of diphtheria and ensure timely diagnosis and treatment of cases according to existing clinical guidelines.
- An unusually broad predicted resistance of C. diphtheriae isolates to common oral and parenteral antibiotics has been reported. As a precautionary measure, ECDC recommends that antimicrobial susceptibility testing is performed on all C. diphtheriae isolates.

Cholera - Lebanon - 2022/2023

- On 11 June 2023, the Lebanese Ministry of Public Health declared the end of the cholera outbreak in Lebanon as no new confirmed cholera cases have been detected since the end of February 2023.
- In total, since 6 October 2022, there have been 671 confirmed cases and 23 deaths.

Echovirus 11 infections in neonates - multi-country- 2022-2023

- As of 15 June 2023, eleven confirmed echovirus 11 cases had been reported among neonates in France and Italy, including seven deaths.
- The Italian E11 strains cluster with the French strains collected in 2023, which together compose a new divergent lineage.
- Seven cases are related to confirmed vertical transmission from their mothers and presented with severe sepsis and hepatic failure.
- ECDC assesses the risk of Echovirus 11 infection among the neonatal population in the EU/EEA to be low.

Mass gatherings - Hajj - Saudi Arabia - 2023

- The annual Hajj pilgrimage, which usually attracts on average two million people, will take place between 26 June and 1 July in Saudi Arabia, allowing pilgrims from 12 years of age.
- Pilgrims are provided with a range of requirements and standard recommendations, including vaccination requirements for COVID-19, meningococcal infection, and depending on where they come from, poliomyelitis and Yellow fever.
- Returning travellers from the Hajj should seek medical attention immediately if they experience symptoms suggestive of any type of infection.
- ECDC will monitor this event through its epidemic intelligence activities from 19 June to 7 July 2023 and will report on a weekly basis.

1. COVID-19 associated with SARS-CoV-2 – Multi-country (EU/EEA) – 2019 - 2023

Overview

Summary:

By the end of week 23 (ending 11 June 2023), decreasing or stable trends had been observed in EU/EEA indicators, based on pooled country data in all age groups. This is a continuation of the pattern observed in recent weeks.

A recent increase in case rates was reported by one country for the age group 80 years and above (23 countries reported data). No country reported increases in hospital indicators. There were 288 deaths reported from 21 countries, with two countries reported an increasing trend in one age group.

No country is predicted to see increases in the number of reported cases, hospital admissions or deaths in the period up to 25 June 2023, based on ensemble model forecasts.

Among people aged 60 years and above, the cumulative uptake of a first booster was 84.9% (country range: 13.3–100.0%), and of a second booster was 35.6% (country range: 0.4–87.0%).

Among the 15 countries reporting at least 10 results from SARS-CoV-2 sequencing or genotyping for weeks 21–22 (22 May to 4 June 2023), the estimated distribution of variants of concern (VOC) or variants of interest (VOI) was 94.6% (47.4–100.0% from 15 countries) for XBB.1.5, 4.3% (0.4–21.1% from 11 countries) for BA.2.75, 2.0% (0.4–3.6% from six countries) for XBB and 1.8% (0.6–31.6% from six countries) for BQ.1

ECDC has made a change to the way it reports information on variant distributions and sequencing volumes, to align with the [Operational considerations for respiratory virus surveillance in Europe](#), to better describe the variant detection ability of countries at current levels of sequencing, and to include more data for describing variant proportions.

For the latest COVID-19 country overviews, please see the [dedicated web page](#).

Weekly update on SARS-CoV-2 variants:

Since the last update on 9 June 2023, and as of 15 June 2023, no changes have been made to ECDC variant classifications for variants of concern (VOC), variants of interest (VOI), variants under monitoring or de-escalated variants.

For the latest information on variants, please see ECDC's [webpage on variants](#).

Public Health Emergency of International Concern (PHEIC):

On 30 January 2020, the World Health Organization (WHO) declared that the outbreak of COVID-19 constituted a PHEIC. On 11 March 2020, the Director-General of WHO declared the COVID-19 outbreak a pandemic.

The [third](#), [fourth](#), [fifth](#), [sixth](#), [seventh](#), [eighth](#), [ninth](#), [tenth](#), [eleventh](#), [twelfth](#), [thirteenth](#), and [fourteenth](#) International Health Regulations (IHR) Emergency Committee meetings for COVID-19 were held in Geneva on 30 April 2020, 31 July 2020, 29 October 2020, 14 January 2021, 15 April 2021, 14 July 2021, 22 October 2021, 13 January 2022, 11 April 2022, 8 July 2022, 13 October 2022, and 27 January 2023 respectively. The Committee concluded during these meetings that the COVID-19 pandemic continues to constitute a PHEIC.

In the [fifteenth](#) IHR Emergency Committee meeting held in Geneva on 4 May 2023, WHO's Director-General agreed with the [advice](#) offered by the Committee and determined that COVID-19 is no longer a public health emergency of international concern (PHEIC).

For the latest COVID-19 country overviews, please see the [dedicated web page](#).

Please refer to the [data reported by the World Health Organization \(WHO\)](#) on COVID-19 and [WHO's Weekly Epidemiological Updates and Monthly Operational Updates](#) page for non-EU/EEA countries.

ECDC assessment

SARS-CoV-2 continues to circulate in the EU/EEA with varying intensity. The epidemiological picture in the EU/EEA over the past 12 months has been characterised by periodic waves of infection, approximately every two to three months, with an overall downward trend in the height of the associated peaks in reported cases, hospitalisations, ICU admissions, and deaths in this period. The emergence of new variants of concern or population immunity waning over time may impact the epidemiological situation in the future.

For the most recent risk assessment, please visit [ECDC's dedicated webpage](#).

Actions

Detailed country-specific COVID-19 updates are available on ECDC's [website](#). For the latest update on SARS-CoV-2 variants of concern, please see [ECDC's webpage on variants](#).

For EU/EEA- and country-specific epidemiological trends and forecasts, visit ECDC's [Country Overview Report](#) (updated on Fridays). In addition to actions described in the latest [COVID-19 risk assessments](#), on 5 April 2023, ECDC published guidance entitled [Interim public health considerations for COVID-19 vaccination roll-out during 2023](#) to support countries with vaccination strategy decision-making. This guidance aims to offer advice on the optimal timing and targeting of vaccination campaigns in order to limit the continued burden of disease experienced by the elderly and those with comorbidities. It complements the guidance [Long-term qualitative scenarios and considerations of their implications for preparedness and response to the COVID-19 pandemic in the EU/EEA](#) published in August 2022 to support country preparedness activities in the post-acute phase of the COVID-19 pandemic.

2. West Nile virus One Health seasonal surveillance - 2023

Overview

This is the third weekly update of the 2023 WNV monitoring season.

Since the beginning of the 2023 transmission season, and as of 14 June 2023, EU/EEA countries have not reported any human cases of WNV infection. Similarly, EU-neighbouring countries have not reported any human cases of WNV infection.

Since the beginning of the 2023 transmission season, one outbreak among birds has been reported by Italy (on 12 May 2023, in Varese).

Please refer to the [West Nile virus infection webpage](#) for maps and a dashboard.

Sources: TESSy, Animal Disease Information System

ECDC assessment

In accordance with [Commission Directive 2014/110/EU](#), prospective blood donors should be deferred for 28 days after leaving a risk area for locally-acquired WNV infection, unless the result of an individual nucleic acid test is negative.

Actions

During transmission seasons, ECDC publishes a dashboard and an epidemiological summary every Friday.

Further information

Data on human cases are collected via The European Surveillance System (TESSy) managed by ECDC. Imported cases are not included in this report. The following EU-neighbouring countries report human cases of WNV infection to ECDC: Albania, Kosovo*, Montenegro, North Macedonia, Serbia, and Türkiye.

Animal data (i.e. outbreaks among equids and birds) are collected through the Animal Disease Information System (ADIS) of the European Commission. Reporting of WNV in equids and birds is mandatory at the EU/EEA level.

The distribution of human infections covers EU/EEA and EU-neighbouring countries, whereas the distribution of outbreaks among equids and birds only relates to EU/EEA countries.

*This designation is without prejudice to positions on status, and is in line with UNSCR 1244/1999 and the ICJ Opinion on the Kosovo declaration of independence.

3. Chikungunya and dengue – Multi-country (World) – Monitoring global outbreaks

Overview

Chikungunya virus disease (CHIKVD)

In 2023, as of 7 June, 214 317 cases and 281 deaths have been reported. The majority of cases have been reported from Brazil (124 270), Paraguay (85 889), Argentina (1 336), Bolivia (1 233) and Thailand (453). Deaths have been reported from Brazil (25) and Paraguay (256).

No autochthonous cases have been reported in Europe in 2023. In the Americas, in addition to Brazil, Paraguay, Argentina and Bolivia, according to [PAHO](#) as of 27 May, CHIKVD cases have also been reported from: Belize (197), Colombia (25), Costa Rica (27), El Salvador (18), Guatemala (199), Nicaragua (3), Peru (187), Uruguay (4) and Venezuela (173).

CHIKVD cases have also been reported in [Malaysia](#) (131, as of 21 May), [Philippines](#) (172, as of 13 May) and [Thailand](#) (453, as of 29 May).

Updates from selected countries

[Paraguay](#) has been reporting high circulation of CHIKV since the end of 2022. According to [data reported by PAHO](#) and as of week 16 of 2023, the country has seen an increase of over 200% in CHIKVD cases in 2023 compared to the average for the previous four years. In recent weeks, the CHIKVD cases notified in Paraguay have been decreasing, especially in the Central region.

[Bolivia](#) has also been reporting CHIKVD cases at higher rates than during the same period in the previous four years. According to information provided by [PAHO](#), the increased circulation in the southern hemisphere has also been linked to the broadening of the seasonality and circulation of the virus in new areas.

Note: the CHIKVD cases reported by Paraguay in the PAHO reports include probable and confirmed cases.

Dengue

In 2023, and as of 8 June, 2 162 214 cases and 974 dengue deaths have been reported globally.

No autochthonous cases have been reported in Europe in 2023.

The majority of cases globally have been reported from the region of the Americas. According to data reported by [PAHO](#), in 2023 and until end of May 2023, most cases in the region were reported from Brazil (1 515 460), Bolivia (126 182), Peru (115 949) and Argentina (99 456). Globally, as of May 2023, the majority of deaths have been reported from Brazil (387), Bolivia (70), Peru (166), and Argentina (59).

In the [French Antilles](#), based on the epidemiological report published on 1 June, 328 confirmed dengue cases have been reported in Guadeloupe, 134 in Martinique and 1 in Saint Martin in 2023.

All four dengue virus serotypes (DENV 1, DENV 2, DENV 3, and DENV 4) are currently circulating in the Americas. The figures for each country of the Americas region can be found on the [PAHO Health Information Platform](#).

In Asia, cases were reported in [Afghanistan](#) (187 as of 30 April), [Bangladesh](#) (1 624, as of 22 May), [Cambodia](#) (2 411 as of 14 May), China (12 as of 28 February), [Laos](#) (1 829 as of 14 May), [Malaysia](#) (43 619, as of 21 May), [Philippines](#) (39 947 as of 29 April), [Singapore](#) (3 191, as of 20 May), [Sri Lanka](#) (36 628, as of 24 May), and [Vietnam](#) (31 731 as of 14 May).

In Africa dengue cases have been reported in [Sao Tome and Principe](#), [Senegal](#) and [Sudan](#).

In addition, dengue cases have been reported in [Australia](#), [Fiji](#), [the Marshal Islands](#), [New Caledonia](#), [Vanuatu](#), [Wallis and Futura](#), [Maldives](#).

Update from selected countries

While all sub-regions of the Americas have reported dengue cases, most cases have been reported from the Southern Cone which includes Argentina, Brazil, Chile, Uruguay and Paraguay. Argentina is experiencing one of the largest dengue outbreaks in its history. According to the most recent data available in the [National Epidemiological report](#), in Argentina 110 990 cases of dengue and 60 deaths (case fatality rate 0.05%) had been reported up to week 21 of 2023. Case numbers for the weeks 8 to 21 have exceeded the weekly case numbers reported in 2020 for the same period, the year with the highest recorded number of cases prior to 2023. Autochthonous cases have been reported from all jurisdictions in the central region, the north-west and north-east regions, as well as in the provinces of San Luis and Mendoza in Cuyo region (west) and in La Pampa province in the south. The high case numbers seen in recent weeks have been decreasing in all areas. DENV 1 and DENV 2 are the serotypes with higher circulation.

Disclaimer

The data presented in this report originates from both official public health authorities and non-official sources, such as news media. Data completeness depends on the availability of reports from surveillance systems and their accuracy, which varies between countries. All data should be interpreted with caution and comparisons, particularly across countries, avoided, due to under-reporting, variations in surveillance system structure, varying case definitions between countries and over time, and use of syndromic definitions.

ECDC assessment

Chikungunya virus disease and dengue affect people in most countries of the tropics and sub-tropics. EU/EEA citizens travelling to the affected areas should apply personal protective measures against mosquito bites.

The likelihood of onward transmission of dengue and chikungunya virus disease in mainland EU/EEA is linked to importation of the virus by viraemic travellers into receptive areas with established and active competent vectors (e.g. *Aedes albopictus*). *Aedes albopictus* is established in a large part of Europe. The current likelihood of the occurrence of local transmission events of chikungunya and dengue viruses in areas where the vector is present in mainland EU/EEA is high, as the environmental conditions are favourable for vector activity and virus replication. The likelihood is expected to increase to very high in coming weeks as temperatures continue to increase. All autochthonous outbreaks of chikungunya virus disease and dengue in mainland EU/EEA have so far occurred between June and November.

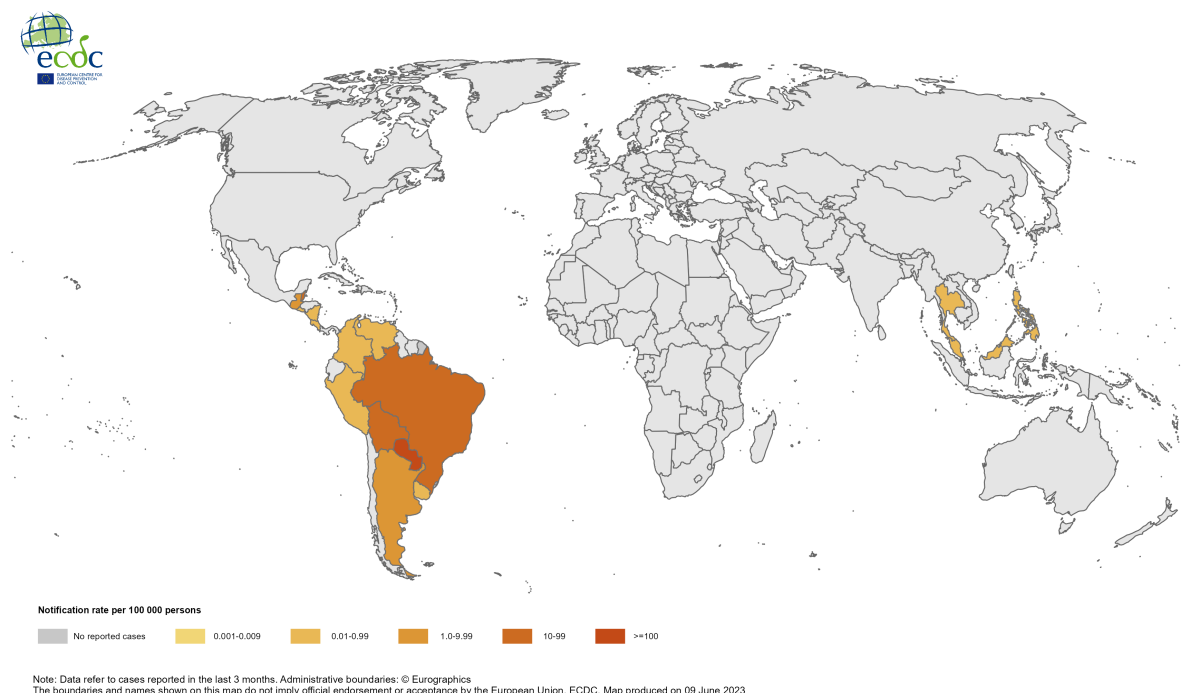
More information is available on ECDC's webpages on autochthonous transmission of chikungunya and dengue virus in the EU/EEA, and in ECDC's factsheets on dengue and chikungunya.

Actions

ECDC monitors these threats through its epidemic intelligence activities, and reports on a monthly basis. A summary of the worldwide overview of dengue and chikungunya virus disease is available on ECDC's website.

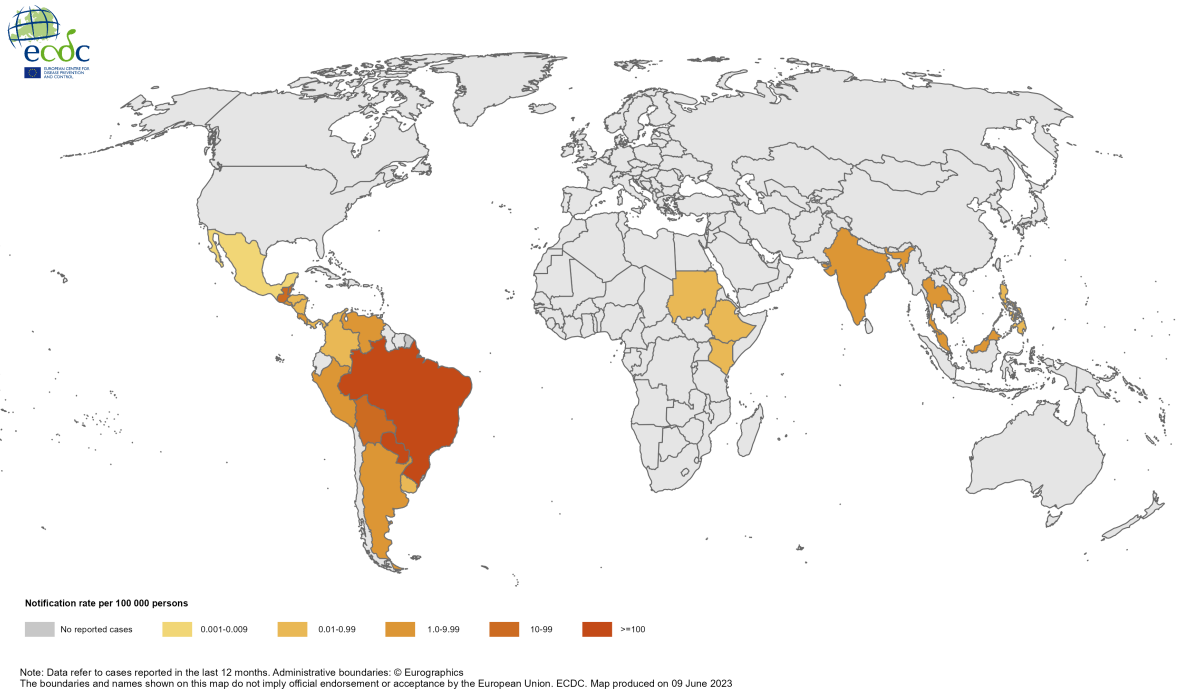
Maps and graphs

Figure 1. Three-month Chikungunya virus disease case notification rate per 100 000 population, March-May 2023



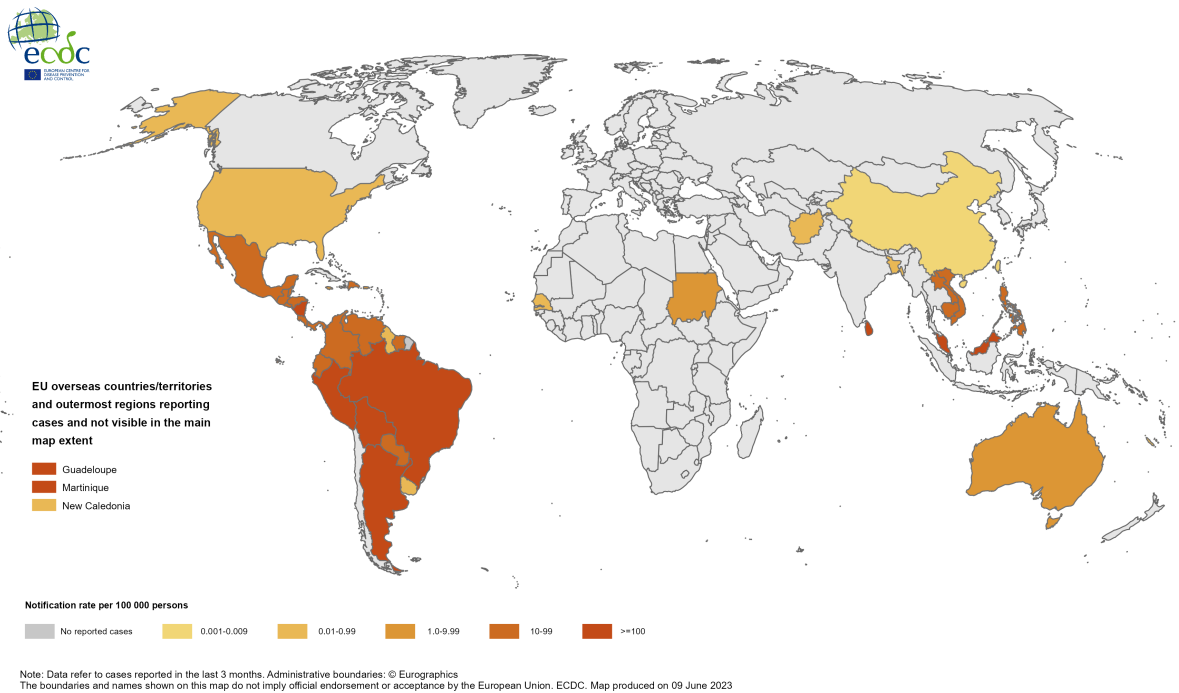
Source: ECDC

Figure 2. Twelve-month Chikungunya virus disease case notification rate per 100 000 population, June 2023-May 2023



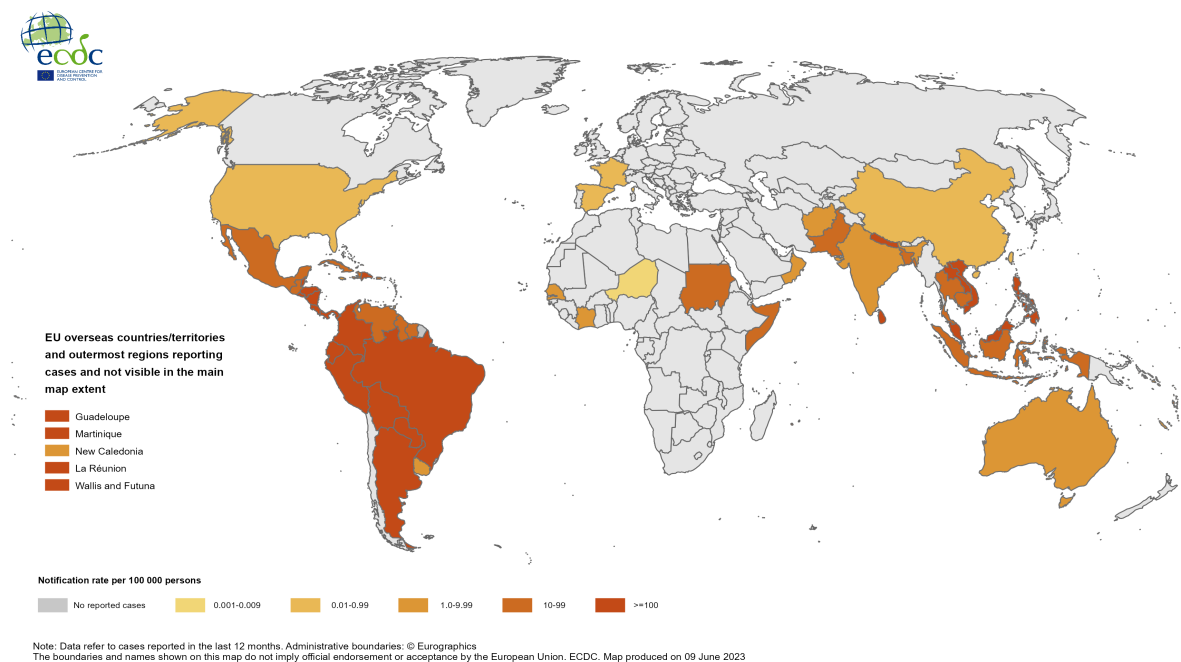
Source: ECDC

Figure 3. Three-month dengue virus disease case notification rate per 100 000 population, March-May 2023



Source: ECDC

Figure 4. Twelve-month dengue virus disease case notification rate per 100 000 population, June 2022-May 2023



Source: ECDC

4. Avian influenza A(H9N2) - Multi-country (World) - Monitoring human cases

Overview

Update: As of 12 June 2023, one new case of human infection with avian influenza A(H9N2) was reported in Sichuan province, China (China CDC influenza weekly report w22). There is no additional epidemiological information provided about this case.

The previous case reported on 29 May 2023 was a 7-month-old boy from Jiangxi province with onset of mild illness on 1 May 2023 ([China CDC influenza weekly report w19](#), [WHO report 898](#)). It is reported that he had exposure to backyard poultry and was not hospitalised. No additional cases were detected among family members of this case and there is no evidence of human-to-human transmission.

Summary: As of 12 June 2023, and since 1998, a total of 125 laboratory-confirmed cases, including two deaths, of human infection with avian influenza A(H9N2) viruses have been reported in eight countries: China (112), Egypt (4), Bangladesh (3), Cambodia (2), Oman (1), Pakistan (1), India (1), and Senegal (1). Most of the cases were children with mild disease.

Source: [WHO weekly update number 898](#), [China CDC Influenza weekly report \(w19 2023\)](#), [China CDC Influenza weekly report \(w22 2023\)](#)

ECDC assessment

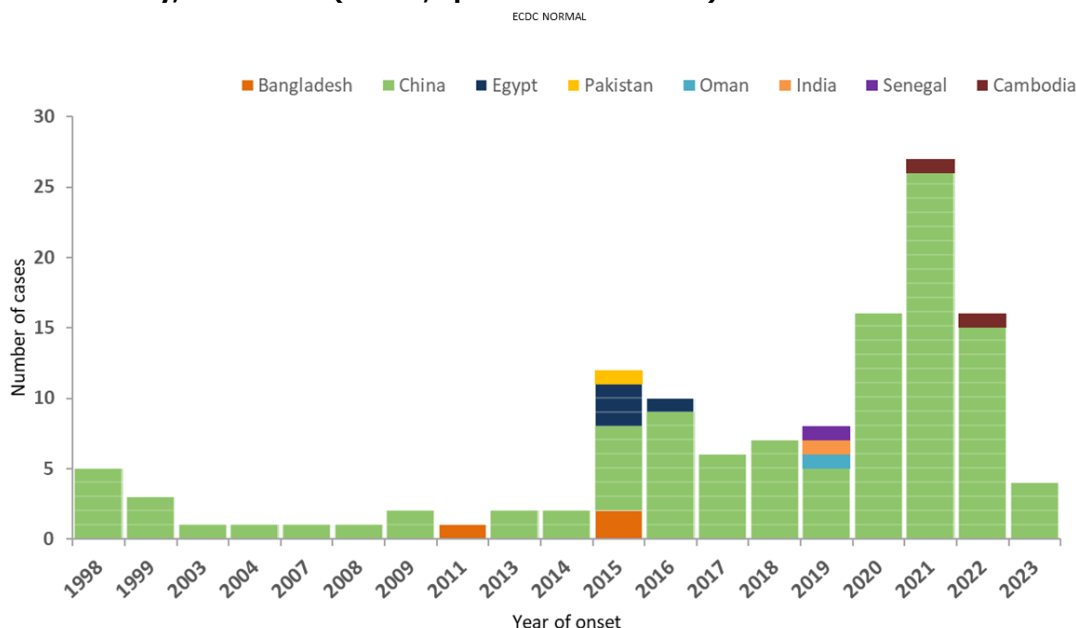
Sporadic human cases of avian influenza A (H9N2) have been observed outside the EU/EEA, mainly in young children. Influenza A(H9N2) is not present in Europe's poultry populations and therefore does not represent a risk for human health in the EU/EEA.

Actions

ECDC monitors avian influenza strains through its epidemic intelligence activities, disease experts and in collaboration with the European Food Safety Authority (EFSA) and the EU Reference Laboratory for Avian Influenza, in order to identify significant changes in the epidemiology of the virus. ECDC works with EFSA and the EU Reference Laboratory for Avian Influenza to produce a quarterly [report on the avian influenza situation](#). The most recent report was published in May 2023.

Maps and graphs

Figure 1. Distribution of confirmed human cases of avian influenza A(H9N2) virus infection by year of onset and country, 1998–2023 (n=125, updated 12 June 2023)



Source: ECDC

5. Measles – Multi-country (World) – Monitoring European outbreak

Overview

In April 2023, ten EU/EEA countries reported 46 confirmed cases of measles to The European Surveillance System (TESSy) (detailed data are available in [ECDC's Surveillance Atlas of Infectious Diseases](#)). The most recent cases were reported in Austria (15), Belgium (4), Estonia (1), France (2), Germany (7), Italy (2), Poland (3), Romania (7), Slovakia (3), and Sweden (2). Measles activity remains low. Overall, 242 cases were reported in 12 EU/EEA countries between January and April 2023.

As of 14 June 2023, complementary epidemic intelligence surveillance of official public and media sources had detected 22 new suspected and/or confirmed measles cases, reported in seven EU/EEA countries over the past month: Austria (2, ongoing outbreak), Estonia (2), Germany (12), Ireland (2), Poland (2), Spain (1), and Sweden (1). No other countries reported new cases or provided updates for previous periods.

So far in 2023, one measles-related death has been reported in the EU/EEA (the Netherlands), based on epidemic intelligence data.

Relevant updates for outside the EU/EEA are available for Armenia, Switzerland, Ukraine, and all WHO Regions: WHO EUROPE, WHO AFRO (including updates for the Democratic Republic of the Congo (DRC)), WHO EMRO, WHO PAHO, WHO SEARO, and WHO WPRO.

Disclaimer: The [monthly measles report published in the CDTR](#) provides the most recent data on cases and outbreaks based on information made publicly available by national public health authorities or the media. This report is a supplement to [ECDC's monthly measles and rubella monitoring report](#), based on data routinely submitted by 30 EU/EEA countries to TESSy. Data presented in the two monthly reports may differ.

Epidemiological summary for EU/EEA countries with epidemic intelligence updates since last month

[Austria](#) has reported 121 cases of measles in 2023. According to national report data, as of 13 June, there has been an increase by two cases (one in each Vienna and Carinthia) since 9 May. Styria is the most affected region, with 102 cases reported since the beginning of the outbreak in week 4 2023. Cases have also been reported from other regions Upper Austria (5), Lower Austria (4), Vienna (5), Carinthia (4), and Burgenland (1).

[Estonia](#) has reported three cases in 2023, two of which were reported in May, representing an increase of two cases since February 2023. No cases were reported in Estonia between 2020 and 2022.

[Germany](#) had reported 53 suspected and confirmed cases as of week 23 (ending 11 June 2023), an increase of 12 cases since week 18 (ending 7 May 2023). (Note: cases in Germany are reported based on a local case definition, therefore the number provided in this report is higher than the number reported to TESSy according to the EU case definition).

[Ireland](#) had reported two new cases as of week 22 (ending 3 June 2023), overall four cases have been reported in 2023 in Ireland.

Poland has reported 12 cases in 2023 and as of 31 May, there had been an increase of two cases since March, according to the bi-weekly national report.

[Spain](#) has reported three cases in 2023, one of which was imported and one related to an imported case, according to data for 4 June 2023 (bulletin number 23). This represents an increase of one case since March (bulletin number 13).

[Sweden](#) had reported a total of four cases as of 14 June 2023, an increase of one case since 10 May 2023. Two of the cases reported are from Stockholm and one each from the regions of Södermanland and Västra Götaland.

Relevant epidemiological summary for countries outside the EU/EEA

[Armenia](#) has reported 225 cases of measles according to media, quoting health authorities on 12 June 2023. Of these cases, nine individuals were hospitalised and 156 were children.

[Ukraine](#) has reported 15 cases in 2023, according to the monthly report for April. This represents an increase of six cases since March 2023.

[Switzerland](#) had reported 22 cases of measles in 2023 (as of 6 June). The number of cases had increased by 20 since the report for week 17 (ending 1 May 2023).

According to the WHO Regional Office for Europe ([WHO/EURO](#)) data for January – May 2023 (data access 14 June 2023), overall 3 851 cases had been reported in the Region. Of these 3 618 were in the following non-EU/EEA countries: Albania (3), Armenia (126) (new), Azerbaijan (1) (new), Belarus (1), Bosnia and Herzegovina (2), Georgia (7), Kazakhstan (269), Kyrgyzstan (315), North Macedonia (1) (new), Russia (1 051), Tajikistan (251), Türkiye (1 440), Ukraine (16), Serbia (40), Switzerland (8) United Kingdom (51), and Uzbekistan (36). According to the same report in the EU/EEA, 233 confirmed cases had been reported in Austria (119), Belgium (5), Denmark (1), Estonia (2), France (11), Italy (5), Germany (12), Poland (5), Romania (62), Spain (2), Slovakia (6) and Sweden (3).

Please note that numbers provided to WHO for EU/EEA countries are from TESSy data and, due to differences in reporting time, may not correspond to the data from epidemic intelligence screening.

According to the WHO Regional Office for Africa ([WHO AFRO](#)) report, as of 4 June (week 23) cases and outbreaks of measles in 2023 had been reported in the following countries: Botswana, Cameroon, Central African Republic, Chad, Democratic Republic of the Congo (DRC), Ethiopia, Kenya, Liberia, Mali, Mauritania, Niger, Senegal, South Africa, South Sudan, Zambia. WHO has closed measles events for the following countries: Ghana, Guinea, and Sierra Leone.

DRC is facing a resurgence of measles, reporting higher number of cases and deaths in May 2023 than in the same period in 2022. From week 1 to 18 (ending 7 May 2023), 99 176 suspected measles cases and 1 239 deaths (CFR: 1.2%) were reported from 459 health zones in all 26 provinces.

The measles outbreak in South Africa is continuing and in South Sudan measles are expected due to the influx of people coming from Sudan.

Due to varying reporting periods by the countries, please visit the latest available weekly bulletin.

According to the WHO Pan American Health Organization ([PAHO](#)) report, in weeks 1-22 of 2023 (ending 3 June 2023), 20 cases were reported by two countries: Canada (6) and the United States of America (14).

According to a WHO Western Pacific Region ([WPRO](#)) report for May 2023 (Vol 17, Issue 5), overall, there were 733 confirmed and clinically compatible cases (including 324 laboratory confirmed cases), and no deaths. The cases were reported by 12 countries: Australia (13), Cambodia (5), China (166), China, Hong Kong SAR (1), Japan (4), Malaysia (166), New Zealand (1), Papua New Guinea (7), the Philippines (355), Republic of Korea (2), Singapore (6), and Vietnam (7).

In the WHO Eastern Mediterranean Region (EMRO) from January to May 2023, a total of 25 462 cases of measles were reported from 21 countries. Most of the cases were reported in the following four countries: Yemen (14 441), Pakistan (5 024), Somalia (2 711), and Afghanistan (1 347). The update is provided from the WHO [Provisional monthly measles and rubella data](#) available on 14 June 2023.

In WHO South-East Asia Region (SEARO) between January and May 2023 there were 51 809 cases of measles reported by nine countries: Bangladesh (35), Bhutan (4), India (47 155), Indonesia (3 623), Maldives (1), Myanmar (3), Nepal (929), Thailand (56), Timor-Leste (3). The update is provided from the WHO [Provisional monthly measles and rubella data](#) available on 14 June 2023.

ECDC assessment

The substantial decline in measles cases reported by EU/EEA countries since March 2020, which has continued through 2022 and into 2023, contrasts with the usual annual and seasonal pattern for measles, which peaks during the spring in temperate climates. A similar decrease has been observed in other countries worldwide during the same period. Under-reporting, under-diagnosis, or a real decrease due to the direct or indirect effects of the COVID-19 pandemic measures may explain the observed decline in cases. Active measles surveillance and public health measures, including high vaccination uptake, provide the foundation for a proper response to possible increases in the number of cases/outbreaks.

Actions

ECDC is monitoring the measles situation through its epidemic intelligence activities, which supplement monthly outputs with measles surveillance data from The European Surveillance System (TESSy), routinely submitted by 30 EU/EEA countries. ECDC's latest advice on measles is available here: ['Who is at risk for measles in the EU/EEA?'](#) (published on 28 May 2019).

6. Monthly diphtheria epidemiological monitoring in the EU/EEA - 2023

Overview

Summary: In 2023, and as of 12 June, 45 diphtheria cases have been reported in the EU/EEA through The European Surveillance System (TESSy). Cases have been reported in Germany (35), Czechia (5), Latvia (3), Norway (1) and Slovakia (1).

This represents an increase of 17 cases since the previous update with data as of 8 May 2023. The 17 new cases have been reported from Germany (11), Czechia (3), Latvia (2) and Slovakia (1). Among the 17 new cases reported, two fatal cases were reported in Czechia (1) and Latvia (1). Slovakia reported a case for the first time in 2023.

Among all cases reported in 2023, 33 cases were caused by *Corynebacterium (C.) diphtheriae* and the remaining 12 cases were caused by *Corynebacterium (C.) ulcerans*. Forty of the 45 cases had a cutaneous clinical presentation (Germany (33), Czechia (4), Latvia (1), Norway (1) and Slovakia (1)), three cases had a respiratory presentation (Latvia (2) and Czechia (1)) and two cases were classified as other clinical presentations. In 2023, and as of 12 June, two fatal cases (Czechia (1) and Latvia (1)) have been reported in the EU/EEA. Both fatal cases were attributable to *C. diphtheriae* infections and were reported as not having been imported. The two fatal cases presented with cutaneous presentation (1) and respiratory presentation (1).

Among the 45 diphtheria cases reported in TESSy, eight cases were classified as imported cases, from Afghanistan (3), Syria (2), Croatia (1), Indonesia (1) and the Philippines (1). Fifteen cases were not imported, and the importation status was unknown for 22 cases.

ECDC has no information on community transmission or outbreaks of diphtheria in the broader EU/EEA population as a result of the increased number of diphtheria cases observed since the second half of 2022.

Other news: From 2 January to 23 May 2023, the [UK Health Security Agency](#) reported one confirmed case of diphtheria among asylum-seekers in England.

From 1 January to 6 June 2023, [Switzerland's Federal Office of Public Health](#) reported eight confirmed cases of diphtheria in the country.

Disclaimer: The monthly diphtheria epidemiological monitoring [published in the CDTR](#) provides the most recent data on cases and outbreaks, based on information made publicly available by national public health authorities or the media in the EU/EEA and detected during epidemic intelligence screening activities. This report also includes the data routinely submitted by 29 EU/EEA countries to TESSy.

Background: In 2023, and as of 12 June, 45 diphtheria cases were reported in the EU/EEA through TESSy. Cases were reported in Germany (35), Czechia (5), Latvia (3), Norway (1) and Slovakia (1).

In 2022, 177 diphtheria cases attributable to *C. diphtheriae* in the EU/EEA were reported to TESSy. In the same period, 31 diphtheria cases and one death attributable to *C. Ulcerans* in the EU/EEA were reported to TESSy.

Following the increase of diphtheria cases in migrants in the second half of 2022, ECDC adapted the TESSy metadata to allow for the reporting of additional variables, such as the country of origin of the case, if part of an ongoing cluster of cases, and whether the case shows resistance to antibiotic treatment. This is seen as a regular update of the metadata for routine diphtheria reporting, including after the end of the current outbreak. The uploading of data on cases linked to the ongoing outbreak in migrants should be prioritised. The mechanism to monitor the outbreak is the reporting of all diphtheria cases to TESSy on a monthly basis by the last day of each month. The data uploaded to TESSy will be published both in ECDC's online [Surveillance Atlas of Infectious Diseases](#) and in ECDC's Communicable Disease Threats Report (CDTR) on a monthly basis.

ECDC assessment

Diphtheria is a rare disease in EU/EEA countries. According to [WHO/UNICEF](#), immunisation coverage estimates for diphtheria tetanus toxoid and pertussis (DTP3) in 2021 in the EU/EEA varied across Member States, ranging from 85% (Austria) to 99% (Greece, Hungary, Luxembourg, Malta, and Portugal). Universal immunisation is the only effective method for preventing the toxin-mediated disease. This includes the administration of a booster dose of diphtheria toxoid if more than 10 years have passed since the last dose. The occurrence of the disease in fully-vaccinated individuals is very rare.

The increase in cases among migrants reported since the second half of 2022 in several EU/EEA countries is unusual and needs to be carefully monitored alongside the implementation of necessary public health measures to avoid the occurrence of more cases and further spread.

In this context, the probability of developing the disease is very low for individuals residing in the community, provided that they have completed a full diphtheria vaccination series and have an up-to-date immunisation status. Nevertheless, the possibility of secondary infections in the community cannot be excluded, and severe clinical diphtheria is possible in unvaccinated or immunosuppressed individuals.

Different recent scientific communications reported the occurrence of isolates showing a genomic profile suggestive of antimicrobial resistance in [Switzerland](#) and [Germany](#). [These findings](#) are preliminary and more evidence would be needed to assess the potential implications of these observations, including the adaptation of the currently recommended antibiotic treatment regimes. Nevertheless, similar observations in other European countries cannot be ruled out, and in view of these developments, ECDC recommends that antimicrobial susceptibility testing is performed on all *C. diphtheriae* isolates as a precautionary measure.

Actions

ECDC continues to monitor the diphtheria epidemiological situation in Europe and will provide monthly updates. The latest available information can be found on [EpiPulse](#), the [Surveillance Atlas of Infectious Diseases](#), and in [ECDC's CDTR](#).

7. Cholera - Lebanon - 2022/2023

Overview

Update: On 11 June 2023, the [Lebanese Ministry of Public Health](#) declared the end of the cholera outbreak in Lebanon as no new cholera cases have been confirmed since the end of February 2023.

In total, during the [outbreak](#), since 6 October 2022, there have been 671 confirmed cases and 23 deaths.

Summary: On 6 October 2022, the [Lebanese Ministry of Public Health](#) [reported](#) one cholera case in the country. According to the [Ministry](#), by 30 November 2022 a total of 4 594 confirmed cases and 20 fatalities had been reported in all eight governorates of Lebanon (Akkar, Baalbeck-Hermel, Beirut, Bekaa, Mount Lebanon, North Lebanon, Nabatiyeh, and South Lebanon). This was the first cholera outbreak in Lebanon since 1993.

On 24 October 2022, the Lebanese Ministry of Public Health issued a [Decision](#) to regulate cholera-related hospital costs. All charges for cholera treatment would be fully covered by the Lebanese Ministry of Public Health. On 25 October 2022, the [Lebanese Ministry of Public Health](#) reported that a field hospital was deployed in the Al-Iman Medical Center in Bebnîne, Akkar. The hospital was equipped with 20 beds and resource capacities to treat 500 affected people.

Actions

ECDC continues to monitor cholera outbreaks globally through its epidemic intelligence activities in order to identify significant changes in epidemiology and to facilitate the proper updates to public health authorities. Reports are published on a monthly basis.

8. Echovirus 11 infections in neonates - multi-country- 2022-2023

Overview

Update: On 15 June 2023, a scientific article was published in the [Eurosurveillance](#) journal reporting two cases of fulminant hepatitis in Italy linked with echovirus 11 (E11) infection. The cases are non-identical, male, late pre-term twin brothers who were transferred in April to the neonatal intensive care unit (NICU) due to episodes of apnoea requiring respiratory support. Enterovirus (EV) typing was performed in urine and plasma specimens by whole genome sequencing (WGS) and showed the presence of E11. The phylogenetic and molecular analysis concluded that the Italian E11 strains clustered with French strains collected in 2023, which together composed a divergent lineage. The mother presented with a single episode of fever at 35 weeks and two days of gestational age. The infants were born the following day. No specimens were collected from the mother for virological investigations.

Background

On 28 April 2023, the French Paediatric Society with data from the National Reference Centre for Enterovirus reported that since July 2022, nine neonates had presented with severe sepsis, complicated by hepatic failure, and neurological or myocardial involvement due to infection with E11 in France. Seven neonates died. Reported cases were predominantly male, including four pairs of premature twins and a full-term singleton. Five of nine neonates were born with low birth weight. All cases presented clinical signs between three and six days of age. Maternal clinical symptoms, such as fever and gastrointestinal signs, were reported in four of five mothers during the three days before or on delivery. Seven cases are reported to have occurred in the context of confirmed vertical transmission. According to the French EV surveillance, E11 was the predominant circulating EV in 2022 in neonates (30.2% of identified viruses). It is also reported that circulation of a new variant of E11 has been occurring since June 2022 in metropolitan France and in certain Overseas Countries and Territories (New Caledonia and Réunion).

Several outbreaks due to E11 infection in neonates, including some which are healthcare-acquired, have been previously reported ([1964](#), [1973](#), [1979](#), [1985](#), [2004](#), [2018](#)). Some of the outbreaks are reported to have occurred in the context of community circulation of E11.

ECDC assessment

EV are a group of viruses that usually cause self-limited to mild illness. In certain populations, such as neonates, infection by specific serotypes of EV can cause severe illness. The most relevant EV subspecies in neonatal infections include Coxsackievirus B and Echovirus, including multiple distinct serotypes.

Clinical manifestations of EV infection may range from asymptomatic, acute febrile illness to life-threatening disseminated disease. E11 infection in neonates may be associated with [severe clinical features](#), such as sepsis, myocarditis, and meningitis. The most characteristic clinical syndrome in neonates infected with E11 is fulminant hepatitis presenting with profuse bleeding, jaundice and multiple organ failure.

EV are predominately transmitted via faecal -oral and respiratory routes. For previously reported cases of E11 infection in neonates, modes of transmission included vertical transmission (prenatal transplacental or during childbirth), postnatal human-to-human contact, as well as being spread through nurseries by caregivers and neonatal intensive care units by healthcare workers. Transmission by breastfeeding was also reported to be possible.

For previously reported clusters of E11 infection in neonates, infection and death outcomes have been more frequently associated with E11 infection when compared with other EV infections in the same population. For the currently reported cases, and according to the report from French authorities, the high fatality rate observed should be interpreted within the context of neonatal infection within the first seven days of life, prematurity and low birth weight in multifetal pregnancies, and potential changes in the virulence of the circulating E11 genetic lineage.

There are currently no vaccines against EV other than poliovirus, including E11. Overall good hygiene practices, such as frequent handwashing, and good infection control measures are essential to reduce the risk of infection. Standard precautions are recommended for all the hospitalised patients with EV infection and additional contact

precautions in neonates and diapered children. Pregnant women near term are advised to avoid contact with people with cold-like or gastrointestinal infections.

Neonates presenting with unexplained sepsis, shock, signs of myocarditis, or hepatic failure, and particularly newborns whose mother or caregiver has experienced acute illness in the days preceding childbirth should be considered for testing of EV and further EV typing. Specimen types to consider are stool, blood, respiratory specimens and cerebrospinal fluid. For detected E11 infections, it is recommended that samples are made readily available for molecular typing to EV reference laboratories or according to existing routine surveillance of EV.

Although some countries have EV surveillance, there is no systematic European-wide EV surveillance in place in the EU/EEA. It is therefore difficult to estimate the extent of the current severe neonatal E11 infections or background rates for circulation of E11 viruses in the population. If there is no EV surveillance in place, only the most severe cases will probably be detected through active efforts to test and type specimens from such cases.

Based on the available information, ECDC assesses the likelihood of infection with E11 among the neonatal population to be very low, with a high level of uncertainty. The impact of infection is estimated to be moderate, with a high level of uncertainty. Therefore, the overall public health risk for the neonatal population of the EU/EEA is currently estimated to be low. ECDC will reassess the risk once more information becomes available.

On 8 August 2016, ECDC published a [Rapid Risk Assessment on enterovirus](#) detections associated with severe neurological symptoms in children and adults in European countries.

Actions

ECDC encourages countries to notify any unusual occurrence of E11 infections through EpiPulse (2023-EIP-00026). Reporting of unusual EV cases and clusters through Early Warning and Response System (EWRS) in EU/EEA countries is also encouraged.

ECDC is in contact with public health authorities in affected Member States, as well as expert networks and clinicians, and will continue to monitor this event through its epidemic intelligence activities.

9. Mass gatherings - Hajj - Saudi Arabia - 2023

Overview

This year, the annual Islamic Hajj pilgrimage will take place between 26 June and 1 July in Saudi Arabia. Pilgrims aged 12 years and above will be allowed to attend. On average, the pilgrimage attracts over two million people, 0.6 million of whom are from Saudi Arabia and around 1.5 million from other countries across the world. In 2021 and 2022, restrictions were applied due to the COVID-19 pandemic, limiting the number of pilgrims. According to the authorities, pilgrims from 57 countries will attend Hajj in 2023, and these include 24 EU/EEA countries: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech, Denmark, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Spain, Sweden, and other European countries: Switzerland, United Kingdom, Ukraine.

The [Ministry of Health of Saudi Arabia](#) has issued a list of requirements and recommendations for this event. The main recommendations of relevance for travellers coming from EU/EEA countries are listed below. In addition, preventive measures are foreseen by the Saudi Arabian authorities at points of entry, related to diseases such as COVID-19 (vaccine requirement), meningococcal meningitis, poliomyelitis (additional vaccination at point of entry if coming from countries with detected WPV1 or cVDPV1), Yellow fever (valid certificate requested), Zika virus disease and dengue fever (valid certificate).

Before the Hajj

Required vaccinations for pilgrims from all countries:

- **COVID-19:** from 12 years of age, approved vaccines are listed [here](#).
- **Meningococcal disease:** quadrivalent vaccine (serogroups A,C, Y and W135) given within three years prior to arrival if vaccinated with polysaccharide vaccine, and within five years if vaccinated with conjugate vaccine. If there is no clear indication of the type of vaccine in the certificate it will be considered valid for three years only.
- **Poliomyelitis** and **Yellow fever** vaccinations are required for travellers coming from affected countries or areas at risk, based on a list of criteria and a list of countries/areas as stated on the [website of the Saudi Ministry of Health](#).

Recommended vaccinations

- **Poliomyelitis:** at least one dose of IPV* or OPV** (if IPV is not available) is recommended for travellers coming from countries reporting positive environmental samples of cVDPV2 (no EU/EEA countries listed, for details please visit the [website of the Saudi Ministry of Health](#)).

*bOPV or IPV dose administered within 12 months and no less than four weeks prior to arrival.

** OPV dose administered within six months and no less than four weeks prior to arrival.

- **Seasonal influenza** vaccine is recommended for people coming to Hajj from all countries, in particular for those considered at risk, such as pregnant women, children below five years of age, the elderly, individuals with chronic medical conditions (such as chronic cardiac, pulmonary, renal, metabolic, neurodevelopmental, liver, or hematologic diseases) and individuals with immunosuppressive conditions (such as HIV/AIDS, those receiving chemotherapy or steroids for malignancy).
- Updated vaccination against **diphtheria, tetanus, pertussis, polio, measles, varicella** and **mumps**.

Other recommendations

Pilgrims are advised to consider their physical ability and health conditions, keeping in mind that there is an increased risk of infectious diseases for the elderly and those with severe chronic diseases such as advanced cancers, heart and respiratory diseases, advanced liver or kidney diseases, and senility. Those with chronic conditions should have documentation on their health condition and bring a sufficient amount of medicines in their original packaging.

During the stay

Personal and food hygiene recommendations include:

- Wash hands with soap and water or a disinfectant, especially after coughing and sneezing, after using toilets, before handling and consuming food, and after touching animals.
- Use disposable tissues when coughing or sneezing and dispose of used tissues in a wastebasket.
- Wear regular face masks when in crowded places.
- Avoid contact with those who appear ill and avoid sharing their personal belongings.
- Avoid visits and contact with camels in farms, markets, or barns, and avoid drinking unpasteurised milk or eating raw meat or animal products that have not been thoroughly cooked.
- Pilgrims are recommended to take necessary measures to avoid mosquito bites during the day and evening, which includes wearing protective clothing (preferably light-coloured) that covers as much of the body as possible; using physical barriers such as window screens and closed doors; and applying insect repellent (as per the label instructions on the product) to skin or clothing that contains DEET, IR3535 or Icaridin.

After the Hajj

Travellers returning from the Hajj should seek medical attention immediately if they experience symptoms suggestive of any type of infection - e.g. gastrointestinal or respiratory. They should also mention their travel history to their healthcare provider.

Due to the presence of MERS-CoV disease in Saudi Arabia, people returning from the Hajj should be made aware of the need to seek immediate medical advice if they have a fever (38°C and over), cough or difficulties breathing within 14 days of their return.

Travel history and previous hospitalisation should be reported to the healthcare provider if a person returning from the Hajj requires hospitalisation within one year of returning. This is to ensure that the possible acquisition of antimicrobial-resistant (AMR) bacteria will be considered and that appropriate measures can be taken in accordance with national guidelines for the prevention of AMR.

Outbreaks of MERS-CoV were last reported from the Arabian Peninsula in 2022. To date, no new cases have been reported with disease onset in 2023.

ECDC assessment

The risk to EU/EEA citizens of infection with communicable diseases during the 2023 Hajj is considered to be low, due to the vaccination requirements for travelling to Mecca and the Saudi Arabian preparedness plans that address the management of health hazards before, during, and after Hajj. The risk of infection is considered to be moderate for people with underlying conditions, the elderly and pregnant women, with a moderate probability of infection and moderate impact. As with other mass gathering events, the risk of communicable disease outbreaks is highest for respiratory and food- and waterborne diseases, and vector-borne diseases.

The risk of vaccine-preventable and vector-borne diseases is considered low if preventive measures are applied. A risk of infection and importation of cases to Europe after the Hajj remains. ECDC published a rapid [risk assessment on Hajj on 2 July 2019](#); the risks and advice to pilgrims attending the Hajj remain valid for this year.

Actions

ECDC monitors this event through its intelligence for mass gatherings activities between 19 June and 7 July 2023 in collaboration with WHO/EMRO and includes weekly updates in the Communicable Disease Threats Report (CDTR).