



COMMUNICABLE DISEASE THREATS REPORT

Week 21, 20-26 May 2012

All users

This weekly bulletin provides updates on threats monitored by ECDC.

I. Executive summary **EU Threats**

Legionellosis - Spain and UK - Travel-associated cluster Latest update: 24 May 2012

Opening date: 13 January 2012

An outbreak of 25 cases of Legionnaires' disease, including six deaths, has been ongoing since November 2011, in relation with a hotel in Calpe, Spain. Twenty-two of the cases are travel-associated and three cases are among hotel staff. The cases had onset of illness between November 2011 and May 2012. All cases are associated with one hotel in the town of Calpe, in the province of Alicante, Spain, indicating a continuous source outbreak at the hotel, despite control measures implemented since January 2012.

→Update of the week

Four new cases have been reported since the control measures were implemented in February 2012, one case with symptom onset in March 2012 and three with symptom onset during the first half of May.

Measles - Multistate (EU) - Monitoring European outbreaks

Opening date: 9 February 2011 Latest update: 22 May 2012

Measles is still endemic in many countries of Europe due to a low uptake of immunisation. In the past decade the susceptible population has increased, leading to a resurgence of the disease. More than 30 000 cases were reported in EU Member States in each of the last two years.

So far in 2012, the number of outbreaks and reported cases in the Member States are much lower than during 2011 and 2010. In neighbouring Ukraine, an ongoing major outbreak is of concern, with more than 9 600 cases reported in 2012.

→Update of the week

From 19 to 25 May there were no new outbreaks detected in the EU Member States. The earlier reported outbreak in Ireland is increasing. The outbreaks in the UK are still ongoing.

Influenza - Multistate (Europe) - Monitoring 2011-2012 season

Opening date: 2 December 2011 Latest update: 24 May 2012

Following the 2009 pandemic, influenza transmission in Europe has returned to its seasonal epidemic pattern with peaks seen during winter months. ECDC monitors influenza activity in Europe during the winter seasons and publishes the results on its website in the Weekly Influenza Surveillance Overview.

From now on seasonal influenza will not be included in the CDTR until the start of the next influenza season.

→Update of the week

All reporting countries but Slovakia reported low intensity.

Non EU Threats

Influenza A(H5N1) - Multistate (world) - Monitoring human cases

Opening date: 15 June 2005 Latest update: 3 May 2012

The influenza A(H5N1) virus, commonly known as bird flu, is fatal in about 60% of human infections, and sporadic cases continue to be reported, usually after contact with sick or dead poultry from certain Asian and African countries. No human cases have been reported from Europe.

→Update of the week

In the period 19 to 24 May 2012, no new human cases of avian influenza A(H5N1) were notified by WHO.

Chikungunya - Multistate (world) - Monitoring seasonal epidemics

Opening date: 7 July 2005 Latest update: 24 May 2012

ECDC monitors reports of chikungunya outbreaks worldwide through epidemic intelligence activities in order to identify significant changes in epidemiologic patterns.

In metropolitan France, the seasonal surveillance for *Aedes Albopictus* started on 1 May 2012. In addition, from the beginning of the year to 16 May 2012, six autochthonous cases has been confirmed in Mayotte (French overseas department).

Dengue - Multistate (world) - Monitoring seasonal epidemics

Opening date: 20 April 2006 Latest update: 24 May 2012

Dengue fever is one of the most prevalent vector-borne diseases in the world, affecting an estimated 50 to 100 million people each year, mainly in the tropical regions of the world. There are no important recent developments in global dengue epidemiology. However, the identification of sporadic autochthonous cases in non-endemic areas in 2010 and 2011 highlights the risk of occurrence of locally acquired cases in EU countries where the competent vectors are present.

→Update of the week

There have been no reports of autochthonous dengue infections in Europe so far in 2012.

Poliomyelitis - Multistate (world) - Monitoring global outbreaks

Opening date: 8 September 2005 Latest update: 24 May 2012

Polio, a crippling and potentially fatal vaccine-preventable disease mainly affecting children under five years of age, is close to being eradicated from the world after a significant global public health investment and effort. The WHO European Region is polio-free. Sixty cases have been reported in 2012 worldwide so far.

→Update of the week

Between 19 and 24 May 2012, five polio cases were reported by WHO.

II. Detailed reports

Legionellosis - Spain and UK - Travel-associated cluster

Opening date: 13 January 2012 Latest update: 24 May 2012

Epidemiological summary

Since 16 December, 22 cases of travel-associated Legionnaires' disease (TALD) have been notified to the ELDSNet Surveillance Network. All travellers (16 residents from the United Kingdom, three from Spain, two from France and one from Belgium) stayed at the hotel between 25 November 2011 (first arrival) and 2 May 2012 (last departure). Dates of disease onset range from 22 November 2011 to 11 May 2012. An additional three cases have been detected in hotel staff; dates of onset of disease are 20 December 2011, 1 and 21 January 2012, respectively.

All but three travel-associated cases have been confirmed by urinary antigen tests. Two clinical isolates have been typed in the United Kingdom and were both found to be *L. pneumophila* serogroup 1, mAb subgroup 'Allentown/France', DNA-sequence type ST23. The average age of the TALD cases is 73 years (ranging from 44 to 89) and the gender distribution is eleven males to eleven females.

This hotel was associated with a cluster in 2006 involving seven cases. No risk installations in the surrounding area, such as cooling towers, have been identified.

The regional health office and epidemiological department are leading investigations in the hotel. A preliminary outbreak report regarding the outbreak was published in February 2012. Since February, control measures taken include daily determination of chlorine (in the tap water system) and bromine (in the whirlpool installation) levels, pH and temperature in the hot and cold water system, control inspections regarding the working conditions, measurements taken by the public health authorities, as well as water sampling.

Results of 161 water samples are available. All samples from the tap water system have been found to be negative. However, results from water samples taken at the whirlpool have been found positive on March 1 (very low positivity), on April 18 and on May 8. The results of whirlpool sampling on 29 February and 5 March were negative. Following the first two positive results, control measures, such as increasing the bromine levels and cleaning and disinfection of the installations, were requested by the public health authorities. The third (highly) positive result on 8 May was followed by closure of the whirlpool on the same day. Upon implementation of an action plan proposed by the public health authorities, the whirlpool has been reopened on 13 May.

According to Spanish authorities, tour operators have been informed and were asked to inform all tourists that stayed at the hotel from mid April until May about the need to consult a physician should symptoms appear. The number of guests at the hotel in the period of 24 April until 8 May is reportedly 2 387 persons from 15 nationalities. The hotel was closed from 2 until 10 February 2012 and the spa installations have been closed between 8 and 13 May. The epidemiological investigations of the last four cases are currently ongoing.

ECDC assessment

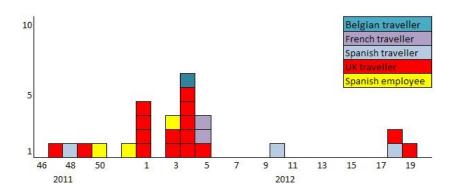
The close clustering of the cases suggests an outbreak from a source within the hotel. However, environmental investigations have been conducted by and on the request of public health authorities in order to identify the source of this outbreak. The investigation thus far has indicated the whirlpool to be the most probable source of infection but in the absence of an identified and controlled source of Legionella in the hotel, there may be an ongoing risk of exposure to Legionella for hotel guests and persons working in the hotel.

Actions

Updated cluster notifications have been sent to all ELDSNet members and tour operators. ECDC published an update of the rapid risk assessment regarding this situation on 24 May 2012 on its website.

Travel associated Legionnaires' disease, Calpe, Spain 2012

ELDSNet



Measles - Multistate (EU) - Monitoring European outbreaks

Opening date: 9 February 2011 Latest update: 22 May 2012

Epidemiological summary

I. European Union Member States

*UK –update*Source: HPA

The Cheshire and Merseyside outbreak has reached 260 confirmed cases (an increase of 25 cases since last week). There is a measles cluster in a primary school in the Worcestershire area with eight confirmed and four suspected cases. None of the cases were vaccinated.

*Ireland –update*Source: the media

The number of confirmed measles cases in the West Cork outbreak has risen to 31. The national uptake for the MMR vaccine in children aged 24 months was 92% in 2011, but in the West Cork area, it was just 86%. The last very large national measles outbreak occurred in 2000, when over 1 600 cases were reported and there were 3 measles-associated deaths. The last large outbreak in West Cork occurred in 2009/10, when 68 cases were reported. In 2011, no cases were reported in West Cork.

II. Neighbouring Countries

Ukraine Source: <u>MOH</u>

The latest figure from the Ministry of Health on 23 May 2012 shows 9 678 cases of measles registered in six western oblasts since the beginning of the year.

III. Publications

ECDC posted a new issue of the EMMO and WHO published the latest Epidemiological brief on their website.

Web sources: Latest ECDC Monthly Measles Monitoring | ECDC/Euronews documentary | MedISys Measles Webpage | EUVAC-net ECDC | ECDC measles factsheet | ECDC RRA on the measles outbreak in Ukraine |

ECDC assessment

A decline in the uptake of immunisation in the past decade in Europe has increased the susceptible population, and measles has

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re-emerged in the region. When the number of susceptible individuals increases, the incidence of measles increases as well, and the interval between epidemic peaks decreases.

Transmission follows the traditional seasonal pattern of measles. Last year's outbreaks in Europe peaked in May and declined over the rest of the year. This year measles transmission is at a much lower level during the ongoing peak transmission season compared to the previous two years. Only three countries have noted large outbreaks in 2012: the UK, Romania and Spain.

ECDC closely monitors measles transmission and outbreaks in the EU and neighbouring countries in Europe through enhanced surveillance and epidemic intelligence activities. The countries in the WHO European Region, which include all EU Member States, have committed to eliminate measles and rubella transmission by 2015. Elimination of measles requires consistent vaccination coverage above 95% with two doses of measles vaccine in all population groups, strong surveillance and effective outbreak control measures.

Actions

In June 2012, Ukraine and Poland will host the UEFA European Championship with hundreds of thousands of visitors expected from several European countries. ECDC has prepared a <u>rapid risk assessment</u> to assess the risk of visitors to Ukraine becoming infected and subsequently importing and spreading measles within the EU on their return.

Influenza - Multistate (Europe) - Monitoring 2011-2012 season

Opening date: 2 December 2011 Latest update: 24 May 2012

Epidemiological summary

The 2011-2012 season is now drawing to a close.

- All reporting countries but Slovakia reported low intensity.
- Of 119 sentinel specimens tested by 22 countries, 6.7% were positive for influenza virus.
- During week 20/2012, three cases of severe acute respiratory infection or severe influenza were reported. The 2011–2012 season is coming to its end. The season has been dominated by A(H3) viruses with no antiviral resistance. Among B viruses, both Victoria and Yamagata-lineage viruses have made a substantial contribution toward the end of the season. The weekly report will be replaced by a fortnightly report during the off-season period (weeks 21–39/2012).

Web source: ECDC Weekly Influenza Surveillance Overview

ECDC assessment

The decrease in the proportion of influenza-positive sentinel specimens together with the growing number of countries reporting continuously decreasing trends in the incidence of influenza-like illness or acute respiratory infection indicate that the epidemic peak has passed in most European countries.

Influenza A(H5N1) - Multistate (world) - Monitoring human cases

Opening date: 15 June 2005 Latest update: 3 May 2012

Epidemiological summary

In the period 19 to 24 May 2012, no new human cases of avian influenza A(H5N1) were notified by WHO. Since 2003, 603 cases (including 356 deaths) have been notified in 15 countries. Of these, 25 (including 16 deaths) were notified in 2012.

Web sources: ECDC Rapid Risk Assessment | WHO Avian Influenza | Avian influenza on ECDC website

ECDC assessment

Most human infections are the result of direct contact with infected birds, and the World Health Organization notes it has never identified a 'sustained human-to-human spread' of the virus since it re-emerged in 2003. Countries with large poultry populations in close contact with humans are considered to be most at risk of bird flu outbreaks. Hong Kong reported the world's first recorded major outbreak of bird flu among humans in 1997, when six people died.

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ECDC follows the worldwide A(H5N1) situation through epidemic intelligence activities in order to identify significant changes in the epidemiology of the virus. ECDC re-assesses the potential of a changing risk for A(H5N1) to humans on a regular basis. There are currently no indications that from a human health perspective there is any significant change in the epidemiology associated with any clade or strain of the A(H5N1) virus. This assessment is based on the absence of sustained human-to-human transmission, and on the observation that there is no apparent change in the size of clusters or reports of chains of infection. However, vigilance for avian influenza in domestic poultry and wild birds in Europe remains important.

Chikungunya - Multistate (world) - Monitoring seasonal epidemics

Opening date: 7 July 2005 Latest update: 24 May 2012

Epidemiological summary

Since the beginning of the year, no outbreaks were reported in Europe.

In the EU, seasonal surveillance activities are ongoing in the South of France since 1 May 2012 according to their surveillance plan. The aim is to identify imported cases early in order to take appropriate control measures to prevent further spread. According to Institut de Veille Sanitaire (InVS), six autochthonous cases have been reported in Mayotte since the beginning of the year. Among these cases, four are from the centre of the Island, one from the south and one in Mamoudzou.

Web sources: NaTHNaC Chikungunya Global Update | New Caledonia | MedISys Chikungunya | InVS

ECDC assessment

Although the geographic range of the virus is primarily in Africa and Asia there has been a rapid expansion of epidemics over the past few years to new regions of the world due to the worldwide distribution of the main vectors, Aedes albopictus and Aedes aegypti, through increased human travel. There is a risk of further importation of the chikungunya virus into new areas by infected travellers.

With six cases reported between end of March and end mid-May 2012, the circulation of the virus in Mayotte is still limited. The last major chikungunya outbreak in Mayotte was in 2005-2006 where 6 443 cases were reported. As the vector is present in Mayotte and as Mayotte has a geographical proximity with a country were chikungunya is endemic, the introduction of the virus resulting in an autchotonous circulation in the island us is not unexpected.

Dengue - Multistate (world) - Monitoring seasonal epidemics

Opening date: 20 April 2006 Latest update: 24 May 2012

Epidemiological summary

Europe: No autochthonous cases have been reported to date in 2012.

Overseas territories:

La Reunion: In the past three weeks, two probable cases were identified. Since the beginning of the year, 22 autochthonous cases have been reported. Among them, seven are confirmed and 15 probable. The situation is considered as stable by the health

Mayotte: Since the beginning of the year, 43 confirmed cases notified in Mayotte. The serotypes are DENV-1 and DENV-2.

Asia: Dengue activity is variable. While Australia, Cambodia, Lao PDR and Malaysia have reported more cases in 2012 than 2011 for the same time period, the trend is declining in Australia and remains low in Malaysia. Cambodia continues to see high activity.

Web sources:

DengueMap CDC/HealthMap| MedISys dengue|ProMED dengue latest update| ECDC dengue fever factsheet| MoH France, starting of 2012 seasonal surveillance activities | InVS for La Reunion | InVS for mayotte |

ECDC assessment

ECDC monitors individual outbreaks, seasonal transmission patterns and inter-annual epidemic cycles of dengue through epidemic intelligence activities in order to identify significant changes in disease epidemiology. Of particular concern is the potential for the establishment of dengue transmission in Europe. Local transmission of dengue was reported for the first time in France and Croatia in 2010 and imported cases were detected in other European countries, highlighting the risk of locally acquired cases

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occurring in countries where the competent vectors are present.

A review of status and public health importance of invasive mosquitoes in Europe has been funded and coauthored by ECDC and was published on 30 April 2012. A <u>summary</u> is available on ECDC website.

Poliomyelitis - Multistate (world) - Monitoring global outbreaks

Opening date: 8 September 2005 Latest update: 24 May 2012

Epidemiological summary

Between 19 and 24 May 2012, five polio cases were notified in Nigeria (3 WPV1 and 2 WPV3).

So far, 60 cases with onset of disease in 2012 have been reported globally compared with 166 for the same period in 2011. The 60 cases were reported from Nigeria (35), Pakistan (16), Afghanistan (6) and Chad (3). With a total of 35 cases in 2012, Nigeria is the global epicentre of polio transmission, accounting for 58% of global cases this year. Additionally, Nigeria is the only country in the world affected by transmission of all three serotypes: WPV1, WPV3 and an ongoing circulating vaccine-derived poliovirus type 2 (cVDPV type 2).

During this week's World Health Assembly held in Geneva, the adoption of a resolution declaring polio eradication a programmatic emergency for global public health will be considered.

Web sources: Polio Eradication: weekly update | MedISys Poliomyelitis | ECDC Poliomyelitis factsheet

ECDC assessment

ECDC follows reports of polio cases worldwide through epidemic intelligence in order to highlight polio eradication efforts and to identify events that could indicate the re-introduction of wild poliovirus (WPV) into the EU.

The WHO European Region is polio-free. The last polio cases in the European Union occurred in 2001 when three young Bulgarian children of Roma ethnicity developed flaccid paralysis from WPV. Investigations showed that the virus originated from India. The latest outbreak in the WHO European Region was in Tajikistan in 2010 when WPV1 imported from Pakistan caused an outbreak of 460 reported cases. The last indigenous WPV case in Europe was in Turkey in 1998. An outbreak in the Netherlands in a religious community opposed to vaccinations caused two deaths and 71 cases of paralysis in 1992.

The Communicable Disease Threat Report may include unconfirmed information which may later prove to be unsubstantiated.