



This report is published weekly on the [website](#). For further information on the surveillance schemes mentioned in this report, please see the [website](#) and the [related links](#) at the end of this document.

Report contents:

| [Summary](#) | [GP consultation rates](#) | [Community surveillance](#) | [Microbiological surveillance](#) | [Hospitalisations](#) | [All-cause mortality](#) | [Vaccination](#) | [International](#) | [Acknowledgements](#) | [Related links](#) |

Summary

Although community influenza indicators remain low, influenza-confirmed ICU/HDU and hospital admissions remain elevated. A [letter](#) has been issued recommending the use of antivirals where appropriate.

- Overall weekly influenza GP consultation rates across the UK
 - In week 8 (ending 23 February 2014), overall weekly influenza GP consultations remained low in England (2.0 per 100,000), Wales (6.5 per 100,000), Scotland (21.5 per 100,000) and Northern Ireland (33.9 per 100,000).
 - In week 8 syndromic surveillance indicators for influenza remain stable and below seasonally expected levels.
 - One new acute respiratory outbreak has been reported in the past seven days across the UK in a hospital (positive for influenza A(H1N1)pdm09).
- Virology
 - In week 8 2014, 160 influenza positive detections were recorded through the DataMart scheme (111 A(H1N1)pdm09, 18 A(H3), 29 A(not subtyped) and two B, a positivity of 17.4% compared to 18.3% in week 7), with the highest positivity reported in 15-44 year olds (22.7%).
 - 18 samples were positive for influenza through the English GP sentinel schemes (15 A(H1N1)pdm09 and three A(H3), positivity of 27%).
- Disease severity and mortality
 - 62 new admissions to ICU/HDU with confirmed influenza (33 A(H1N1)pdm09, 27 A unknown subtype, one A(H3N2) and one B) and eight confirmed influenza deaths were reported through the USSS mandatory ICU surveillance scheme across the UK (137 Trusts in England) in week 8. 79 new hospitalised confirmed influenza cases were reported through the USSS sentinel hospital network across England (26 Trusts).
 - In week 8 2014, no excess all-cause mortality by week of death was seen across the UK through the EuroMOMO algorithm.
- Vaccination
 - In the final monthly collection up to 31 January 2014, provisional cumulative seasonal influenza vaccine uptake from 99.8% of GP practices was 73.2% in 65 years and over (73.4% in 2012/13), 52.3% in under 65 year olds at risk (51.3% in 2012/13), 39.8% in all pregnant women (40.3% in 2012/13), 42.6% in all 2 year olds and 39.6% in all 3 year olds.
 - Provisional data from the final monthly collection of influenza vaccine uptake by frontline healthcare workers show 54.8% were vaccinated by 31 January 2014 from 99.3% of Trusts, compared to 45.9% in 2012/13.
 - WHO has published recommendations for the [composition](#) of influenza virus vaccines for use in the 2014/15 northern hemisphere influenza season.
- International situation
 - Overall influenza activity in North America remains elevated but is decreasing.
 - Influenza transmission is continuing across the EU/EEA region; some countries are experiencing decreasing influenza activity while others have not yet reached an epidemic peak.

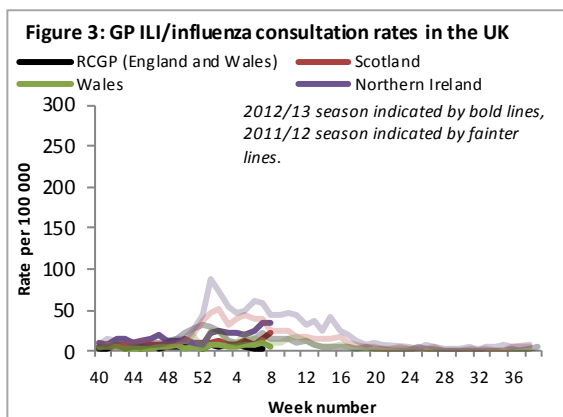
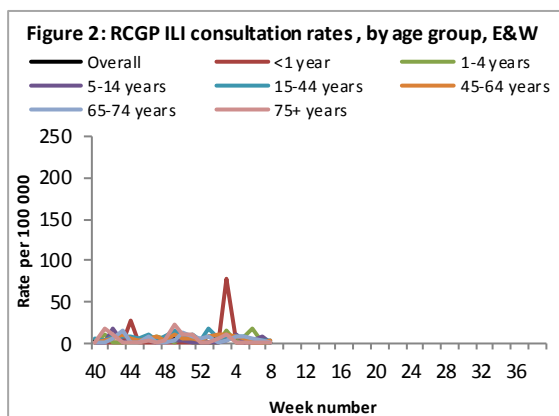
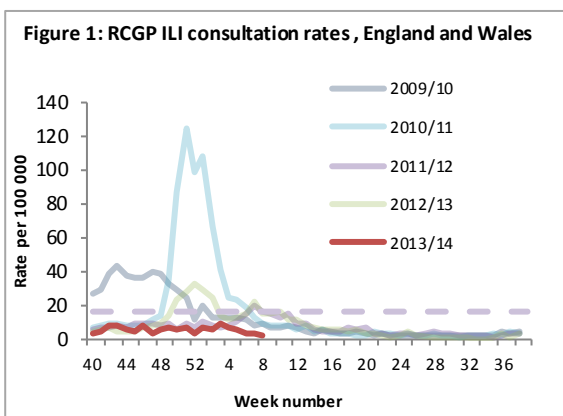
In week 8 (ending 23 February 2014), overall weekly influenza GP consultations remained low in England, Wales, Scotland and Northern Ireland.

- Influenza/Influenza-Like-Illness (ILI)

RCGP (England and Wales)

-The overall ILI consultation rate from RCGP for England and Wales remained stable at 2.0 per 100,000 in week 8 (Figure 1*). ILI rates remained stable in the North (1.7 per 100,000) Central (3.6 per 100,000) and decreased in the South region (from 4.9 to 0.9 per 100,000).

-In week 8 2014, ILI consultations were reported in 5-14 year olds (rate of 1.3 per 100,000), 15-44 year olds (3.2 per 100,000) and 45-64 year olds (2.1 per 100,000).



Northern Ireland

-The Northern Ireland influenza rate remained stable from 35.3 per 100,000 in week 7 to 33.9 per 100,000 in week 8 (Figure 3).

-In week 8 2014, the highest rates were seen in 1-4 year olds (67.6 per 100,000) and <1 year olds (46.6 per 100,000).

Wales

-The Welsh influenza rate remained stable at 6.5 per 100,000 in week 8 (Figure 3).

-The highest rate was seen in 45-64 year olds (9.3 per 100,000), 15-44 year olds (7.9 per 100,000) and 5-14 year olds (6.5 per 100,000).

Scotland

-The Scottish ILI rate increased from 15.2 per 100,000 in week 7 to 21.5 per 100,000 in week 8 (Figure 3).

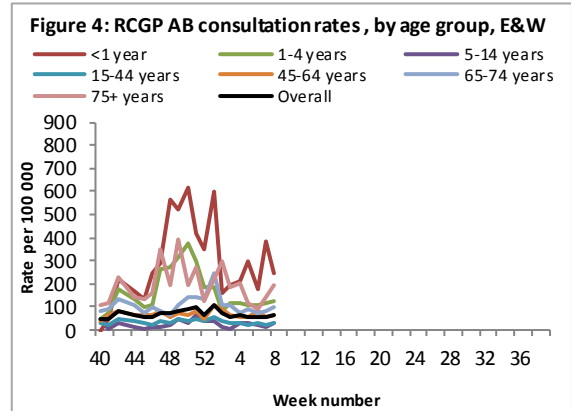
-The highest rate was seen in 15-44 year olds (26.5 per 100,000) followed by 45-64 year olds (26.2 per 100,000).

*The Moving Epidemic Method has been adopted by the European Centre for Disease Prevention and Control to calculate thresholds for GP ILI consultations for the start of influenza activity in a standardised approach across Europe. The threshold calculated for RCGP ILI consultation rates for 2013/14 is 15.6 per 100,000.

- Other respiratory indicators

Acute bronchitis (AB)

The overall weekly consultation rate for acute bronchitis (AB) in England and Wales through the RCGP scheme increased slightly from 53.3 per 100,000 in week 7 to 67.6 per 100,000 in week 8 (Figure 4). The highest rates were seen in <1 year olds (244.7 per 100,000) and 75+ year olds (192.0 per 100,000).



Community surveillance | [Back to top](#) |

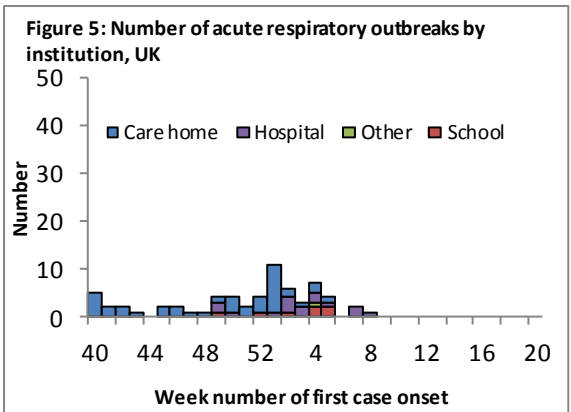
In week 8 influenza syndromic indicators remained stable and one new acute respiratory outbreak has been reported in the last seven days.

- PHE Real-time Syndromic Surveillance

-In week 8 syndromic surveillance indicators for influenza remain stable and below seasonally expected levels.
 -For further information, please see the syndromic surveillance [webpage](#).

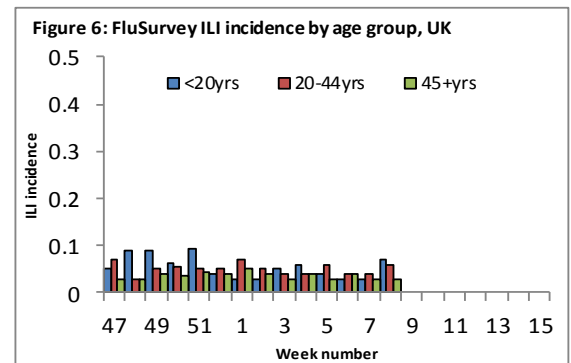
- Acute respiratory disease outbreaks

-One new acute respiratory outbreak was reported in the last 7 days from a hospital (tested positive for A(H1N1)pdm09) in London. So far this season, 42 outbreaks have been reported in care homes, 16 in hospitals, seven in schools and one in a nursery (where tested, eight A(H1N1)pdm09, eight A (not subtyped), one A(H3), nine RSV, nine rhinovirus, three parainfluenza, and four mixed infections of parainfluenza along with other viruses (one each of RSV, rhinovirus, hMPV and seasonal coronavirus).
 -Outbreaks should be recorded on HPZone and reported to the local Health Protection Teams and Respcidsc@phe.gov.uk.



- FluSurvey

-Internet-based surveillance of influenza in the general population is undertaken through the FluSurvey project (<http://flusurvey.org.uk>) run by the London School of Hygiene and Tropical Medicine. Please see the website for information on how to register.
 In week 8, the incidence of ILI reports was highest in <20 year olds (Figure 6).



In week 8 2014, 160 influenza positive detections were recorded through the DataMart scheme (111 A(H1N1)pdm09, 18 A(H3), 29 A(not subtyped) and two B), with the highest positivity reported in 15-44 year olds. 18 samples were positive for influenza through the English sentinel schemes (15 A(H1N1)pdm09 and three A(H3)).

• Respiratory DataMart System (England)

In week 8 2014, out of the 920 respiratory specimens reported through the Respiratory Datamart System, 111 (12.1%) were positive for flu A(H1N1)pdm09, 18 (2.0%) positive for influenza A(H3), 29 (3.2%) positive for flu A(not subtyped) and two were positive for influenza B (Figure 7), with the highest influenza positivity in 15-44 year olds (22.7%, Figure 8). The overall positivity for RSV remained low (3.7%) in week 8 with the highest positivity remaining in the <5 years (8.1%, Figure 9). Rhinovirus positivity remained at similar levels in week 8 (10.3%) with other respiratory viruses remaining at low levels: adenovirus 4.1%, parainfluenza 1.7% and hMPV 2.4%.

Figure 7: DataMart samples positive for influenza, England

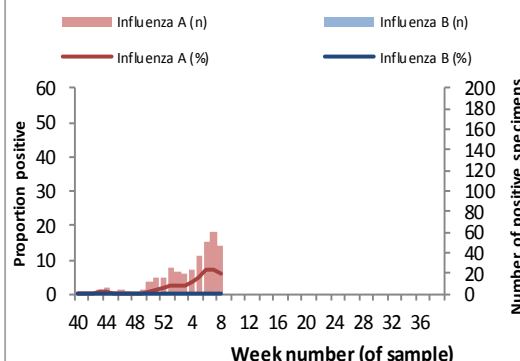


Figure 8: Datamart % positive for influenza by age, England

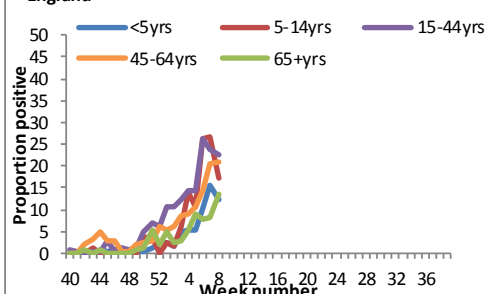
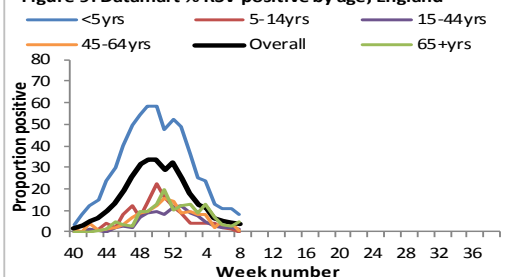


Figure 9: Datamart % RSV positive by age, England



• Sentinel swabbing schemes in England (RCGP/SMN) and the Devolved Administrations

-In week 8, 18 samples from England were positive for influenza (15 A(H1N1)pdm09 and three A(H3)). Seven samples from Scotland were positive (six A(H1N1)pdm09 and one A(unsubtyped), one sample from Northern Ireland was positive for A(unsubtyped) and one sample from Wales was positive for A(H1N1)pdm09 (Table 1).

Table 1: Sentinel influenza surveillance in the UK

Week	England	Scotland	Northern Ireland	Wales
05	11/67 (16.4%)	8/37 (21.6%)	1/7 (-)	1/5 (-)
06	28/78 (35.9%)	9/53 (17%)	1/6 (-)	2/12 (16.7%)
07	31/75 (41.3%)	9/53 (17%)	1/5 (-)	2/9 (-)
08	18/69 (27.4%)	7/27 (25.9%)	1/4 (-)	1/1 (-)

NB. Proportion positive omitted when fewer than 10 specimens tested

• Virus characterisation

Since week 40 2013, the PHE Respiratory Virus Unit (RVU) has isolated and antigenically characterised 36 influenza A(H3N2) viruses, all similar to the A/Texas/50/2012 H3N2 2013/14 vaccine strain, and 71 influenza A(H1N1)pdm09 viruses similar to the A/California/07/2009 vaccine strain for 2013/14. Three influenza B isolates, belonging to the B-Yamagata lineage have been characterised, and one from the B-Victoria lineage.

• Antiviral susceptibility

Since week 40 2013, 453 and 69 influenza viruses have been tested for Osetamivir and Zanamivir susceptibility, respectively, in the UK. Five (1.2%) of 432 flu A(H1N1)pdm09 and one (5.3%) of 19 flu A(H3) viruses have been found to be resistant to Osetamivir. No viruses were found to be resistant to Zanamivir.

• Antimicrobial susceptibility

-In the 12 weeks up to 16 February 2014, 83% or greater of all lower respiratory tract isolates of *Staphylococcus aureus*, *Streptococcus pneumoniae* and *Haemophilus influenzae* reported as tested were susceptible to the antibiotics tetracycline and co-amoxiclav (Table 2). There have been no significant changes in susceptibility in recent years.

Table 2: Antimicrobial susceptibility surveillance in lower respiratory tract isolates, 12 weeks up to 16 Feb 2014, E&W

Organism	Tetracyclines		Co-amoxiclav	
	Specimens tested (N)	Specimens susceptible (%)	Specimens tested (N)	Specimens susceptible (%)
<i>S. aureus</i>	3,121	92	230	90
<i>S. pneumoniae</i>	2,405	83	2568*	91*
<i>H. influenzae</i>	9,603	99	9,217	93

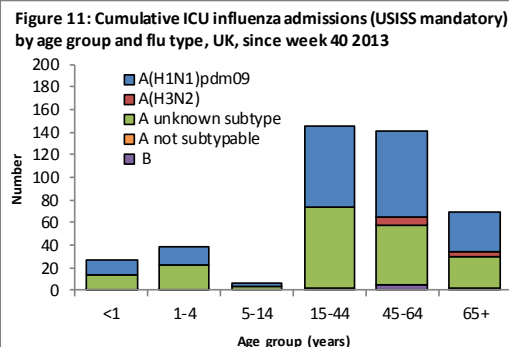
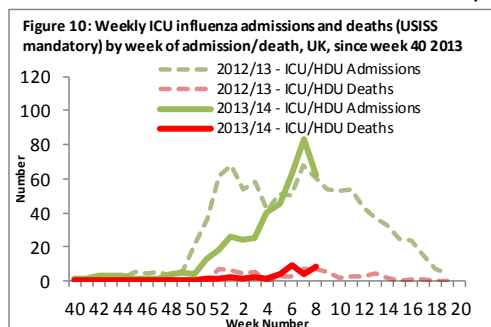
* *S. pneumoniae* isolates are not routinely tested for susceptibility to co-amoxiclav, however laboratory results for benzyl-penicillin are extrapolated to determine sensitivity to other beta-lactams such as co-amoxiclav.

In week 8, 62 new admissions of confirmed influenza cases to ICU/HDU (33 A(H1N1)pdm09, 27 A unknown subtype, one A(H3N2) and one B) and eight confirmed influenza deaths in ICU/HDU have been reported through the national USISS mandatory ICU scheme across the UK (137 Trusts in England). 79 new hospitalised confirmed influenza cases have been reported through the USISS sentinel hospital network across England (26 Trusts).

A national mandatory collection (USISS mandatory ICU scheme) is operating in cooperation with the Department of Health to report the number of confirmed influenza cases admitted to Intensive Care Units (ICU) and High Dependency Units (HDU) and number of confirmed influenza deaths in ICU/HDU across the UK. A confirmed case is defined as an individual with a laboratory confirmed influenza infection admitted to ICU/HDU. In addition a sentinel network (USISS sentinel hospital network) of acute NHS trusts has been established in England to report weekly laboratory confirmed hospital admissions. Further information on these systems is available through the [website](#). Please note data in previously reported weeks are updated and so may vary by week of reporting.

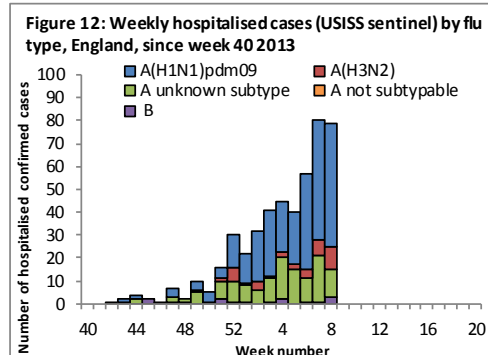
- Number of new admissions and fatal confirmed influenza cases in ICU/HDU (USISS mandatory ICU scheme), UK (week 8)

-In week 8, 62 new admissions to ICU/HDU with confirmed influenza infection (33 A(H1N1)pdm09, 27 A unknown subtype, one A(H3N2) and one B) were reported across the UK (137/156 Trusts in England) through the USISS mandatory ICU scheme (Figures 10 and 11) compared to 83 in week 7. Eight new confirmed influenza deaths were reported in week 8 2014. A total of 426 admissions (215 A(H1N1)pdm09, 188 A(unknown), 12 A(H3N2) and 11 B) and 33 confirmed influenza deaths have been reported since week 40 2013.



- USISS sentinel weekly hospitalised confirmed influenza cases, England (week 8)

-In week 8, 79 new hospitalised confirmed influenza case were reported through the USISS sentinel hospital network from 26 NHS Trusts across England (Figure 12) compared to 80 in week 7. A total of 476 hospitalised confirmed influenza admissions (292 A(H1N1)pdm09, 126 A unknown, 42 A(H3N2) and 16 B) have been reported since week 40 2013.

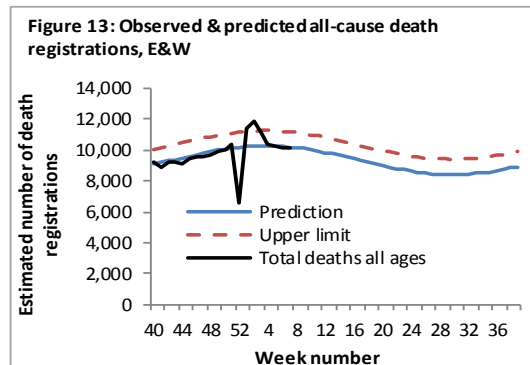


In week 8 2014, no excess all-cause mortality by week of death was seen in England through the EuroMOMO algorithm and none has been reported since week 40 2013.

Seasonal mortality is seen each year in the UK, with a higher number of deaths in winter months compared to the summer. Additionally, peaks of mortality above this expected higher level typically occur in winter, most commonly the result of factors such as cold snaps and increased circulation of respiratory viruses, in particular influenza. Weekly mortality surveillance presented here aims to detect and report acute significant weekly excess mortality above normal seasonal levels in a timely fashion. Excess mortality is defined as a significant number of deaths reported over that expected for a given point in the year, allowing for weekly variation in the number of deaths. The aim is not to assess general mortality trends or precisely estimate the excess attributable to different factors, although some end-of-winter estimates and more in-depth analyses (by age, geography etc.) are undertaken.

- Excess overall all-cause mortality, England and Wales

-In week 7 2014, an estimated 10,198 all-cause deaths were registered in England and Wales (source: Office for National Statistics). This is similar to the 10,147 estimated death registrations in week 6 and remains below 95% upper limit of expected death registrations for this time of year as calculated by PHE (Figure 13). The sharp drop in number of deaths correspond to weeks when there were bank holidays and fewer days when deaths were registered and so is likely to be artificial.



- Excess all-cause mortality by age group and PHE region, England, Wales, Scotland and Northern Ireland

-In week 8 2014, no excess mortality by date of death above the upper 2 z-score threshold was seen in 65+ year olds in England after correcting ONS disaggregate data for reporting delay with the standardised EuroMOMO algorithm (Figure 14, Table 3), in other age groups or subnationally. This data is provisional due to the time delay in registration; numbers may vary from week to week.

-No excess mortality above the threshold through the same standardised algorithm was seen across Wales, Scotland or Northern Ireland in week 8 (Table 4).

Table 3: Excess mortality by age group, England*

Age group (years)	Excess detected in week 8 2014?	Weeks with excess in 2013/14
<5	x	NA
5-14	x	NA
15-64	x	NA
65+	x	NA

* Excess mortality is calculated as the observed minus the expected number of deaths in weeks above threshold

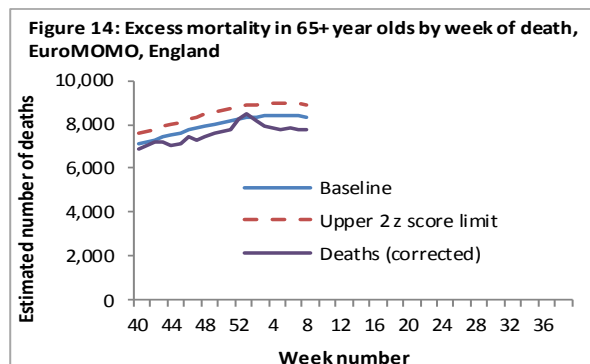


Table 4: Excess mortality by UK country*

Country	Excess detected in week 8 2014?	Weeks with excess in 2013/14
England	x	NA
Wales	x	NA
Scotland	x	NA
Northern Ireland	x	3

* Excess mortality is calculated as the observed minus the expected number of deaths in weeks above threshold

NB. Separate total and age-specific models are run for England which may lead to discrepancies between Tables 3 + 4

Vaccination

[Back to top](#)

- In the final monthly collection up to 31 January 2014, provisional cumulative seasonal influenza vaccine uptake from 99.8% of GP practices was 73.2% in 65 years and over (73.4% in 2012/13), 52.3% in under 65 year olds at risk (51.3% in 2012/13), 39.8% in all pregnant women (40.3% in 2012/13), 42.6% in all 2 year olds and 39.6% in all 3 year olds. The [report](#) provides uptake to Area Team level, CCG level and in key targeted groups.
- Provisional data from the final monthly collection of influenza vaccine uptake by frontline healthcare workers show 54.8% were vaccinated by 31 January 2014 from 99.3% of Trusts, compared to 45.9% in 2012/13. The [report](#) provides uptake to Trust level.
- WHO has recommended the composition of influenza virus vaccines for use in the 2014/15 northern hemisphere influenza season. The same viruses are recommended as for the 2013-2014 northern hemisphere influenza season and 2014 southern hemisphere season (an A/California/7/2009 (H1N1)pdm09-like virus; an A/Texas/50/2012 (H3N2)-like virus; a B/Massachusetts/2/2012-like virus (Yamagata lineage) and for quadrivalent vaccines containing two influenza B viruses, to additionally include a B/Brisbane/60/2008-like virus (Victoria lineage). For further information, please see the [full report](#).

Overall influenza activity in North America remains elevated but is decreasing. Influenza transmission is continuing across the EU/EEA region; some countries are experiencing decreasing influenza activity while others have not yet reached an epidemic peak.

- [Europe](#) 21 February 2014 (European Centre for Disease Prevention and Control report)

In terms of influenza activity, Finland and Greece reported high intensity, eleven countries reported medium intensity and another 16 reported low intensity, the lowest category of reporting (Table 1, Map 1). Bulgaria, Greece and Spain have been reporting medium or high-intensity influenza activity for at least six consecutive weeks. Geographic patterns of influenza activity varied across Europe: Czech Republic, Latvia, Lithuania, Malta, Romania, Slovakia and the UK (Northern Ireland, Scotland, Wales) reported sporadic influenza activity, Germany and Poland local activity, Austria, Bulgaria, the Netherlands and Norway regional activity. Widespread activity was reported by 15 countries and the UK (England). Increasing trends were reported by 18 countries and the UK (England, Northern Ireland and Scotland). Bulgaria, Portugal and Spain have now been reporting decreasing trends for at least two consecutive weeks. The decline in influenza activity in Bulgaria, Portugal and Spain, which began in week 5/2014, has continued.

For week 7/2014, 25 countries tested 1 332 sentinel specimens, 488 (37%) of which were positive for influenza virus. Of these, 477 (98%) were type A and 11 (2%) were type B. Since week 40/2013, of 4 217 sentinel specimens positive for influenza virus, 4 141 (98%) were type A and 76 (2%) were type B. Of the 3 832 subtyped influenza viruses, 2 253 (59%) were A(H1)pdm09 and 1 579 (41%) were A(H3). Countries have reported variable patterns of A(H1)pdm09 and A(H3) as the dominant subtypes (Table 1). The proportion of sentinel specimens testing positive for influenza virus has decreased for the third consecutive week after peaking in weeks 3-4/2014.

The results of antigenic and genetic characterisation of sentinel and non-sentinel viruses are displayed in Tables 3 and 4. Since week 40/2013, none of the 393 antigenically characterised viruses have differed substantially from the current vaccine viruses recommended by WHO (Table 3). More details on viruses circulating since September 2013 can be found in the December virus characterisation report.

Since week 40/2013, 385 A(H1)pdm09, 88 A(H3) and 23 type B viruses have been tested for susceptibility to the neuraminidase inhibitors oseltamivir and zanamivir by genetic and/or phenotypic methods. Only three viruses showed genetic or phenotypic (IC50) evidence of reduced inhibition. Two A(H1N1)pdm09 viruses carried the NA-H275Y amino acid substitution associated with highly-reduced inhibition by oseltamivir. For week 7/2014, 14 countries reported 731 respiratory syncytial virus detections, maintaining the downward trend and indicating that the epidemic peak for the reporting countries this season has occurred in week 1/2014.

For week 7/2014, 221 hospitalised, laboratory-confirmed influenza cases were reported by six countries (Finland, Ireland, Romania, Spain, Sweden and UK), including 117 cases admitted to intensive care units (ICU).

Since week 40/2013, seven countries have reported 2 531 hospitalised, laboratory-confirmed influenza cases: 2 508 (99%) were related to influenza virus type A infection and 23 (1%) to type B virus infection (Tables 5 and 6). A total of 1 695 influenza A viruses have been subtyped, 1 339 (79%) were A(H1)pdm09 and 356 (21%) were A(H3). Among cases with known subtype, infections with A(H1)pdm09 accounted for 86% in ICU and 73% in other wards.

Seven countries reported a total of 209 fatal cases. All fatal cases were associated with influenza virus type A infection and 154 of them were subtyped: 125 (81%) as A(H1)pdm09 and 29 (19%) as A(H3). Of the 207 fatal cases with known age, 115 (56%) were ≥ 65 years.

- [United States of America](#) 21 February 2014 (Centre for Disease Control report)

During week 7 (February 9-15, 2014), influenza activity decreased, but remained elevated in the United States.

Nationwide during week 7, 2.5% of patient visits reported through the U.S. Outpatient Influenza-like Illness Surveillance Network (ILINet) were due to influenza-like illness (ILI). This percentage is above the national baseline of 2.0%. On a regional level, the percentage of outpatient visits for ILI ranged from 1.3% to 3.8% during week 7. Nine of 10 regions reported a proportion of outpatient visits for ILI above their region-specific baseline level.

During week 7, 8.2% of all deaths reported through the 122 Cities Mortality Reporting System were due to P&I. This percentage was above the epidemic threshold of 7.4% for week 7. Two influenza-associated pediatric deaths were reported to CDC during week 7. One death was associated with a 2009 H1N1 virus and occurred during week 6 (week ending February 8, 2014) and one death was associated with an influenza A virus for which no subtyping was performed and occurred during week 5 (week ending February 1, 2014). A total of 52 influenza-associated pediatric deaths have been reported during the 2013-2014 season from New York City [1] and 24 states (AR [3], AZ [1], CA [4]; FL [3], GA [1]; IA [1]; KS [1], KY [1]; LA [4]; MA [2]; MI [2], MS [1], NC [3]; NE [1], NV [1], OK [2]; OR [1], PA [1], TN [4]; TX [9]; UT [2]; VA [1]; WI [1]; and WV [1]).

Of 6,887 specimens tested and reported during week 7 by U.S. World Health Organization (WHO) and National Respiratory and Enteric Virus Surveillance System (NREVSS) collaborating laboratories, 958 (13.9%) were positive for influenza. By type, 865 (90.3%) were influenza A (416 (48.1%) A(H1N1)pdm09, 426 subtyping not performed and 23 (2.7%) A(H3)) and 93 (9.7%) were influenza B.

- [Canada](#) 21 February 2014 (Public Health Agency report)

In week 07, overall influenza activity continued to decrease in Canada except in the eastern provinces which experienced a later start to the influenza season. In week 07, one region in Quebec reported widespread activity, and nine regions in eastern Canada (ON(5), QC(2), NB(1) and NS(1)) reported localized activity. Influenza activity levels continue to decline, with fewer regions reporting widespread or localized activity. The national influenza-like-illness (ILI) consultation rate increased from 26.7/1,000 in week 06 to 48.6/1,000 in week 07; which is above the expected range for week 07. In week 07, 38 new laboratory-confirmed influenza-associated paediatric (≤ 16 years of age) hospitalizations were reported by the Immunization Monitoring Program Active (IMPACT) network, compared to 33 in week 06. In week 07, influenza A was reported in 32 cases and influenza B in 6 cases. Twenty-five (66%) of the cases were < 5 years of age. Four ICU admissions were reported in week 07, three children 2-4 years of age, and one 5-9 years of age. No deaths were reported.

- [Global influenza update](#) 10 February 2014 (WHO website)

In North America, influenza activity decreased in the United States of America and Canada, and increased in Mexico with A(H1N1)pdm09 virus predominating. In Europe influenza activity continued to increase, particularly in the south with both influenza A viruses circulating. In eastern Asia influenza activity remained high with influenza A(H1N1)pdm09 predominating, with increases observed in some countries. In western Asia influenza activity was increasing with mainly A(H3N2), while Egypt reported high activity of influenza A(H1N1)pdm09.

In countries of tropical areas variable influenza activity was reported.

In the southern hemisphere influenza activity remained low. Based on FluNet reporting (as of 6 February 2014, 12:30 UTC), during weeks 3 to 4 (12 January 2014 to 25 January 2014), National Influenza Centres (NICs) and other national influenza laboratories from 97 countries, areas or territories reported data. The WHO GISRS laboratories tested more than 68 458 specimens. 19 547 were positive for influenza viruses, of which 17 992 (92%) were typed as influenza A and 1555 (8%) as influenza B. Of the sub-typed influenza A viruses, 8257 (79.75%) were influenza A(H1N1)pdm09, 2096 (20.24%) were influenza A(H3N2) and 1 (0.01%) was influenza A(H5N1). Of the characterized B viruses, 200 (69.7%) belong to the B-Yamagata lineage and 87 (30.3%) to the B-Victoria lineage.

- [Avian Influenza](#) 24 February 2014 (WHO website)

Influenza A(H7N9)

Since 24 February 2014, 145 hospitalised cases of human infection with influenza A(H7N9) in China have been reported by [WHO](#), including 11 deaths, compared to 136 the previous week. The source of infection is still under investigation. So far, there is no evidence of sustained human-to-human transmission. WHO does not advise special screening at points of entry with regard to this event, nor does it currently recommend any travel or trade restrictions.

Influenza A(H5N1)

From 2003 through to 20 December 2013, 649 human cases of H5N1 avian influenza have been officially reported to [WHO](#) from 15 countries, of which 385 (59%) died.

- Novel coronavirus 7 February 2014

Up to 26 February 2014, a total of four cases of Middle East respiratory syndrome coronavirus, MERS-CoV, (two imported and two linked cases) have been confirmed in England. On-going surveillance has identified 108 suspect cases in the UK that have been investigated for MERS-CoV and tested negative. A further 178 confirmed cases have been reported internationally. This results in a current global total of [182 cases](#), 79 of which have died (case fatality ratio=43%). Two recent fatal cases were reported from Saudi Arabia and Jordan, both with underlying health conditions. Further information on management and guidance of possible cases is available [online](#).

Acknowledgements

[| Back to top |](#)

This report was prepared by the Influenza section, Respiratory Diseases Department, Centre for Infectious Disease Surveillance and Control, Public Health England. We are grateful to all who provided data for this report including the RCGP Research and Surveillance Centre, the PHE Real-time Syndromic Surveillance team, the PHE Respiratory Virus Unit, the PHE Modelling and Statistics unit, the PHE Dept. of Healthcare Associated Infection & Antimicrobial Resistance, PHE regional microbiology laboratories, NHS Direct, Office for National Statistics, the Department of Health, Health Protection Scotland, National Public Health Service (Wales), the Public Health Agency Northern Ireland, the Northern Ireland Statistics and Research Agency, QSurveillance® and EMIS and EMIS practices contributing to the QSurveillance® database.

Related links

[| Back to top |](#)

Weekly consultation rates in national sentinel schemes

- [Sentinel schemes operating across the UK](#)
- [RCGP scheme](#)
- Northern Ireland surveillance ([Public Health Agency](#))
- Scotland surveillance ([Health Protection Scotland](#))
- Wales surveillance ([Public Health Wales](#))
- [Real time syndromic surveillance](#)
- [MEM threshold paper](#)

Community surveillance

- [Outbreak reporting](#)
- [FluSurvey](#)
- [MOSA](#)

Disease severity and mortality data

- [USISS](#) system
- [EuroMOMO](#) mortality project

Vaccination

- 2012/13 seasonal influenza vaccine programme ([Department of Health Book](#))
- Childhood flu programme Q&A for healthcare professionals ([Public Health England](#))
- 2013/14 Northern Hemisphere seasonal influenza vaccine recommendations ([WHO](#))