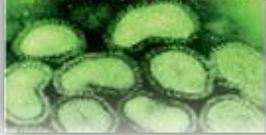


Weekly Update



California Department of Public Health Influenza Surveillance Program

California Influenza and Other Respiratory Disease Surveillance for Weeks 46–47 (November 11–24, 2012)

Note: This report includes data from many different sources of influenza surveillance, including syndromic surveillance, laboratory surveillance, and mandatory reporting of influenza deaths for cases ages 0-64 years. The information contained in this report should be viewed as a “snapshot” of influenza activity for each surveillance week, and should not be considered as population-based data or representative of all California public health jurisdictions.

Based on low levels of influenza-like illness and laboratory detections, overall influenza activity in California during Weeks 46 and 47 was “sporadic*.”

Influenza Report Highlights

- Outpatient influenza-like illness (ILI) was low in Weeks 46 (1.3%) and 47 (1.1%).
- Of 1481 specimens tested during Weeks 46 and 47,
 - 37 (2.5%) were positive for influenza; of these
 - 7 (18.9%) were influenza B and
 - 30 (81.1%) were influenza A.
 - 15 (50.0%) were subtyped as seasonal A (H3) and
 - 15 (50.0%) were not subtyped.
- The California Department of Public Health Viral and Rickettsial Disease Laboratory (CDPH-VRDL) has not tested any specimens for antiviral resistance to date.
- No California specimens have been strain-typed by the Centers for Disease Control and Prevention (CDC) to date.
- CDPH has received no reports of laboratory-confirmed influenza-associated deaths among persons less than 65 years of age to date.
- No cases of novel influenza have been detected in California to date.

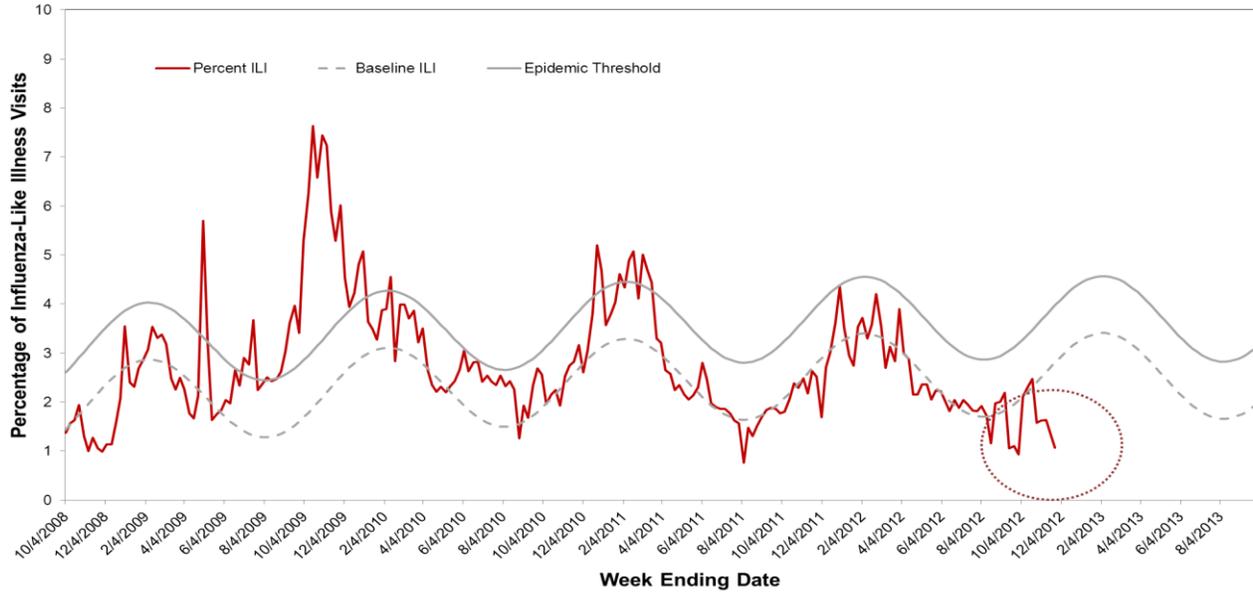
*For the Centers for Disease Control and Prevention (CDC) definitions of influenza geographic distribution, please go to <http://www.cdc.gov/flu/weekly/overview.htm>.

A. Syndromic Surveillance Update

1. CDC Influenza Sentinel Providers

A total of 101 and 70 enrolled sentinel providers have reported data for Weeks 46 and 47, respectively, compared to an average of 111 providers reporting for each of the previous weeks. Based on available data, the percentage of ILI visits for Weeks 46 (1.3%) and 47 (1.1%) were below baseline (Figure 1).

Figure 1. Percentage of Influenza-like Illness Visits Among Patients Seen by California Sentinel Providers, 2008–2012

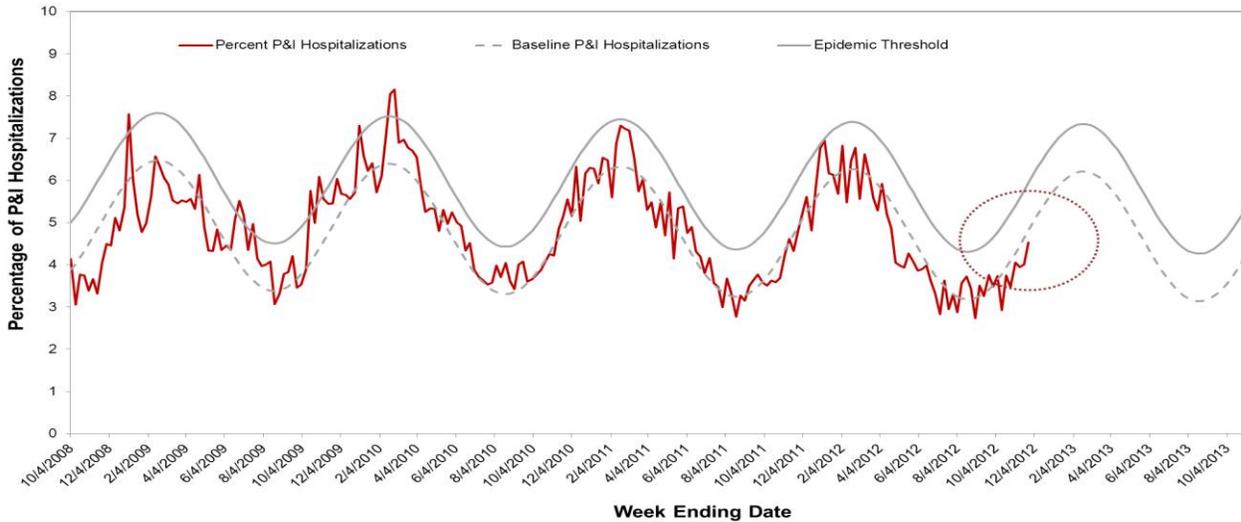


The seasonal baseline was calculated using a regression model applied to data from the previous seven years. The epidemic threshold is two standard deviations above the seasonal baseline and is the point at which the observed percentage of ILI is significantly higher than would be expected at that time of the year.

2. Kaiser Permanente Hospitalization Data

The percentage of hospitalizations for pneumonia and influenza (P&I) in Kaiser Permanente facilities in northern California remained the same during Week 46 (4.0%) and increased during Week 47 (4.6%), compared to Week 45 (4.0%) (Figure 2). The percentages remained below baseline.

Figure 2. Percentage of P&I Hospitalizations in Kaiser Permanente Northern California Hospitals, 2008–2012



The seasonal baseline was calculated using a regression model applied to data from the previous five years. The epidemic threshold is two standard deviations above the seasonal baseline and is the point at which the observed percentage of pneumonia and influenza hospitalizations in Kaiser Permanente hospitals in northern California is significantly higher than would be expected at that time of the year.

B. Laboratory Update

1. Respiratory Laboratory Network (RLN) and Sentinel Laboratory Surveillance Results

The percentage of influenza detections in the RLN and sentinel laboratories remained low in Weeks 46 (2.6%) and 47 (2.3%) (Figure 3).



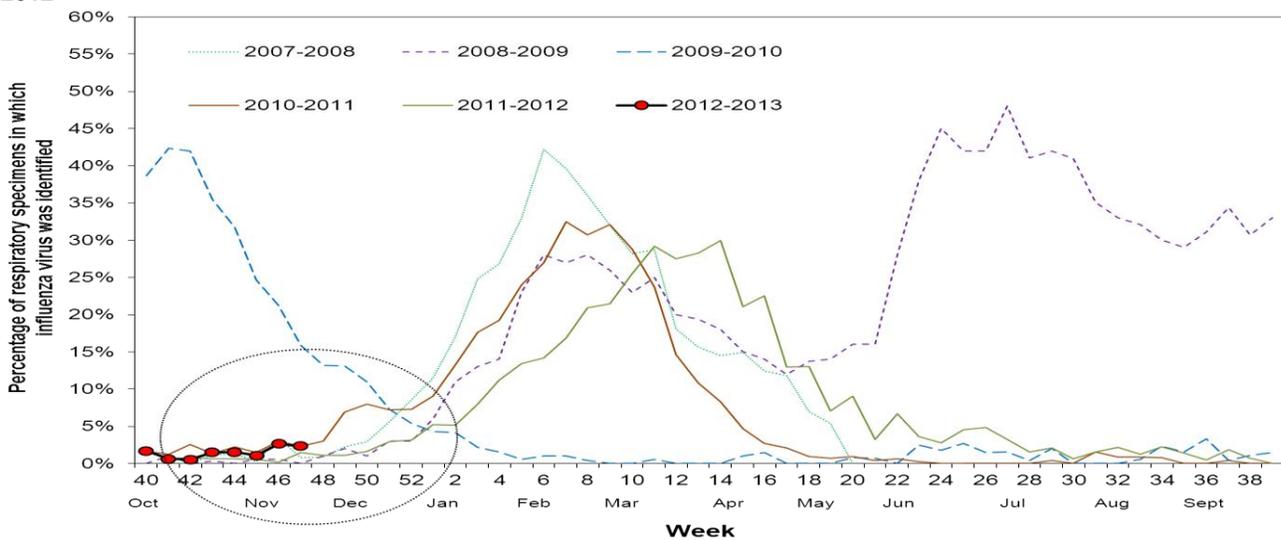
In Week 46, of 797 specimens tested by the RLN and sentinel laboratories, 3 (0.4%) were positive for influenza B and 18 (2.3%) were positive for influenza A. Of the 18 specimens that tested positive for influenza A, 10 (55.6%) were subtyped as seasonal A (H3) and 8 (44.4%) had no further subtyping performed.

In Week 47, of 684 specimens tested by the RLN and sentinel laboratories, 4 (0.6%) were positive for influenza B and 12 (1.8%) were positive for influenza A. Of the 12 specimens that tested positive for influenza A, 5 (41.7%) were subtyped as seasonal A (H3) and 7 (58.3%) had no further subtyping performed.

To date for the 2012–2013 season, of 4,943 specimens tested, 77 (1.6%) were positive for influenza; of these, 19 (24.7%) were influenza B and 58 (75.3%) were influenza A. Of the 58 specimens that tested positive for influenza A, 25 (43.1%) were subtyped as seasonal A (H3) and 33 (56.9%) had no further subtyping performed.

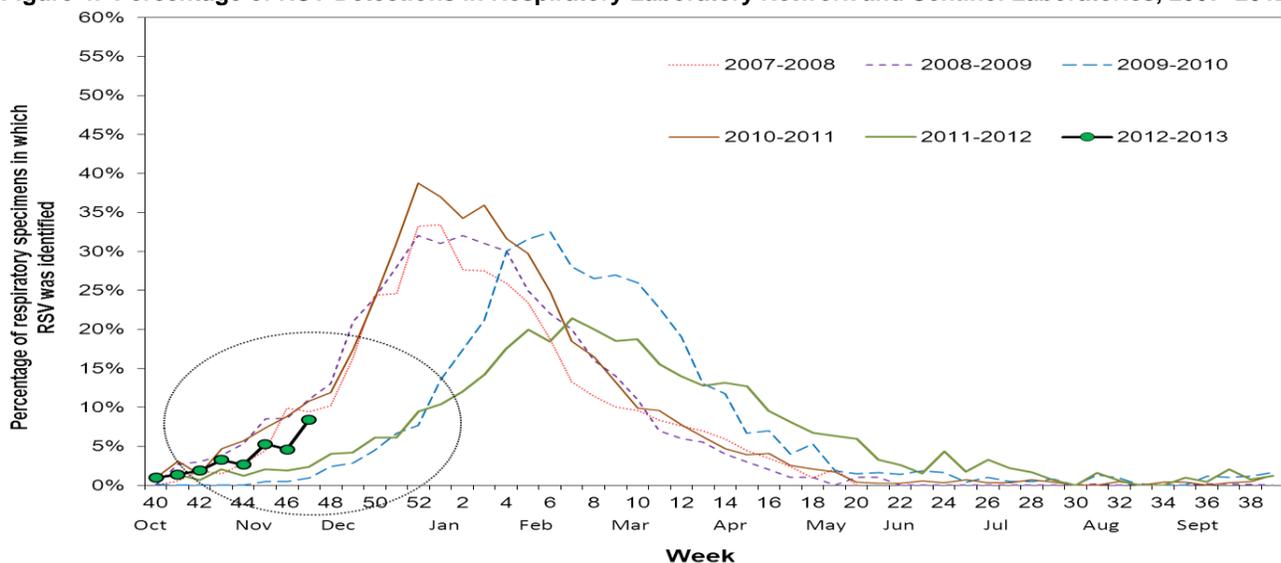
Neither the RLN nor CDPH-VRDL have identified any influenza viruses by polymerase chain reaction (PCR) typing or subtyping that are suggestive of a novel influenza virus.

Figure 3. Percentage of Influenza Detections in Respiratory Laboratory Network and Sentinel Laboratories, 2007–2012



The proportion of respiratory syncytial virus (RSV) detections decreased during Week 46 (4.6%), compared to 5.3% in Week 45, and increased during Week 47 (8.4%) (Figure 4).

Figure 4. Percentage of RSV Detections in Respiratory Laboratory Network and Sentinel Laboratories, 2007–2012



2. Antiviral Resistance Testing

CDPH-VRDL has not tested any influenza specimens for antiviral resistance to date during the 2012–2013 influenza season.

3. Influenza Virus Strain Characterization

No California specimens have been strain-typed to date during the 2012–2013 influenza season.

C. Laboratory-confirmed Fatal Case Reports

Currently, as mandated under Section 2500 of the California Code of Regulations, deaths among cases age 0-64 years with laboratory-confirmed influenza are reportable to CDPH.

CDPH has received no reports of laboratory-confirmed influenza-associated deaths among patients under 65 years of age during the 2012–2013 influenza season to date.

D. Influenza-associated Outbreaks

CDPH has received no reports of laboratory-confirmed influenza outbreaks during the 2012–2013 influenza season to date.

For questions regarding influenza surveillance and reporting in California, please email InfluenzaSurveillance@cdph.ca.gov. This account is monitored daily by several epidemiologists.

For more information regarding the different influenza surveillance data sources, please visit the CDPH Influenza Surveillance Program at <http://www.cdph.ca.gov/programs/dcdc/Pages/CaliforniaInfluenzaSurveillanceProject.aspx>.

To obtain additional information regarding influenza, please visit the CDPH influenza website at [http://www.cdph.ca.gov/HealthInfo/discond/Pages/Influenza\(Flu\).aspx](http://www.cdph.ca.gov/HealthInfo/discond/Pages/Influenza(Flu).aspx).

A copy of the case report form for reporting any laboratory-confirmed influenza case that was either admitted to the ICU or died can be downloaded from [http://www.cdph.ca.gov/HealthInfo/discond/Pages/Influenza\(Flu\).aspx](http://www.cdph.ca.gov/HealthInfo/discond/Pages/Influenza(Flu).aspx).