Influenza Weekly Report

2015 Week 48 (November 29 – December 5) through 2016 Week 48 (November 27 – December 3)

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Office of Public Health Informatics and Epidemiology

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December 2016
Edition 1.0
Data for the graphs and tables on the following pages are provisional and may be updated as additional information becomes available.

**Purpose**

The purpose of this report is to provide an overview of and statistics for the influenza season in Nevada for the local public health authorities, sentinel providers and the public.

**Sentinel Provider Data: Influenza-Like Illness Network Surveillance (ILINet)**

Respiratory specimens are tested for influenza by the World Health Organization (WHO) and National Respiratory and Enteric Virus Surveillance System (NRVESS) collaborating laboratories by sub-type. During week 48, there were 16,045 specimens collected and tested for influenza, of those 547 were positive (3.4%).

**Figure 1**

![National Influenza Positive Tests by Week - Sentinel Providers 53 Week Comparison (2015 WK 48 - 2016 WK 48)](image)


The Nevada total includes laboratory tests for all Nevada residents tested by sentinel providers including out of state laboratories. During week 48, there were 18 specimens collected and 3 were positive (16.7%).

**Figure 2**

![Nevada (Sentinel Providers) Influenza Laboratory Confirmed Positive by Week 53 Week Comparison (2015 WK 48 - 2016 WK 48)](image)

*Source of Data: CDC: ILINet.*
Nevada State Public Health Laboratory (NSPHL) has tested 64 specimens for influenza from sentinel providers, of which there have been 49 positive (75%). Southern Nevada Public Health Laboratory (SNPHL) has tested 33 specimens this season of which there have been 0 positives. Nationally, there have been 151,963 specimens sent to the WHO and NERVSS laboratories of which 4,527 have been positive (3%). The national numbers in Table 1 are reflected in Figure 1. The state of Nevada data in Table 1 is reflected in Figure 2. The Nevada total includes laboratory test for all Nevada residents tested by sentinel providers, including out of state laboratories.

### Table 1

<table>
<thead>
<tr>
<th>Specimens Tested</th>
<th>NSPHL</th>
<th>SNPHL</th>
<th>All Other Laboratories</th>
<th>State of Nevada (Week 48)</th>
<th>State of Nevada (Season)</th>
<th>National (Week 48)</th>
<th>National (Season)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Specimens Tested</td>
<td>65</td>
<td>33</td>
<td>103</td>
<td>18</td>
<td>201</td>
<td>19,878</td>
<td>151,963</td>
</tr>
<tr>
<td>Influenza Positives</td>
<td>49</td>
<td>0</td>
<td>9</td>
<td>3</td>
<td>16.7</td>
<td>58</td>
<td>28.9</td>
</tr>
<tr>
<td>Influenza Positives</td>
<td>4</td>
<td>0</td>
<td>2</td>
<td>0</td>
<td>0.0</td>
<td>56</td>
<td>96.6</td>
</tr>
<tr>
<td>Influenza A:</td>
<td>49</td>
<td>0</td>
<td>7</td>
<td>3</td>
<td>100</td>
<td>56</td>
<td>96.6</td>
</tr>
<tr>
<td>A (2009H1N1)</td>
<td>5</td>
<td>0</td>
<td>1</td>
<td>0</td>
<td>0.0</td>
<td>6</td>
<td>10.7</td>
</tr>
<tr>
<td>A (H3)</td>
<td>44</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>66.7</td>
<td>45</td>
<td>80.4</td>
</tr>
<tr>
<td>A (Sub-typing not performed)</td>
<td>0</td>
<td>0</td>
<td>5</td>
<td>1</td>
<td>33.3</td>
<td>5</td>
<td>8.9</td>
</tr>
<tr>
<td>Influenza B:</td>
<td>0</td>
<td>0</td>
<td>2</td>
<td>0</td>
<td>0.0</td>
<td>2</td>
<td>3.4</td>
</tr>
<tr>
<td>B (Victoria Lineage)</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0.0</td>
<td>0</td>
<td>0.0</td>
</tr>
<tr>
<td>B (Yamagata Lineage)</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0.0</td>
<td>0</td>
<td>5.0</td>
</tr>
<tr>
<td>B (Sub-typing not performed)</td>
<td>0</td>
<td>0</td>
<td>2</td>
<td>0</td>
<td>0.0</td>
<td>2</td>
<td>100</td>
</tr>
</tbody>
</table>

Source of Data: CDC: FluView Report and CDC: ILINet.

Influenza-like Illness (ILI) Surveillance Network has each sentinel provider report the number of patients seen that meet the ILI case definition and the total number of patients seen for any reason each week. The “percentage of visits for ILI” is the number of ILI patients divided by the total number of patients visit per week. Nevada’s percentage of ILI visits for week 48 is 2.2% which is above the state baseline of 1.5%. Region 9 ILI percentage for week 48 is 1.1% which is below the region baseline 2.5%. Region 9 includes the following states/territory: Arizona, California, Guam, Hawaii, and Nevada. The national ILI percentage for week 47 is 1.8% which is below the national baseline 2.2%.

### Figure 3

Percentage of Visits for ILI Reported to Outpatient ILI Surveillance Network, Comparison Between National, Regional, and State, 53 Week Comparison (2015 WK 48 - 2016 WK 48)

Source of Data: CDC: FluView Report and CDC: ILINet.

During week 48, 2.2% of visits to sentinel providers were due to ILI; this is higher than the 2015-2016 influenza season (0.9%). There were 10,616 patients seen by sentinel providers during week 48, of which 233 patients presented with ILI; week 48 of 2015, there were 149 patients seen with ILI (18,080 total patients seen).
Influenza-like Illness is reported by age groups. During week 48, patients age 0-4 were the greatest number of patients seen with ILI, at 75 patients seen. The rate for week 48 is 8.0 per 100,000 population. The rate is calculated by the number of patients presented with ILI, divided by the state population, multiplied by 100,000. The estimated state population for 2016 is 2,902,853.

Positive cases of influenza are reported to the state health authority for surveillance purposes. Table 2 and Figure 6 reflect all positive influenza cases reported to the state. Types of influenza testing include commercial rapid diagnostic test (rapid), viral culture, fluorescent antibody, enzyme immunoassay, RT-PCR (PCR), and Immunohistochemistry. The two most common test types in Nevada are Rapid and PCR tests. During week 48, there were 224 influenza cases reported to the state, 211 influenza A, 10 influenza B and 10 unknown.

Table 2

<table>
<thead>
<tr>
<th>Reporting Jurisdiction</th>
<th>Reported Influenza Cases by County Jurisdiction and Influenza Type</th>
<th>Cumulative Influenza Season</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Current Week (Week 48)</td>
<td>A</td>
</tr>
<tr>
<td>Carson City Health and Human Services</td>
<td>53</td>
<td>0</td>
</tr>
<tr>
<td>Rural Community Health Services</td>
<td>24</td>
<td>2</td>
</tr>
<tr>
<td>Southern Nevada Health District</td>
<td>18</td>
<td>1</td>
</tr>
<tr>
<td>Washoe County Health District</td>
<td>116</td>
<td>0</td>
</tr>
<tr>
<td>State of Nevada</td>
<td>211</td>
<td>3</td>
</tr>
</tbody>
</table>

Source: OPHIE: NBS and SNHD: NETSS.
Hospitalizations

There were 19 hospitalization associated with influenza reported to the state health authority for week 48.

Table 3

<table>
<thead>
<tr>
<th>Reporting Jurisdiction</th>
<th>Influenza Hospitalizations</th>
<th>Current Week (Week 48)</th>
<th>Cumulative Influenza Season</th>
</tr>
</thead>
<tbody>
<tr>
<td>Carson City Health and Human Services</td>
<td></td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Rural Community Health Services</td>
<td></td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Southern Nevada Health District</td>
<td></td>
<td>3</td>
<td>26</td>
</tr>
<tr>
<td>Washoe County Health District</td>
<td></td>
<td>15</td>
<td>56</td>
</tr>
<tr>
<td>State of Nevada</td>
<td></td>
<td>19</td>
<td>84</td>
</tr>
</tbody>
</table>

Source: Reported to Office of Public Health Informatics and Epidemiology from each Jurisdiction.

Pneumonia and Influenza (P&I) Mortality Surveillance

The Pneumonia and Influenza (P&I) mortality percentage is all deaths, where Pneumonia or Influenza is listed as the underlying or contributing cause of death, divided by the total deaths in Nevada for each week. As of December 6th, there were 21 P&I deaths and 314 total deaths for week 48 in Nevada. The P&I mortality percent for Nevada is at 6.7%. Nationally, week 48 has not yet been published.

Figure 6

Weekly Reported Influenza by Subtype as Compared with Respiratory Syncytial Virus Infections (RSV)

53 Week Comparison (2015 WK 48 - 2016 WK 48)

Source of Data: OPHIE: NBS and SNHD: NETSS.

Figure 7

Pneumonia and Influenza (P&I) Mortality by Week, NCHS Mortality Surveillance Data Compared to Nevada

53 Week Comparison (2015 WK 48- 2016 WK 48)

Source: OVR: WEVRSS and CDC: FluView.
Technical Notes

- Data are subject to changes, additionally, there is a lag in reporting.
- Influenza surveillance procedures vary by jurisdiction.
- Influenza-like illness (ILI): a fever greater than or equal to 100°F with cough and/or sore throat.
- Percent positive: The number of positive influenza laboratory tests divided by the total number of tests performed.
- Incidence rate is per 100,000 population as estimated by the state demographer.

This report contains information from national and state-level data sources. Influenza surveillance data is collected by a various systems, including:

- Influenza-like Illness Network (ILINet): a sentinel surveillance system in collaboration with the Centers for the Disease Control and Prevention (CDC) where outpatient providers report ILI information weekly.
- National Electronic Telecommunication System for Surveillance (NETSS): a system whereby data is transmitted to CDC. Influenza data collected through NETSS does not provide influenza sub-typing information.
- National Electronic Disease Surveillance System (NEDSS): a system for collecting data and monitoring disease trends and outbreaks.
- NEDSS Based System (NBS): an implementation of the NEDSS standards. It provides a secure, accurate, and efficient means of collecting, transmitting, and analyzing public health data.

Citations


Comments, suggestions, and requests for further information may be addressed to:

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Recommended Citation:

This publication was supported by Cooperative Agreement Number TP000534-02 from the Centers for Disease Control and Prevention and/or Assistant Secretary for Preparedness and Response. Its contents are solely the responsibility of the authors and do not necessarily represent the official views of the Centers for Disease Control and Prevention and/or Assistant Secretary for Preparedness and Response.