ARKANSAS DEPARTMENT OF HEALTH

Nathaniel Smith, MD, MPH, Secretary of Health

Outbreak Response/Epidemiology
Influenza Weekly Report
Arkansas 2019-2020

Week Ending Saturday 02/29/2020

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March 5, 2020
During flu season, the Arkansas Department of Health (ADH) produces a Weekly Influenza Report for clinicians. The report provides information on flu activity in the state. The report also compares influenza-like-illness (ILI) in Arkansas to activity in the U.S. ADH receives reports of only a fraction of flu cases since it only requires reports of hospitalizations, deaths, and outbreaks. Therefore, it is important to understand that the information in the weekly update is representative of the timing and location of activity, but it does not reflect the overall burden of disease. It is presumed that there are many more people actually affected than the report shows. Clinicians and policy makers may find the report helpful in terms of communicating to colleagues and patients about the current status of the flu season.

Report Key Points:

- For Week 9, Arkansas reported “Widespread” activity to the Centers for Disease Control and Prevention (CDC) for geographic spread of influenza, and “High” or 10 out of 10 for ILI intensity.
- Since September 29, 2019, 30,750 positive influenza tests have been reported to the ADH online database by health care providers, with over 2,260 positive tests reported this week. Please note that reported cases reflect only a portion of the actual numbers of flu cases in the state.
- Among flu antigen tests this season that can distinguish between influenza A and B virus types, 51 percent were influenza A, and 49 percent were influenza B.
- There were 543 positive PCR flu tests from private labs this week: 264 tested positive for influenza A, 276 tested positive for influenza B, and 3 tested positives for both influenza A and B. At the ADH lab, 1 sample tested positive for influenza A Subtype H1N1, 1 sample tested positive for influenza B Subtype Victoria, and 1 sample tested negative for flu this week.
- About 5.6 percent of patients visiting emergency rooms this week were there for ILI (Syndromic Surveillance). About 9.3 percent of outpatient visits were for ILI (ILINet sentinel providers).
- The average school absenteeism rate last week was 6.6 percent among public schools. As of March 3, 2020, ADH is aware of 41 schools/districts that closed briefly due to the flu this season.
- To date, 69 influenza-related deaths have been reported in Arkansas this flu season, one of them was a pediatric death. CDC estimates a total of 18,000 flu deaths have occurred nationwide including 125 pediatric deaths reported this season.
- Since September 29, 2019, 11 facilities including 9 nursing homes have reported influenza outbreaks.
- Nationally, the proportion of deaths reported to the National Center for Health Statistics attributed to pneumonia and influenza (P&I) remains below the epidemic threshold this week.
- For Week 8, the geographic spread of influenza was reported as widespread in Puerto Rico and 48 states, and regional in 1 state. The District of Columbia and 1 state reported local activity, the U.S. Virgin Islands reported sporadic activity, and Guam did not report.
- You can report flu year-round and view the weekly influenza report during the influenza season at: http://www.healthy.arkansas.gov/programs-services/topics/influenza. You can also access the reporting website directly at: https://FluReport.ADH.Arkansas.gov.

For Additional National and International Influenza Surveillance Information:
CDC - Seasonal Influenza (Flu) - Weekly Report: http://www.cdc.gov/flu/weekly/
Death Report for Week 9
- Deaths from all causes: 741
- Deaths due to Pneumonia: 48
- PCR confirmed Flu Deaths: 1
- Death Certificate or Flu Antigen only: 3

Cumulative Flu Deaths since 09/29/2019
- PCR confirmed Flu deaths: 13
- Death Certificate or Antigen only: 56
- Cumulative Flu deaths: 69

ER Visits (Syndromic Surveillance)
- Week Ending: 02/29/2020
  Weighted Average: 5.6%
  – Total Visits: 22,081
  – Visits with ILI: 1,241
- Previous Week
  Weighted Average: 6.7%
  – Total Visits: 22,210
  – Visits with ILI: 1,484

Total Flu-Related Hospital Admissions
- PCR Confirmed:
  – Cumulative: 386
  – Week ending 02/29/2020: 26
- Antigen Positive:
  – Cumulative: 619
  – Week ending 02/29/2020: 43

Weekly Arkansas ILI Intensity Level
Reported by Sentinel Providers

PCR Lab Confirmed Influenza Cases
- Total Cases since 09/29/2019: 5,811
- Week ending 02/29/2020: 545

<table>
<thead>
<tr>
<th>PCR Tests</th>
<th>ADH Lab Week 9</th>
<th>Other Labs Week 9</th>
<th>Cumulative Cases Since 09/29/2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>A+</td>
<td>0</td>
<td>264</td>
<td>2,762</td>
</tr>
<tr>
<td>B+</td>
<td>0</td>
<td>276</td>
<td>2,896</td>
</tr>
<tr>
<td>Both A and B</td>
<td>0</td>
<td>3</td>
<td>36</td>
</tr>
<tr>
<td>B/Victoria</td>
<td>1</td>
<td>0</td>
<td>41</td>
</tr>
<tr>
<td>B/ Yamagata</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>H1N1+</td>
<td>1</td>
<td>0</td>
<td>75</td>
</tr>
<tr>
<td>H3+</td>
<td>0</td>
<td>0</td>
<td>1</td>
</tr>
<tr>
<td>Unsubtypeable</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Total</td>
<td>2</td>
<td>543</td>
<td>5,811</td>
</tr>
<tr>
<td>Negative</td>
<td>1</td>
<td>--</td>
<td>--</td>
</tr>
</tbody>
</table>

PCR Confirmed Influenza Cases since 09/29/2019

<table>
<thead>
<tr>
<th>Age Groups</th>
<th>PCR+</th>
<th>Hospitalized</th>
<th>Deaths</th>
</tr>
</thead>
<tbody>
<tr>
<td>0-4 yr.</td>
<td>1,069</td>
<td>15</td>
<td>0</td>
</tr>
<tr>
<td>5-18 yr.</td>
<td>2,620</td>
<td>9</td>
<td>0</td>
</tr>
<tr>
<td>19-24 yr.</td>
<td>212</td>
<td>13</td>
<td>0</td>
</tr>
<tr>
<td>25-44 yr.</td>
<td>818</td>
<td>46</td>
<td>3</td>
</tr>
<tr>
<td>45-64 yr.</td>
<td>669</td>
<td>133</td>
<td>6</td>
</tr>
<tr>
<td>&gt;= 65 yr.</td>
<td>398</td>
<td>170</td>
<td>4</td>
</tr>
<tr>
<td>Unknown</td>
<td>25</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Total</td>
<td>5,811</td>
<td>386</td>
<td>13</td>
</tr>
</tbody>
</table>

School Absenteeism*
Week Ending: 02/29/2020
- Percent Absent: 6.6
- Previous Week: 7.6
  - Average daily absenteeism for all public schools during this reporting week.

Geographic ILI Activity Level Reported for Week 9:
Weekly School Absenteeism Rates, Arkansas Public Schools

<table>
<thead>
<tr>
<th>Week, Month of Report</th>
<th>Percent Absent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Off Season Baseline</td>
<td>3%</td>
</tr>
<tr>
<td>2018-19</td>
<td>5%</td>
</tr>
<tr>
<td>Average 2013-19</td>
<td>7%</td>
</tr>
<tr>
<td>2019-20</td>
<td>10%</td>
</tr>
</tbody>
</table>

School Absenteeism Rate per County, Arkansas 2019-2020

Percent Absent for Week Ending 2/29/2020

Percent of students absent:
- 0 - 5
- > 5 - 10
- > 10 - 15
- > 15 - 20
- > 20
- No Report
- Increase 10% from Previous Rate

Date: March 3, 2020
Source: Arkansas Department of Health
Author: Haytham Safi, Epidemiologist
Influenza Mortality by Age Group, Arkansas 2005-2020 (Provisional)
Report Updated: 3/3/2020

<table>
<thead>
<tr>
<th>Age Group</th>
<th>0-4 Yrs</th>
<th>5-18 Yrs</th>
<th>19-24 Yrs</th>
<th>25-44 Yrs</th>
<th>45-64 Yrs</th>
<th>65+ Yrs</th>
</tr>
</thead>
<tbody>
<tr>
<td>2019-2020</td>
<td>0</td>
<td>1</td>
<td>0</td>
<td>7</td>
<td>22</td>
<td>39</td>
</tr>
</tbody>
</table>

Flu Season

* All seasons range from week 40 to week 39 except 2009-2010 started week 38
Source: ADH Outbreak Response Section, and Center for Health Statistics

Hospital Report – Downloaded from ESSENCE (Syndromic Surveillance)
Percent ER Visits with ILI

Week

% of Patients with ILI

- 2017-2018
- 2018-2019
- 2019-2020
Arkansas Subset of US Outpatients Influenza Surveillance (ILINET)

Percentage of Outpatient Visits Due to Influenza-like Illness Reported by ILINet in Arkansas

- 2019-20
- Average 2013-18
- Off Season Rate
- 2018-19

Weekly Influenza Claims Paid by Medicaid and BCBS of Arkansas

- Average 2013-19
- YR 2018-19
- Off Season Baseline
- YR 2019-20
Influenza Positive Tests Reported to CDC and ILI Activity, by HHS Region, 2018-2019 Season, Week Ending February 22, 2020

Values in legend are for the highlighted HHS region (Region 6)

Weekly Influenza Activity Estimates Reported by State and Territorial Epidemiologists

Week ending February 22, 2020 - Week 8

Arkansas Flu Activity Level Reported for Week 9: Widespread
Influenza Positive Tests Reported to CDC by U.S. Public Health Laboratories, National Summary, 2019-2020 Season

Pneumonia and Influenza Mortality from the National Center for Health Statistics Mortality Surveillance System Data through the week ending February 15, 2020, as of February 27, 2020