

2009-2010 Influenza Season (Season began 10/4/2009)

**Synopsis:**

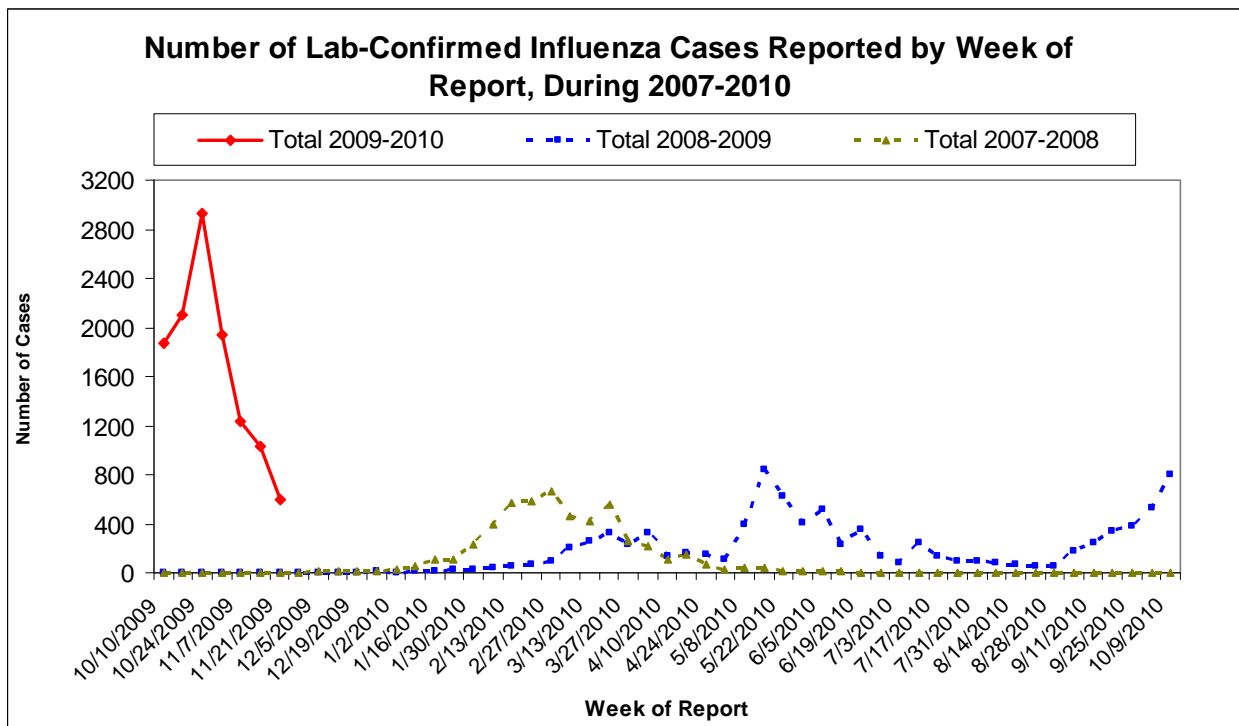
During the past week, influenza activity remained elevated in Arizona. Arizona’s influenza activity level continues to be “widespread”.

**Influenza activity highlights:**

- 602 laboratory-confirmed cases of influenza were reported in the past week; this includes 316 laboratory-confirmed cases of 2009 H1N1 influenza.
- 99.3% of the subtyped influenza viruses at the Arizona State Laboratory during the previous week were 2009 H1N1 influenza virus; 1 specimen was confirmed as influenza B.
- 61 pneumonia and influenza (P&I) deaths were identified during the previous week and 148 P&I deaths have been identified during the 2009-2010 influenza season; 880 P&I deaths were identified during the 2008-2009 influenza season
- 12 deaths associated with lab-confirmed 2009 H1N1 influenza virus were identified in the previous week; 115 deaths associated with the 2009 H1N1 influenza virus have been identified since April 2009.
- 2 lab-confirmed influenza-associated pediatric deaths were reported in the past week and 10 deaths have been reported for the current season. The 2009 H1N1 influenza virus was confirmed in all ten pediatric deaths.
- The cases included in this report represent a small proportion of the true number of cases of influenza. Many people do not visit the doctor when ill and doctors should not be expected to run tests on all patients exhibiting influenza-like symptoms.

**Laboratory-Confirmed Influenza Activity by Season [2007-2010]:**

Positive influenza tests are reported to ADHS. These include many types of test (rapid tests, culture, PCR, DFA, etc.). Many of these do not distinguish 2009 H1N1 influenza from other influenza strains.



**Laboratory-Confirmed Influenza Activity by County [2009-2010 Influenza Season]:**

<b>County</b>	<b>Number of Laboratory-Confirmed Cases (Includes ALL reported lab-confirmed flu reports, regardless of subtype.)</b>		<b>Number of Laboratory-Confirmed 2009 H1N1 Influenza Cases (Includes ONLY cases that are confirmed to be H1N1 by the State Lab or other validated facilities.)</b>		
	<i>2009-2010 Season</i>	<i>Last Week</i>	<i>2009-2010 Season</i>	<i>Last Week</i>	<i>Total Since April 2009</i>
Apache	144	5	26	1	84
Cochise	474	7	30	1	41
Coconino	306	11	80	4	162
Gila	53	7	17	0	44
Graham	534	69	13	0	22
Greenlee	1	0	1	0	1
La Paz	5	0	3	0	18
Maricopa	6,376	275	3,616	181	5,098
Mohave	305	42	243	33	313
Navajo	86	0	41	0	132
Pima	2,004	116	778	47	1,027
Pinal	617	30	355	19	466
Santa Cruz	67	1	19	0	36
Yavapai	437	24	161	18	181
Yuma	293	14	133	12	212
Unknown	3	1	0	0	0
<b>Total</b>	11,705	602	5,516	316	7,837

**Arizona State Public Health Laboratory (ASPHL) - Influenza Subtyping Data:**

- In the past week, 143 specimens tested positive for influenza at ASPHL.
- 99.3% of the subtyped influenza viruses at the Arizona State Laboratory during the previous week were 2009 H1N1 influenza virus; 1 specimen was confirmed as influenza B.
- Two specimens tested positive for influenza B at the Arizona State Laboratory this season.

## Epidemiologic Information for confirmed 2009 H1N1 influenza cases since April 2009:

	Total Confirmed H1N1 Cases (N=7,837)	Identified H1N1 Hospitalizations (N=1,436)	Identified H1N1- Associated Deaths (N=115)
<b>AGE</b>			
Range	7 Days – 96 Years	7 Days – 96 Years	9 Months – 80 Years
Mean, Median	23 years, 17 years	27 Years, 22 years	44 Years, 49 years
<b>AGE GROUP</b>			
0 to 4 years	1,150 (15%)	307 (21%)	4 (3%)
5 to 18 years	3,203 (31%)	339 (24%)	12 (10%)
19 to 49 years	2,605 (33%)	453 (32%)	43 (37%)
50 to 64 years	637 (8%)	248 (17%)	41 (36%)
65 years or older	186 (2%)	89 (6%)	15 (13%)
Unknown age	56 (1%)	0 (0%)	0 (0%)
		<b>Investigated H1N1 Hospitalizations** (N=991)</b>	<b>Investigated H1N1- Associated Deaths** (N=100)</b>
<b>MEDICAL HISTORY &amp; INFO</b>			
At least 1 Underlying Medical Condition*		601 (61%)	84 (84%)
Pneumonia at Time of Hospital Admission		386 (39%)	64 (64%)
Intensive Care Unit Admission		241 (24%)	73 (73%)
Mechanical ventilation required		145 (15%)	69 (69%)

\*Medical conditions include: asthma, chronic lung disease, chronic heart or circulatory disease, metabolic disease, cancer, pregnancy, immunosuppressive condition, neurologic disease, and other chronic diseases.

\*\*Investigations for identified H1N1 hospitalizations and deaths are ongoing. Pertinent data may not be collected for all identified cases at time of the report, so data presented above are only for investigated cases.

### Glossary of Key Terms:

*2009-2010 Influenza Season* – The season is defined by surveillance weeks. The first day of the 2009-2010 influenza season was October 4<sup>th</sup>, 2009, or week 40 and the 2009-2010 surveillance season will continue through October 2<sup>nd</sup>, 2010, or week 39.

*Widespread Activity* – Increased influenza-like illness (ILI) and/or institutional outbreaks (ILI or laboratory-confirmed) in at least half of Arizona’s defined regions AND recent (within the previous three weeks) laboratory-confirmed influenza in the state.

*Pneumonia and Influenza Mortality* – Many influenza-related deaths are due to complications of influenza infection, including pneumonia, and influenza is infrequently listed as the cause of death on death certificates. Surveillance from death certificates often uses the category of “pneumonia and influenza” as an indicator, although not all pneumonias are associated with influenza. See the CDC website for more information

[http://www.cdc.gov/flu/about/disease/us\\_flu-related\\_deaths.htm](http://www.cdc.gov/flu/about/disease/us_flu-related_deaths.htm).

*Hospitalization* – A hospitalization, for purposes of 2009 H1N1 influenza investigations, is defined as a laboratory-confirmed 2009 H1N1 influenza case who has been admitted to the hospital for at least 24 hours.