



Flu Watch

South Carolina Department of Health and Environmental Control
 Division of Acute Disease Epidemiology
 Influenza Surveillance Weekly Report

<http://www.scdhec.gov/health/disease/acute/flu.htm>

Week Ending October 9, 2010 (MMWR Week 40)

Highlights: This is the first week of the 2010-11 influenza season

Influenza Activity Level: Sporadic

Note: Activity level definitions are found on page 9

ILI Activity Status (South Carolina baseline is 2.05%*): Below baseline in the Upstate (.36%) and Midlands (.82%). Above baseline along the Coast (2.72%). The state ILI percentage was 1.06%. These data reflect reports from 11 (25%) providers.

Note: See map of counties on page 3 for regional descriptions

SC Viral Isolate and RT-PCR Activity: During the past MMWR (40) week, there were no positive specimens reported by any lab.

Positive Rapid Flu Test Activity: There were 33 positive tests reported.

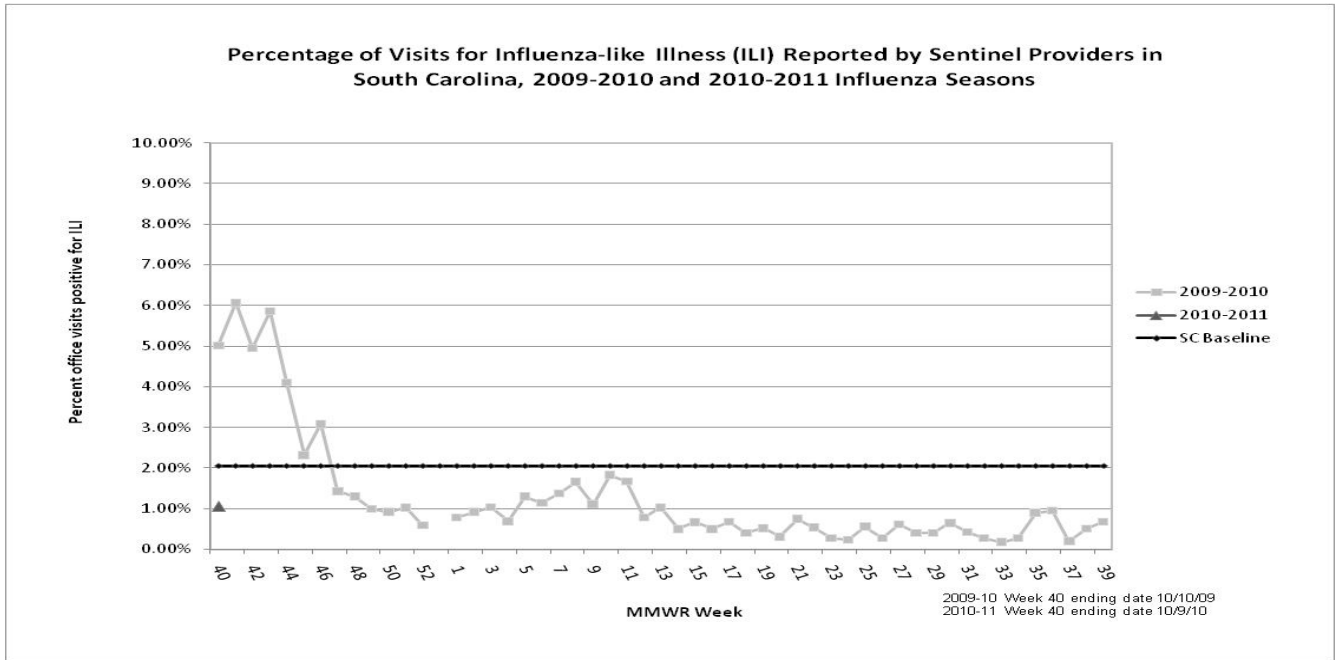
Hospitalizations: Two hospitalizations were reported.

Deaths: No deaths were reported.

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I. ILINet Influenza-Like Illness Surveillance

During MMWR week 40 ending October 2, 2010, 1.06% of patient visits to SC ILINet providers were due to ILI. The state ILI is below the state baseline (2.05%). This ILI percentage compares to 5.02% this time last year. Reports were received from providers in 11 counties, representing 7 of the 8 regions.



*The SC baseline is the mean percentage of patient visits for ILI during non-influenza weeks (weeks when percent of positive lab tests was below 20%) for the previous three seasons plus two standard deviations.

Reported Influenza-Like Illness by Sentinel Providers*
October 2, 2010-October 9, 2010

County	ILI %	County	ILI %
Abbeville	---	Greenwood	NR
Aiken	0%	Hampton	NR
Allendale	---	Horry	NR
Anderson	0%	Jasper	NR
Bamberg	---	Kershaw	NR
Barnwell	---	Lancaster	---
Beaufort	NR	Laurens	NR
Berkeley	NR	Lee	---
Calhoun	---	Lexington	0%
Charleston	6.08%	Marion	---
Cherokee	---	Marlboro	---
Chester	---	McCormick	NR
Chesterfield	---	Newberry	---
Clarendon	---	Oconee	---
Colleton	---	Orangeburg	---
Darlington	---	Pickens	0%
Dillon	NR	Richland	NR
Dorchester	NR	Saluda	NR
Edgefield	---	Spartanburg	1.36%
Fairfield	0%	Sumter	NR
Florence	.22%	Union	---
Georgetown	1.67%	Williamsburg	---
Greenville	0%	York	1.02%

NR: No reports received
---: No enrolled providers



Geographic Region	ILI %	# of Reporters
Upstate-Regions 1 -2	.36	4
Midlands-Regions 3-5	.82	5
Coastal-Regions 6-8	2.72	2

*County ILI percentages may be affected by the number of reporting providers within that county.

II. Virologic Surveillance

During the past MMWR week (10/2-10/9), None of the 3 specimens tested by the Bureau of Labs (BOL) were positive. There were no positive specimens reported by other clinical labs.

Positive confirmatory influenza test results Current MMWR Week (10/2/10-10/9/10)		
	BOL*	Other clinical labs
Number of specimens tested	3	-
Number of positive specimens	0	
Positive specimens by type/subtype		
A (H1)		
A (H3)		
A (unsubtyped)		
A (2009 H1N1)		
Influenza B		
*Culture and/or RT-PCR		

Positive confirmatory influenza test results Cumulative (10/2/10-10/9/10)		
	BOL*	Other clinical labs
Number of specimens tested	3	-
Number of positive specimens	0	
Positive specimens by type/subtype		
Influenza A		
A (H3)		
A (unsubtyped)		
A (2009 H1N1)		
Influenza B		
Unk		
Other		
*Culture and/or RT-PCR		

Positive Confirmatory tests by County*
October 2, 2010-October 9, 2010

County	Total	County	Total
Abbeville		Hampton	
Aiken		Horry	
Allendale		Jasper	
Anderson		Kershaw	
Bamberg		Lancaster	
Barnwell		Laurens	
Beaufort		Lee	
Berkeley		Lexington	
Calhoun		Marion	
Charleston		Marlboro	
Cherokee		McCormick	
Chester		Newberry	
Chesterfield		Oconee	
Clarendon		Orangeburg	
Colleton		Pickens	
Darlington		Richland	
Dillon		Saluda	
Dorchester		Spartanburg	
Edgefield		Sumter	
Fairfield		Union	
Florence		Williamsburg	
Georgetown		York	
Greenville		Unknown	
Greenwood		Other	

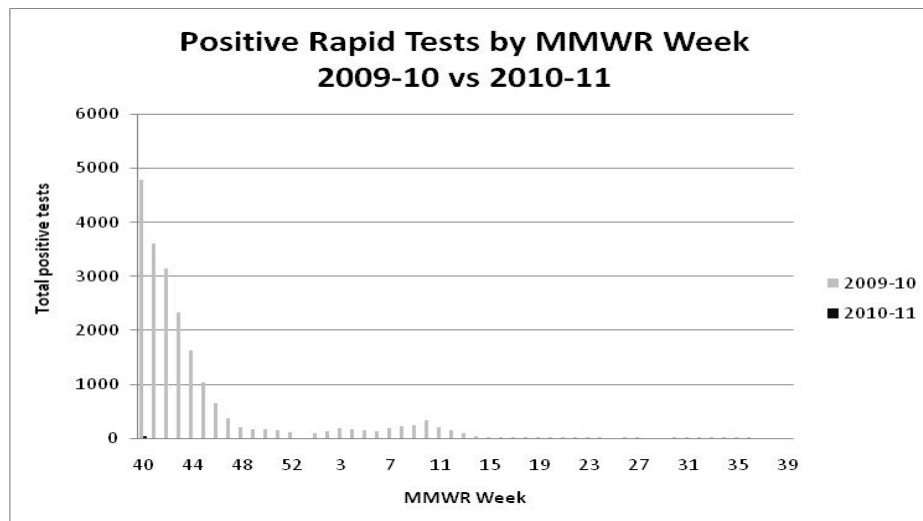
*These data include cultures and RT-PCRs and are provisional.

III. Positive Rapid Antigen Tests

There were 33 positive rapid antigen tests reported for the week ending October 9, 2010. Of these, 23 were influenza A, 3 influenza A/B, and 7 influenza B.

Positive Rapid Flu Tests by County
October 2, 2010 – October 9, 2010

County	Positive Tests	County	Positive Tests
Abbeville		Greenwood	3
Aiken		Hampton	
Allendale		Horry	10
Anderson	4	Jasper	
Bamberg		Kershaw	
Barnwell		Lancaster	
Beaufort	2	Laurens	2
Berkeley		Lee	
Calhoun		Lexington	2
Charleston	1	Marion	
Cherokee		Marlboro	
Chester		McCormick	
Chesterfield		Newberry	
Clarendon		Oconee	
Colleton		Orangeburg	3
Darlington	1	Pickens	
Dillon		Richland	1
Dorchester		Saluda	
Edgefield		Spartanburg	
Fairfield		Sumter	
Florence	3	Union	
Georgetown		Williamsburg	1
Greenville		York	
		Unknown	

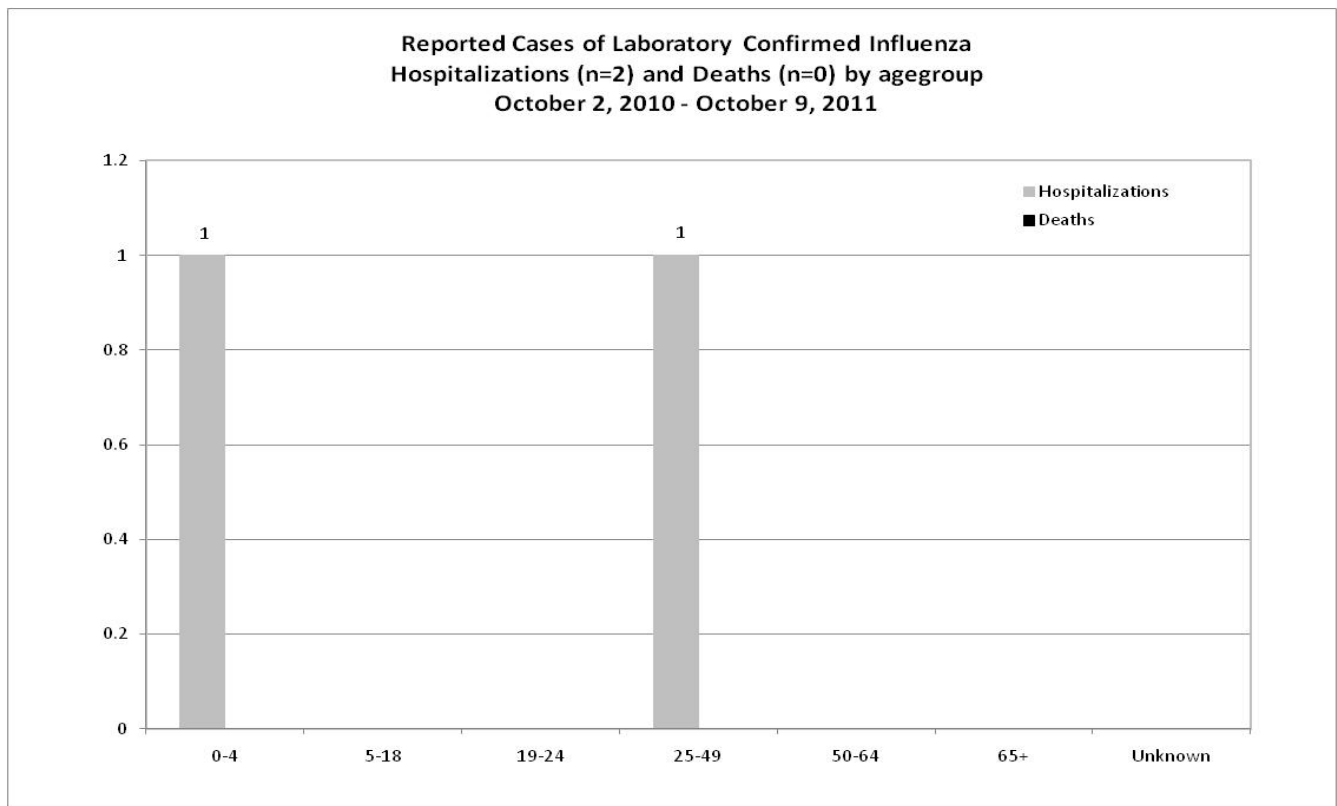


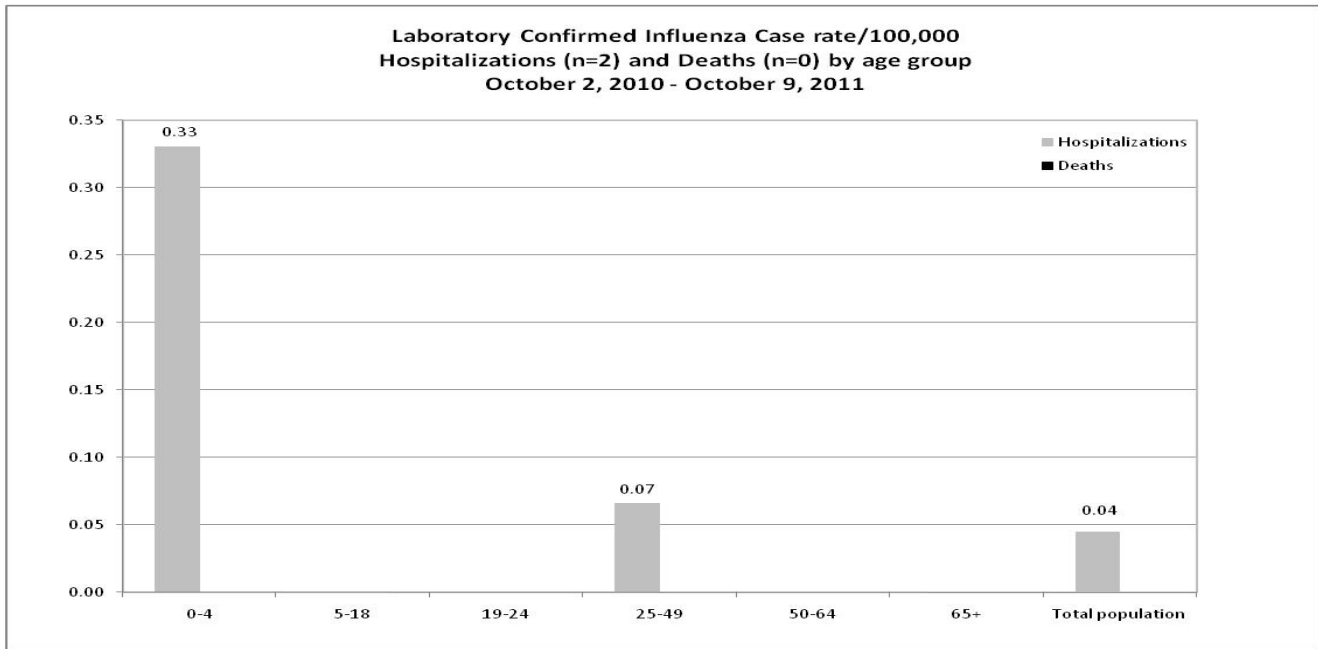
IV. Influenza hospitalizations and deaths

There were two lab confirmed influenza hospitalizations reported by during the past week. No lab confirmed influenza deaths were reported.

Number of Hospitals Reporting (current week)	Total number	
	<i>Previous MMWR (10/2-10/9)</i>	<i>Cumulative (since 10/2/10)</i>
Hospitalizations	2	2
Deaths	0	0

*These data are provisional





V. South Carolina Influenza Surveillance Components

What does influenza surveillance in South Carolina consist of?

South Carolina influenza surveillance consists of mandatory and voluntary reporting systems for year-round influenza surveillance. These networks provide information on influenza virus strain and subtype and influenza disease burden.

South Carolina Influenza Surveillance Systems:

Mandatory reporting:

Positive Influenza Culture Reporting

Positive influenza culture results from commercial laboratories should be reported to DHEC within 7 days electronically via CHES or using a DHEC 1129 card.

Positive Rapid Antigen Test Reporting

DHEC requires weekly submission to the local health department of summary numbers of positive rapid influenza tests and influenza type identified. This should be reported by fax or email by noon on Monday for the preceding week.

Influenza death reporting

Lab confirmed influenza deaths, pediatric and adult, should be reported to DHEC within 7 days. These include results from viral culture, PCR, rapid flu tests, DFA, IFA or autopsy results consistent with influenza. Hospitals should report deaths to their regional health department by noon on Monday for the preceding week.

Influenza hospitalizations

DHEC now requires weekly submission of laboratory confirmed influenza hospitalizations. Hospitals should report these to their regional health department by noon on Monday for the preceding week.

Voluntary networks:

Laboratory Viral Isolate Network

Viral isolate surveillance is essential for identifying circulating influenza strain subtype information, and the identification of new strains that may need to be included in the next year’s influenza vaccine. Participating providers receive culture media, packaging, processing and shipping labels in order to submit a subset of specimens to the Bureau of Labs (BOL).

Influenza-Like Illness (ILINet) Sentinel Providers Network

ILINet focuses on the number of patients presenting with influenza-like symptoms in the absence of another known cause. ILI is defined as fever (temperature of $\geq 100^{\circ}\text{F}$) plus a cough and/or a sore throat in the absence of another known cause. Providers submit weekly reports to the CDC of the total number of patients seen in a week and the subset number of those patients with ILI symptoms by age group.

For additional information about ILINet or to become an ILINet provider, contact the Acute Disease Epidemiology influenza surveillance coordinator at springcb@dhec.sc.gov.

South Carolina Aberration Alerting Network (SCAAN)

SCAAN is a collaborative network of syndromic surveillance systems within South Carolina. Currently our network contains the following data sources: SC Hospital Emergency Department (ED) chief-complaint data, Poison Control Center call data, Over-the-Counter (OTC) pharmaceutical sales surveillance, and CDC’s BioSense Biosurveillance system. The hospital ED syndromic surveillance system classifies ED chief complaint data into appropriate syndrome categories (ex: Respiratory, GI, Fever, etc.). These syndrome categories are then analyzed using the cumulative sum (CUSUM) methodology to detect any significant increases. The syndromic reports are distributed back to the hospital on a daily basis.

To join the SCAAN system or for more information, please contact: Himel Dhotre at 803-898-1588 or dhotrehc@dhec.sc.gov.

VI. Influenza Activity Levels

Activity Level	ILI activity/Outbreaks		Laboratory data
No activity	Low	And	No lab confirmed cases
Sporadic	Not increased	And	Isolated lab-confirmed cases
	OR		
Local	Not increased	And	Lab confirmed outbreak in one institution
	Increased ILI in 1 region; ILI activity in other regions is not increased	And	Recent (within the past 3 weeks) lab evidence of influenza in region with increased ILI
Regional	OR		
	2 or more institutional outbreaks (ILI or lab confirmed) in 1 region; ILI activity in other regions is not increased	And	Recent (within the past 3 weeks) lab evidence of influenza in region with the outbreaks; virus activity is no greater than sporadic in other regions
Widespread	Increased ILI in 2-3 regions	And	Recent (within the past 3 weeks) lab confirmed influenza in the affected regions
	OR		
Widespread	Institutional outbreaks (ILI or lab confirmed) in 2-3 regions	And	Recent (within the past 3 weeks) lab confirmed influenza in the affected regions
	Increased ILI and/or institutional outbreaks (ILI or lab confirmed) in at 4 of the regions	And	Recent (within the past 3 weeks) lab confirmed influenza in the state.