Regional Update EW 29
Influenza
(August 2, 2011 - 17 h GMT; 12 h EST)

PAHO interactive influenza data: http://ais.paho.org/phi/viz/ed_flu.asp
Influenza Regional Reports: http://new.paho.org/hq/index.php?option=com_content&task=view&id=3352&Itemid=2469&to=2246

The information presented in this update is based on data provided by Ministries of Health and National Influenza Centers of Member States to the Pan American Health Organization (PAHO) or from updates on the Member States’ Ministry of Health web pages.

- In North America, influenza activity remains low.
- In Central America and the Caribbean, co-circulation of respiratory syncytial virus (RSV) was reported during the last weeks in some countries (Costa Rica, El Salvador, Guatemala and Panama); and variable detection of influenza A (H1N1 2009 and H3N2) and influenza B.
- In the Southern Cone, RSV circulation continues to decrease (Argentina, Chile and Paraguay). Among influenza viruses, co-circulation of influenza A (H1N1 2009 and H3) has been reported, even though at lower levels than expected for this time of year.

Epidemiologic and virologic influenza update

North America
In the United States¹, in EW 29, at the national level, the proportion of consultations for Influenza-like Illness (ILI) (0.7%) remained below the national baseline. The proportion of deaths attributed to pneumonia and influenza (6.4%) was below the epidemic threshold. This week no pediatric deaths associated with influenza B were reported. During EW 29, the percentage of samples positive for influenza among all samples tested remained at low levels, less than 1%.

In Mexico, in EW 29, the percentage of samples positive for respiratory viruses was less than 2%.

Caribbean
CAREC*, in EW 29, received information from Jamaica, Saint Vincent and the Grenadines, Saint Lucia and Tobago, and reported that the rate of Severe Acute Respiratory Infection (SARI) (2.6%) increased compared to the previous week (1.6%). No SARI-related deaths have been reported since EW 26. Influenza laboratory data was received from Barbados and the CAREC Laboratory. Within the past 4 weeks (weeks 26-29), influenza H1N1 2009 strain, influenza H3N2, and 6 other virus types have been identified among cases from CAREC member countries. Respiratory sincicial virus (RSV) and Rhinovirus are the viruses most frequently confirmed within the last 4 weeks.

In Cuba, in EW 29, among all samples tested (n=56), the percentage of samples positive for respiratory viruses remained similar to the previous week (~65%); however, the percentage of samples positive for influenza increased from 0% (EW 28) to 25% (EW 29). Influenza A/H3N2, RSV and other respiratory viruses (rhinovirus) were the predominant viruses in circulation.

In the Dominican Republic, in EW 30, among all samples tested (n=20), the percentage of samples positive for influenza decreased to 10%, and influenza B was the only virus detected this week. Between EWs 23-29, influenza A/H1N1 2009 was the primary virus in circulation.

In Jamaica, in EW 29, the proportion of consultations for acute respiratory illness (ARI) was 0.3% less than that reported for the previous week. The proportion of SARI admissions was less than 1% and remained stable compared to the previous week. There were no SARI deaths reported for EW 29. No influenza or other respiratory viruses cases were detected since EW 21.

* Includes Barbados, Dominica, Jamaica, St Vincents and the Grenadines, St Lucia, and Trinidad and Tobago
Central America

In Costa Rica, in EW 30, among all samples tested (n=66), the percentage of samples positive for respiratory viruses remained similar to the previous week (~40%). RSV has been the predominant virus since EW 28. Sporadic detections of influenza A/H1N1 2009 were reported.

In Honduras\(^2\), in EW 29, at the national level, the proportion of ILI consultations was slightly below the previous week, remaining <10%, and less than observed in 2010 during the same time. The proportion of SARI hospitalizations was similar to the previous week and remains below 10%. This week, 2 SARI deaths were reported. Between EWs 25-29, the percentage of samples positive for respiratory viruses increased to ~40%, and adenovirus was the predominant virus, followed by influenza A/H3N2, influenza B and influenza A/H1N1.

In El Salvador, in EW 28, the proportion of samples positive for respiratory viruses remained at ~45% without detections of influenza since EW 26. RSV has been the predominant virus since EW 21.

In Guatemala, between EWs 26-28, an increase in the proportion of samples positive to respiratory viruses (from 35% to 55%) was reported. RSV was the predominant respiratory virus, followed by unsubtyped influenza A and influenza A/H3.

In Nicaragua, in EW 29, no respiratory viruses were detected. No influenza viruses have been detected since EW 09.

In Panama, in EW 29, the percentage of respiratory viruses remained similar to the previous week (~20%); RSV has been the predominant virus in circulation, followed by adenovirus. Sporadic detection of influenza A/H1N1 2009 have been reported.

South America – Andean

In Bolivia\(^3\), according to the regional ARI (spell out) endemic channels, through EW 27, ARI activity remains close to the epidemic threshold in the departments of La Paz, Cochabamba, Cuquisaca and Oruro. According to laboratory data, in EW 29, the department of La Paz (west of the country), influenza A/H3N2 was the predominant virus since EW 18. In the department of Santa Cruz (east of the country), among analyzed samples, few respiratory viruses were detected, but included influenza A/H3N2 and influenza A/H1N1 2009.

In Ecuador, in EW 28, at the national level the percentage of SARI hospitalizations, SARI ICU admissions and SARI deaths remained below 10%. In EW 28, of all samples tested (n=48), the percentage of samples positive for respiratory viruses decreased to 6%. No influenza viruses have been detected since EW 11. RSV has been the primary virus in circulation since EW 9, especially in children less than 1 year.

In Colombia, through EW 28, 2011, there has been co-circulation of influenza A/H1N1 2009 and influenza A/H3N2. Between EWs 27-29, the percentage of positives for influenza increased from 10% to 23%, with influenza A/H1N1 2009 being the predominant virus.

South America – Southern Cone

In Argentina\(^4\), at the national level, ILI activity for EW 26 showed a lower cumulative rate than what was observed in the same period in 2010. Concerning rates by region, all regions show a stable trend in comparison to previous years, except the northwestern region of the country, which showed a decreasing trend. Pneumonia activity in EW 26, at the national level showed an cumulative rate lower than what was observed in 2010 and similar to what was observed in 2009 for this same time of year. At the regional level, the northwestern and southern regions showed a higher pneumonia rate compared to 2010. According to national laboratory data in EW 29, the predominance of RSV continued but with a decreasing trend since its peak in EW 23. Concerning influenza virus, since EW 19, there has been low? influenza virus circulation (unsubtyped influenza A and influenza A/H3).

In Brazil, according to Adolfo Lutz (San Pablo) data, in EW 28, among all samples tested (n=62), the percentage of samples positive for influenza remained similar to the two previous weeks (~17%). Between EWs 25-28, co-circulation of influenza A/H3N2, as predominant virus, with influenza A/H1N1 2009 was reported.

In Chile\(^5\), in EW 29, ILI activity (7 consultations per 100,000 inhabitants) at the national level was similar to the previous week (6.6 per 100,000 inhabitants) and remained at a low intensity and within the expected levels for this period. This week, the percentage of emergency department admissions for respiratory cases remained similar than the previous week. In EW 28, no deaths associated with influenza were reported.
According to laboratory data, in EW 29, of all samples tested at the national level (n=~470), 40% were positive for respiratory viruses; of these, RSV was predominant (66%), followed by influenza A (13%), adenovirus (12%) and parainfluenza (8%). Regionally, influenza A viruses were detected in Valparaíso, Viña del Mar and Santiago. Among subtyped influenza A viruses, the predominant subtype was influenza A/H1N1 2009.

In Paraguay, in EW 29, the proportion of ILI consultations among all consultations decreased compared to the previous week (from 13% to 11%). Among SARI hospitalizations, the proportion of SARI admissions, and the percentage of SARI deaths were similar to the previous week and remained below 10%, while the proportion of SARI ICU admissions increased slightly compared to the previous week (from 13% to 16%). In EW 28, the percentage of samples positive for respiratory viruses remained at ~5%, with little detection of respiratory viruses. Influenza has not been detected since EW 13.

In Uruguay, even though the proportion of SARI hospitalizations increased between EWs 18-31, it still remains lower than 5% of all hospitalizations. SARI ICU admissions (~7%) and the proportion of SARI deaths (~0%) for EW 31 are lower compared to the previous week. According to available laboratory data through EW 28, there was an an increase in the percentage of positives for respiratory viruses between EW 25 (14%) and EW 28 (35%) and the percentage of positives for influenza virus between EW 25 (1.2%) and EW 28 (18%); these increases were associated with a higher detections of influenza A/H1N1 2009 and RSV.

Graphs

North America

United States

Mexico
Caribbean

CAREC

% SARI Admissions
Graph A: SARI Admissions and SARI Admissions Rate per 100 Hospital Medical Admissions from Sentinel Sites in Select CAREC Member Countries, 2011

Cuba and Dominican Republic

Cuba

Dominican Republic

Jamaica

* Note: Graphs include data from Barbados, Dominica, Jamaica, St. Lucia, St. Vincent & the Grenadines, and Tobago.
Central America

Honduras

% of ILI consultations

% of SARI hospitalizations

Costa Rica, El Salvador, Guatemala, Nicaragua and Panama

Costa Rica

El Salvador

Guatemala

Nicaragua

Panama
South America - Andean

Bolivia

ARI Endemic Channel (La Paz, Bolivia)

Bolivia – Santa Cruz (CENETROP)

Lab data. Bolivia – La Paz (INLASA)

Ecuador

SARI hospitalizations, ICU admissions and deaths

Colombia

Distribution of influenza and other respiratory viruses under surveillance by Epidemiolog...
Argentina

ILI endemic channel
Distribution of respiratory viruses by EW

SARI endemic channel
Distribution of influenza viruses by EW

Brazil

Institute Adolfo Lutz

Distribution of influenza viruses under surveillance by Epidemiology Week (EW), region / country, 2010-2011

Chile

ILI endemic channel
Distribution of respiratory viruses in SARI cases by EW, 2011.

SARI cases, 2011

% emergency service consultations. Children <15 years old

Atenciones de Urgencias por causa respiratoria en niños,
( < 15 años), Chile 2009-2010 y 2011 (SE 1-29)
Paraguay

ILI cases

<table>
<thead>
<tr>
<th>Year</th>
<th>ILI cases per 100,000 population</th>
<th>Respiratory Viruses</th>
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<tr>
<td>2011</td>
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SARI hospitalizations, ICU admissions and deaths

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Distribution of respiratory viruses in SARI cases by EW, 2011.

Uruguay

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Distribution of respiratory viruses in SARI cases by EW, 2011.

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