Regional Update EW 02, 2012

Influenza

(January 24, 2012 - 17 h GMT; 12 h EST)

PAHO interactive influenza data: http://ais.paho.org/phip/viz/ed_flu.asp
Influenza Regional Reports: www.paho.org/influenzareports

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 continued to increase, but remained within the expected level for this time of year. Among influenza viruses, influenza A(H3N2) was predominant in Canada and United Sates and influenza A(H1N1)pmd09 in Mexico.
- In Central America and the Caribbean, influenza activity remained low or within the expected level for this period of time. Among influenza viruses, the three influenza strains (influenza A(H3N2), influenza A(H1N1)pmd09 e influenza B) in this subregion.
- In South America, influenza activity and acute respiratory illness activity remained low or within the expected level for this period of time. Co-circulation of influenza A(H3N2) and influenza A(H1N1)pmd09 (Ecuador) were reported in this subregion.

Epidemiologic and virologic influenza update

North America

In Canada[1], in epidemiological week (EW) 02, 2012, influenza activity increased in several regions but remained low in other areas. In EW 02, influenza-like illness (ILI) consultation rates declined slightly to 25.4 per 1,000 consultations and remained within expected levels for this time of year. In EW 02, among the total samples analyzed (n=3,894), the proportion of samples positive for influenza increased slightly to 3.4%. The proportion of influenza virus detections by type this season to date is as follows: 79.4% influenza A [mainly influenza A(H3N2)] and 20.6% influenza B. Concerning other respiratory viruses, the proportion of tests positive for RSV was similar to the previous week (17.6%), and RSV was the most prevalent among all respiratory viruses detected. The proportion of positive tests for the other respiratory viruses remained similar to previous weeks (hMPV-6.0%, rhinovirus-5.6%, coronavirus-5.2%, adenovirus-3.6%, parainfluenza-3.1%).

In the United States[2], in EW 02, influenza activity remained lower than expected for this time of year. At the national level, the proportion of ILI consultations (1.2%) remained below the national baseline (2.4%). The proportion of deaths attributed to pneumonia and influenza for EW 02 (7.6%) was lower than the epidemic threshold for this time of year (7.7%). In EW 02, no pediatric deaths associated with influenza were reported. Among all samples tested during EW 02 (n=3,771), the percentage of samples positive for influenza remained low (3.7%). Among the positive samples, 95.7% were influenza A [among the subtyped influenza A viruses, mainly influenza A(H3N2)] and 4.3% were influenza B.

In Mexico, in EW 01, at the national level, an increase in the proportion of ILI/SARI cases (~13%) was observed as compared to the previous week (~8%). At the regional level, the states with highest proportion of ILI/SARI consultations were Oaxaca (5.8%), Puebla (1.6%), Nuevo Leon (1.2%), Tlaxcala (0.8%) and Baja California (0.7%). This increased influenza activity was within the expected levels for this time of year. According to laboratory data, in EW 02, of the total samples analyzed (n=126), the proportion of samples positive for respiratory viruses (52%) remained increasing since EW 47, 2010 (2.6%). Influenza A(H1N1) pdm09 was the predominant circulating virus.

Caribbean

CAREC*, in EW 02, received epidemiological information from Dominica, Jamaica and Tobago. In EW 02, the SARI hospitalization rate was 1.5%, which was higher than the previous week (1%). The highest SARI hospitalization rate was reported among children aged 5-14 (3.3% of hospitalized children in this age group were SARI cases). No SARI related deaths have been reported since EW 47, 2011. According to laboratory data, RSV, Influenza A(H1N1)pdm09 and rhinovirus have been identified in the past four weeks.

In Jamaica, in EW 02, the proportion of consultations for Acute Respiratory Illness (ARI) was 4%, which was the same as reported for the previous week. The proportion of SARI admissions was 0.7%, increasing slightly compared to previous week. In EW 02, no SARI deaths were reported. According to laboratory data, there were no influenza viruses identified.

In Cuba, according to laboratory data, in EW 02, among all samples tested (n=32), ~9% were positive for respiratory viruses. No samples positive for influenza were detected this week.

In Dominican Republic, in EW 03, among the samples tested (n=17), 11.7% were positive for respiratory viruses. No samples positive for influenza have been detected in the last 3 weeks.

Central America

In Costa Rica, in EW 02, according to laboratory data, among all samples tested (n=118), the percentage of samples positive for respiratory viruses was 33% and for influenza was 13%; both proportions were slightly lower than the previous week. Adenovirus has been the predominant virus in the last 2 weeks (48%), followed by influenza A(H3N2) (28%), RSV (13%) & influenza A(H1N1)pmd09 (11%).

In Honduras[3], in EW 02, the proportion of ILI consultations (4.5%) was slightly higher than the previous EW (3.75%). The proportion of SARI hospitalizations (9.58%) was above the previous EW (6.28%). This week, no SARI-related deaths were reported. According to laboratory data, in EW 02, among all samples tested (n=32), only one sample was positive for parainfluenza.

In Nicaragua, in EW 02, among all samples tested (n=49), 6% were positive for respiratory viruses and 2% were positive to influenza (influenza B).

In Panama, in EW 01, the percent positivity for respiratory viruses was 73%, with no positive samples for influenza viruses.

South America – Andean

In Colombia, during EW 01, among all samples tested (n=62), 29% were positive to influenza (co-circulation of influenza A(H1N1)pdm09 and influenza A(H3N2)). No other respiratory viruses were detected.

In Ecuador, in EW 02, at the national level, the percentage of SARI hospitalizations, SARI ICU admissions, and SARI deaths remained under 10%, being the Highlands the region with the highest SARI activity reported. According to laboratory data, in EW 02, among all samples tested (n=94) the percent positivity for respiratory viruses was 26.6%; reporting co-circulation of influenza A(H3N2) and influenza A(H1N1)pmd09; followed by RSV.

South America – Southern Cone

In Argentina[4], in EW 50, ILI and SARI endemic channels showed that the number of ILI and pneumonia cases have continued to decrease and remained within the expected level for this period of the year. According to laboratory data, in EW 02, among all samples analyzed (n=216), the proportion of positive samples for respiratory viruses (3%) continued to decrease as compared to previous weeks. No influenza viruses have been detected in the last 4 weeks.

In Paraguay, according to laboratory data, in EW 51 and 52, an increase in the number of samples positive for influenza A(H3N2) was reported (54% of the total of samples tested).

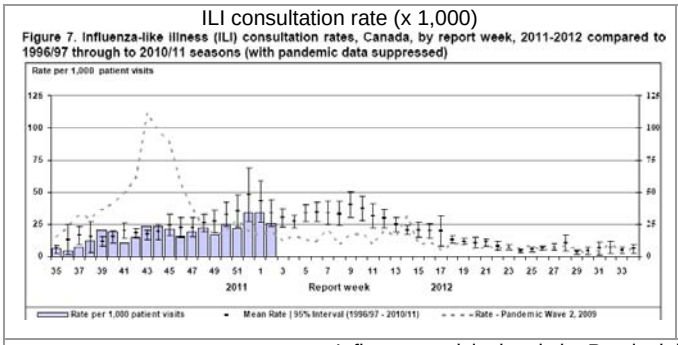
* Includes Barbados, Belize, Dominica, Jamaica, St Vincents and the Grenadines, St Lucia, Suriname and Trinidad and Tobago

Graphs

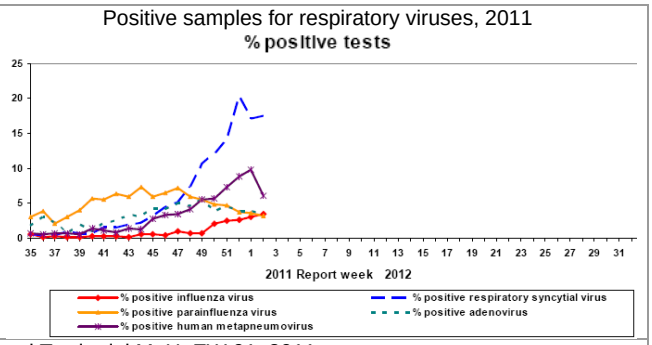
North America

Canada

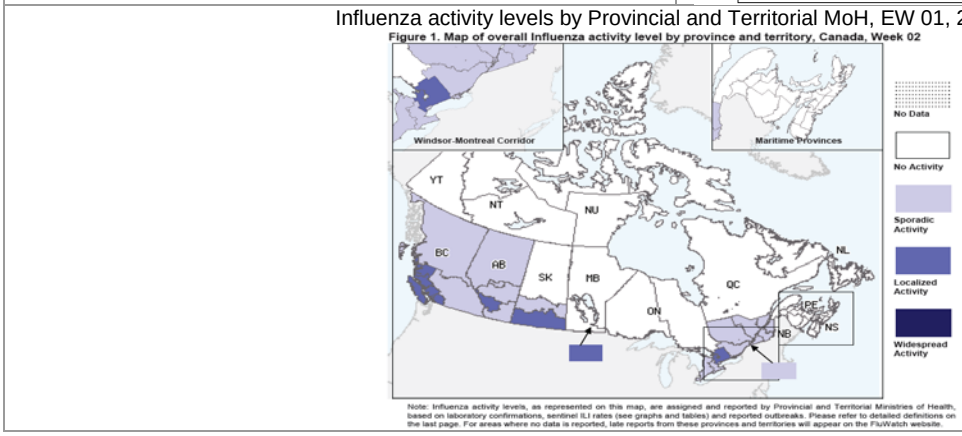
ILI consultation rate (x 1,000)



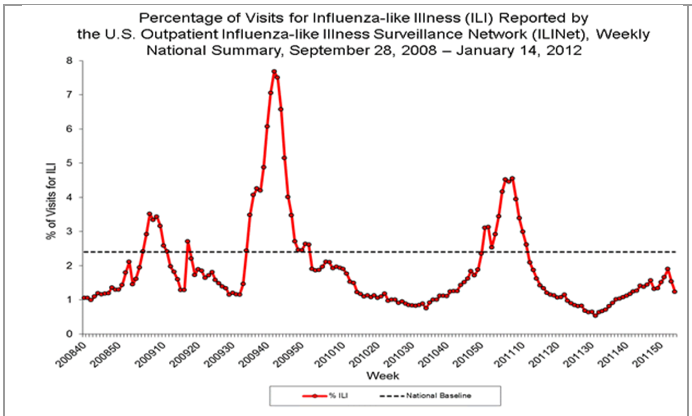
Positive samples for respiratory viruses, 2011

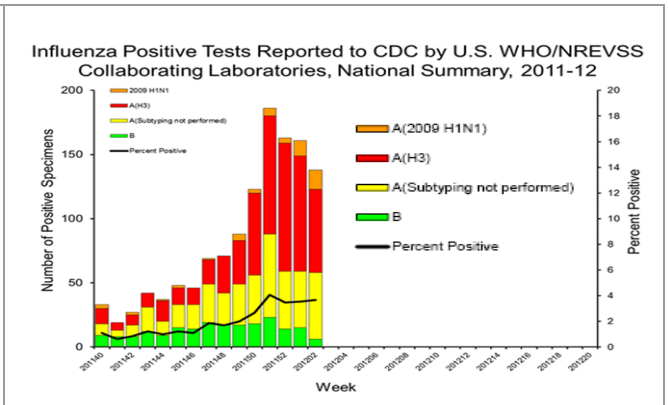


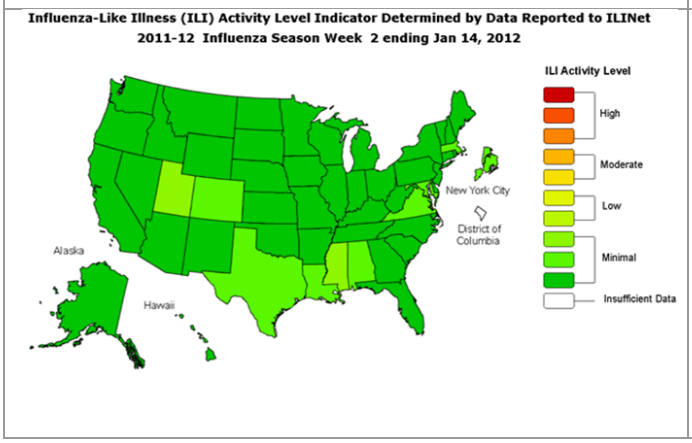
Influenza activity levels by Provincial and Territorial MoH, EW 01, 2011

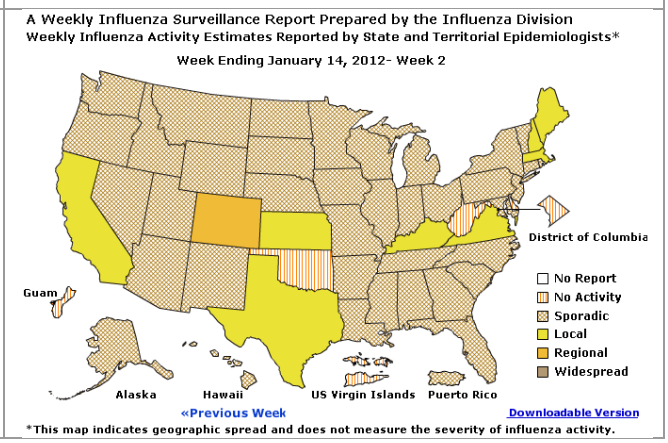


United States

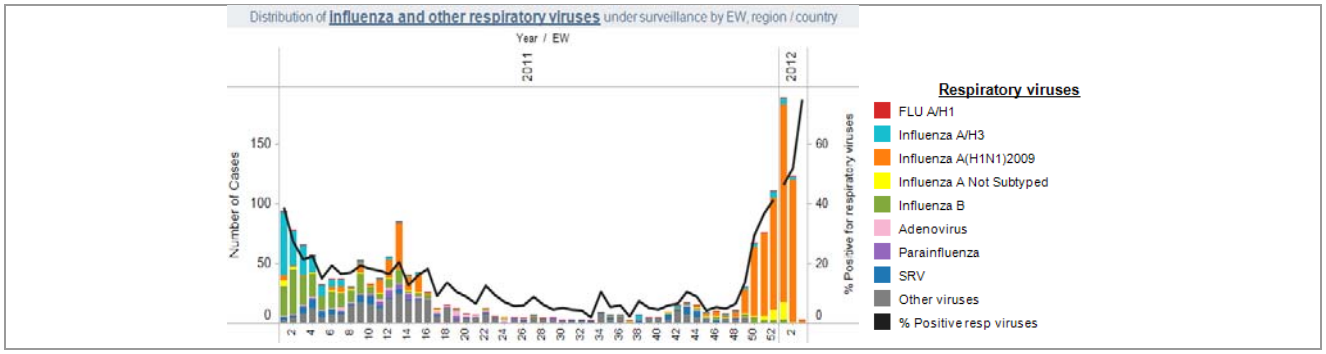






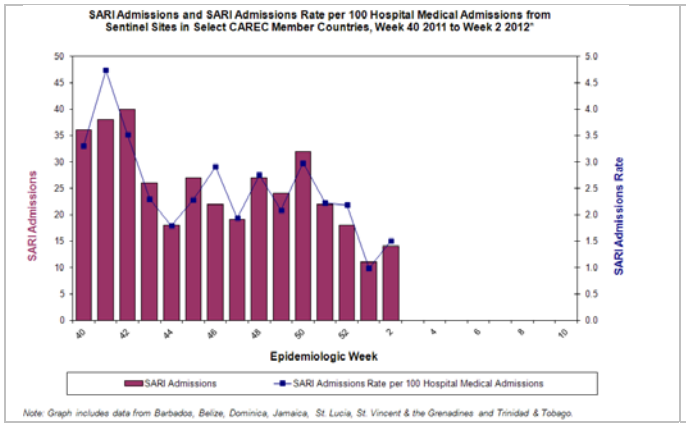


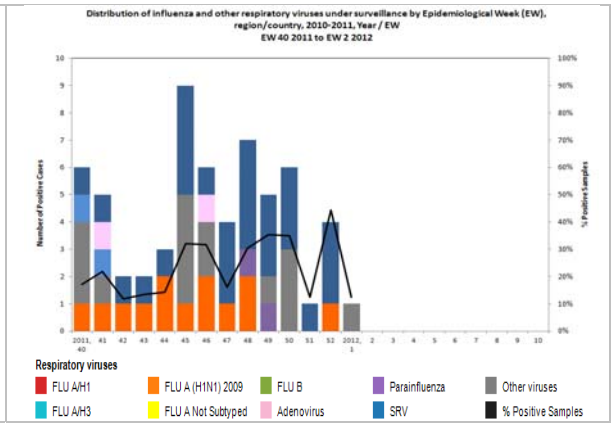
Mexico



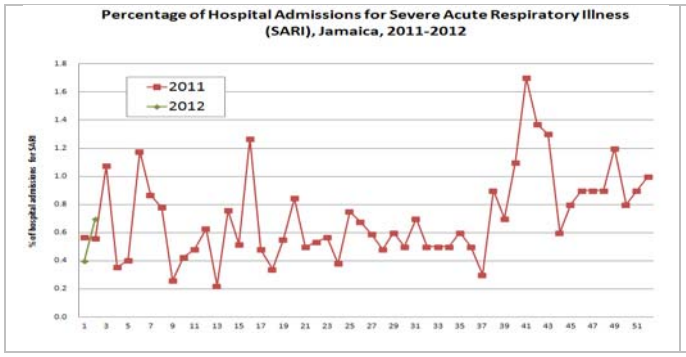
Caribbean

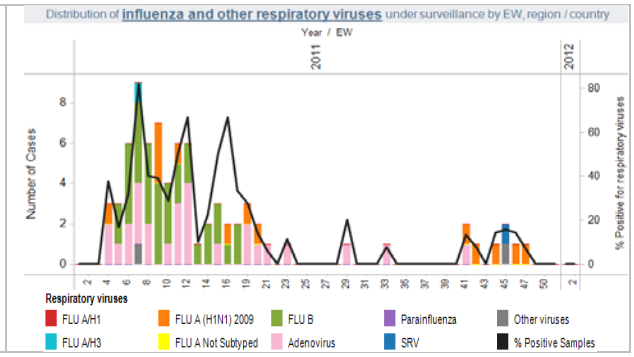
CAREC



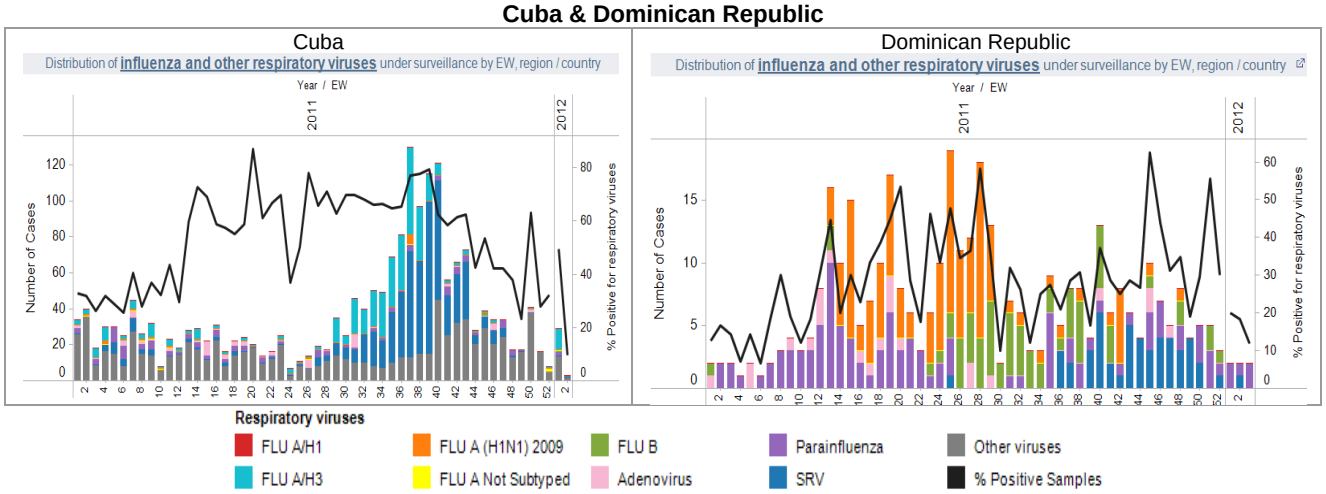


Jamaica





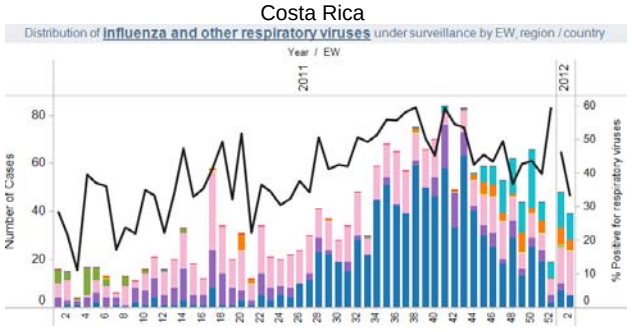
Cuba & Dominican Republic



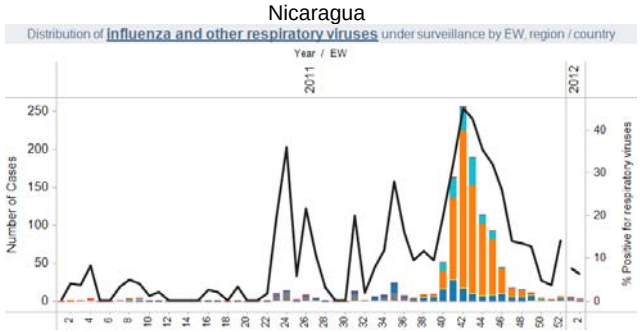
Central America

Costa Rica, Nicaragua and Panama

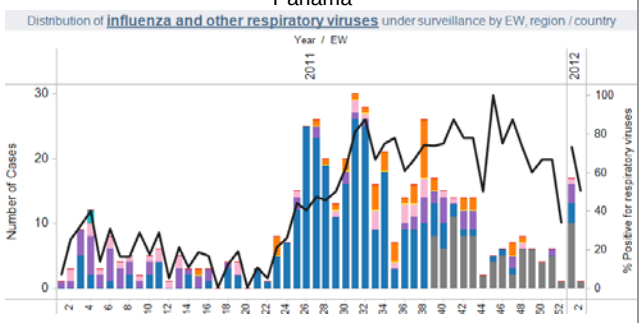
Costa Rica

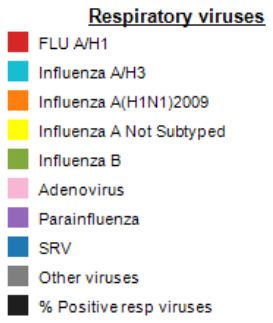


Nicaragua



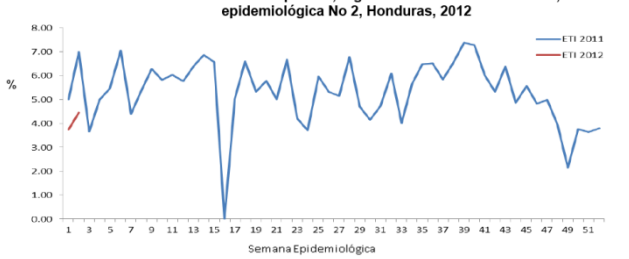
Panama





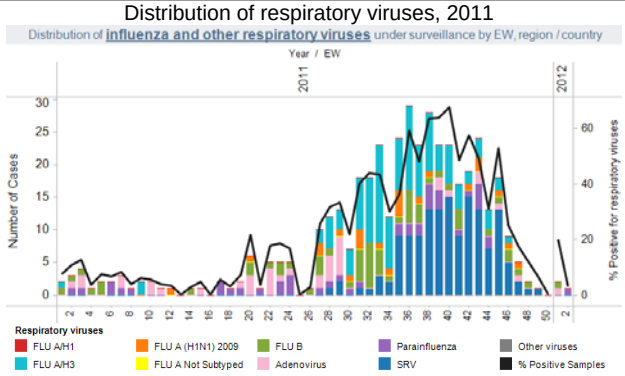
Honduras

% ILI consultations



% SARI admissions

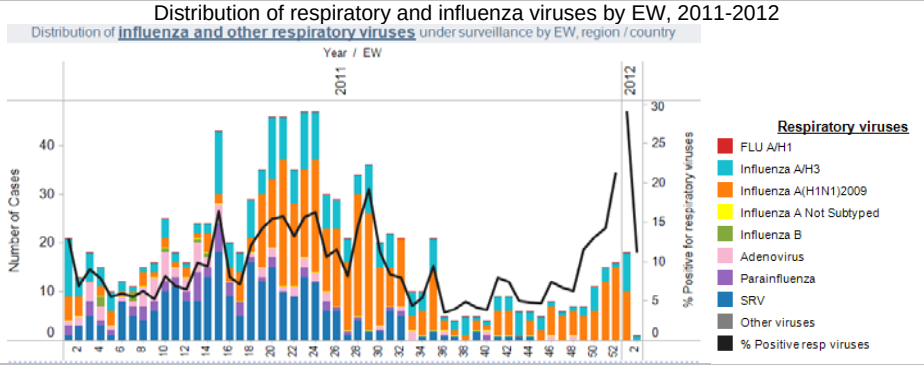
Distribution of respiratory viruses, 2011



South America - Andean

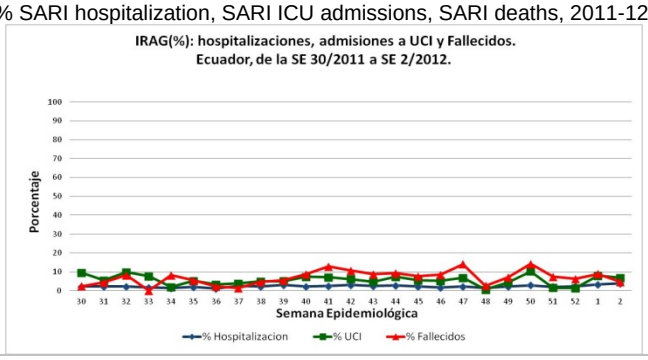
Colombia

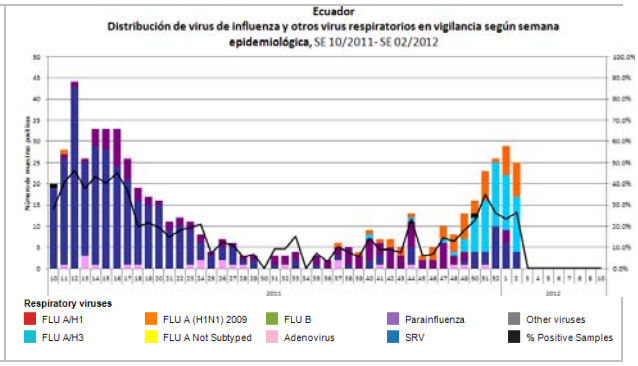
Distribution of respiratory and influenza viruses by EW, 2011-2012



Ecuador

% SARI hospitalization, SARI ICU admissions, SARI deaths, 2011-12

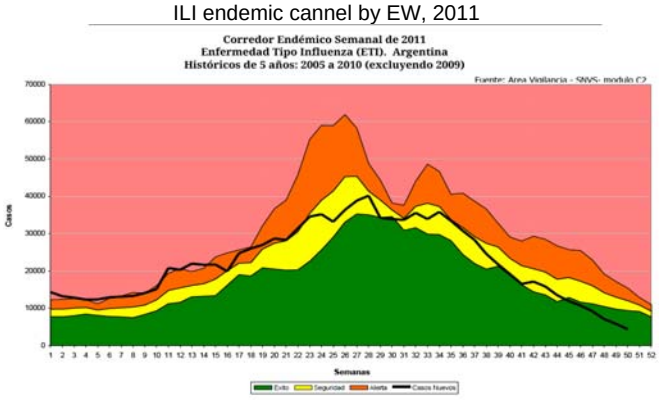




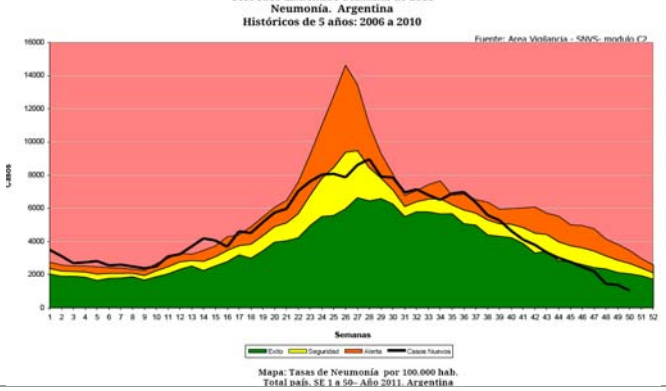
South America – Southern Cone

Argentina

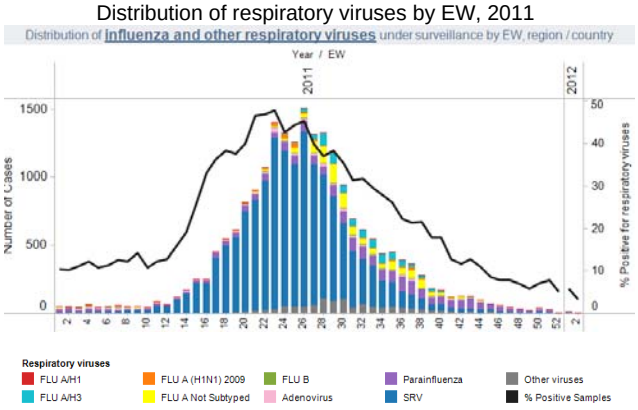
ILI endemic cannel by EW, 2011



Pneumonia endemic cannel by EW, 2011

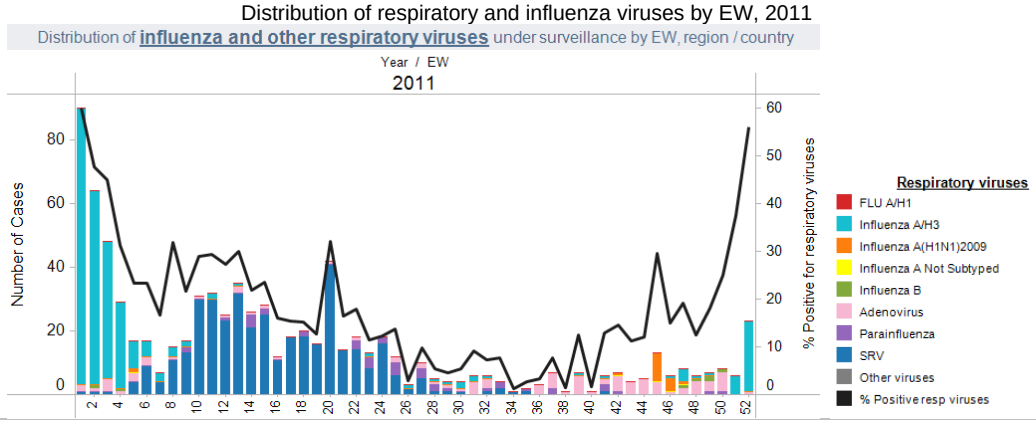


Distribution of respiratory viruses by EW, 2011



Paraguay

Distribution of respiratory and influenza viruses by EW, 2011



[1] FluWatch Report. EWs 02. Available at http://www.phac-aspc.gc.ca/fluwatch/
[2] US Surveillance Summary. Week 02. Centers for Disease Control and Prevention
[3] Honduras. Vigilancia centinela de Tegucigalpa y San Pedro Sula. SE 02
[4] Argentina. Actualización situación de enfermedades respiratorias 2012. SE 02.